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The reserved judgment delivered last week by Mr. Justice Bray in a Divisinal Court has an important bearing on the relationship of the medical profession to the National Insurance Act. It will be remembered that Dr. Alfred Salter, of Bermondsey, refused to sign a document supplementing his original duties by an undertaking to issue duplicate prescriptions. For that refusal he was dismissed by the London Insurance Committee. His action was sustained in the lower, and now has been endorsed by the Appeal Courts. In effect, the Insurance Committee has received a sharp reminder that it can exercise no arbitrary powers over the rights of medical men on the panel. The just administration of a great and complicated Act is absolutely essential for the development of its admitted potentialities for good. The Act is with us, and while there is no justification for the continuance of unreasonable and vexatious opposition, it is nevertheless desirable in the interests of all concerned to watch its administration with unrelaxing vigilance. Dr. Salter deserves the congratulations of the profession for his determined action. We should be glad to consider a formal presentation of thanks if an adequate number of our readers affirm their active approval of some such step.

In our issue of last week it was pointed out that the name of a member of the General Medical Council appears on the list of "contributors" to the "Family Encyclopaedia of Medicine." We have since received from the gentleman in question a positive disclaimer of authorisation of the use of his name in that connection. That being the case, it may be presumed that Sir Clifford Allbutt has the remedy in his own hands. No one acquainted with his distinguished character and work would for a moment imagine he had voluntarily sought publicity of the peculiar nature extended to those medical men whose names, titles and professional appointments were published at full length in the first three fortnightly numbers of the work: in whole columns of lurid newspaper advertisements, and, horribile dictu, upon sandwich-boards paraded through the streets of London. From the first appearance of this portentous popular work it has been insisted in these columns that the medical men concerned were quite within their rights even if they actually assented to the use of their names in connection with a pseudo-professional publication. As a matter of fact, it was announced not long after the first outcry against its methods of publicity that the gentlemen concerned had met and decided not to take legal action. Later it was stated that the publication of the names, titles and appointments would cease with the issue of the third number. It was also generally intimated that the "contributors" were not paid for their services, which mainly consisted of revision of proofs.

What do we find in the ninth part, the last which has reached the public? The issuing of fortnightly numbers has now extended over some four months, so that ample time has elapsed for the "contributors" to consider their position and to take stringent steps to put themselves right with the medical profession, or, at any rate, with that portion of it which still regards their conduct with respect the somewhat adverse criticisms that have hitherto regulated the relations of medical men to the public as regards purely professional topics. The ninth issue contains an article on eczema, and the original prospectus and the earlier numbers infirm us Sir Malcolm Morris is responsible for that part of the work dealing with diseases of the skin. A perusal of the article shows that the name of Sir Malcolm Morris occurs twice, first, apparently as the authority for a wholly unhistorical classification of eczema, and, secondly, in reference to his well-known book on "Diseases of the Skin." It may be assumed that Sir Malcolm Morris could not have written the article, neither could he be any possibility have passed proofs which referred the lay
Another Skin Book. The editor of the "Encyclopaedia," in permitting these references, displays little or no intention of amending his ways. It was pointed out some months ago in these columns that in the first three numbers references were made to certain medical text-books, amongst which was one by Dr. J. H. Sequeira. That gentleman's book needs no commendation in medical circles, where it is recognised as an authority—but why advertise it to the public? The editor of the "Encyclopaedia," for some reason or other best known to himself, seems to think that the lay Britisher needs special illumination upon that complicated branch of study commonly spoken of as dermatology. Dr. Riddle, moreover, exercising his undoubted right as an editor has seen fit to give special prominence to the works of two writers, Dr. J. H. Sequeira and Sir Malcolm Morris. The writers of other books upon diseases of the skin probably will not in the long run regret that their reputation will depend on agencies other than the commercial activities of Messrs. Harmsworth. In future it will be difficult for anyone to blame any medical man who may seek publicity in lay publications for his professional qualifications and for medical books of his own production. The difference, however, between his case and that of the "contributors," is that the latter have not to pay for the notice of their names, whereas non-contributors to the "Encyclopaedia" would find newspaper notices obtainable only at high advertisement rates.

The Deadly Nexus. If the "contributors" have been basely tricked and their names used unwaribalently by the proprietors of the "Encyclopaedia," why do they not take immediate steps to set themselves right with their professional brethren, who so far have escaped the deluge? Nor surely is it the unworthy by-up-to-date publishing enterprise? A legal remedy has apparently not commended itself to their collective judgment. Short of that, it would at least be possible for them to bring such pressure upon the editor, Dr. Riddle, as to prevent the further insertion of names and pointed allusion to technical medical books in current numbers. Month by month interest and astonishment of the dental world, and by this time contributers should at least have secured a clear understanding as to the methods to be adopted in the completion of the "Encyclopaedia." The medical profession is entitled to something more than a general transference of the blame to editorial shoulders. Nor can anything be gained by turning the weapons of sarcasm and obloquy upon the Medical Press and Circular, which has merely acted on its traditional policy in defending the honour of the profession. Rather should the "contributors" thank us for the opportunity afforded by our comments to explain the why and wherefore of their presence in that galaxy. The medical profession is good-natured and charitable in a matter of this kind, but a hushing up policy is hardly likely to evoke its spontaneous and sympathetic forgiveness.

Artificial Teeth for the Poor. It is a curious fact that no provision has been made in recent health legislation for supplying artificial teeth for the indigent poor. A great deal of preventable suffering is brought about by faulty dentition, as every medical man knows, in fact, oral sepsis is responsible for many grave systemic disorders. In the absence of national dental insurance benefit the burden of attending to the dental needs of the poor must needs be borne by private philanthropy, though the dental hospitals do what they can to relieve the poor in this direction. An inquiry as to the number of sedentulous persons among the poor, especially in the East End of London, would, no doubt furnish some interesting data; at the same time it could hardly fail to call public attention to one of the most crying needs of the day—namely, the inclusion of dental benefit in that granted under the National Insurance. A handsome gift was announced the other day from Mr. Edwin Tate, of Park Lane, of £5,000 to St. Bartholomew's Hospital, the income of which is to be used "to assist nedulous persons to obtain artificial teeth." Under the terms of this fund it is stated that such persons may be assisted to the extent of one-half of the estimated cost of the teeth. Nothing will be paid until the dental surgeon recommending the case has certified that the teeth supplied are satisfactory. The systematic dental inspection of school children is too much to benefit the dentition of the rising generation, but something still needs to be done in the direction of inspecting the mouths of older people in workhouses and elsewhere.

LEADING ARTICLES.

HOW TO COMPENSATE A DIMINISHING BIRTH-RATE.

A diminishing birth-rate has of late years become a matter of serious socio-political significance. Its incidence appears to be an outcome of the increasing complexity of life and it has affected, more or less profoundly, the civilised nations of the world. In the case of France the falling off in population has been so great as to arouse the apprehension of responsible politicians and students of social science. So far it can hardly be said that any satisfying conclusions have been arrived at with regard to the contributory causes of the decline, or to the best means of combating the same in the interests of the community. At the same time certain points have been established. For instance, the fact that both the marriage and the birth-rate rise in proportion to the material prosperity of a nation may be accepted as more or less axiomatic; similarly, the unequal distribution of wealth is closely concerned in the diminution, a statement that is borne out by the fact that fecundity is, broadly speaking, in inverse ratio to parental wealth. Poverty-stricken Whitechapel is peopled by large families, while wealthy Mayfair counts its children by twos and threes. But although the economic factor admittedly plays an important part in the matter, it by no means accounts for the whole of the modern civilised movement in favour of small families. The average age of marriage has become later and later, a fact that is probably due in the main to economic causes. The increasing disinclination of women to bear children is largely due to their recognition of the shortened life and impaired health consequent on frequent childbearing. Against a conclusion of that kind the
morality is hardly likely to declaim with much effect. For that matter it does not appear that any
one has so far provided an efficient remedy to stem the steady decline of the birth-rate. Last
week Lord Haldane threw some philosophic light upon the problem. He observed that the diminu-
tion of the birth-rate might be not altogether an evil. It might mean that people were more careful
in contracting marriages, and that there was a general desire, far spread, on the part of the people
to bring up their children in a better way than they have in the past. He then dealt with the crucial point
of compensation for a lessened number of births by a decreased infantile and juvenile mortality.
Therein lies, if we mistake not, the key to a states-
manlike handling of the diminishing birth-rate.
Lord Haldane dwelt not only upon the children who had come into the world and died during the first
twelve months, but also upon those who had never come into the world at all, although under proper
conditions they would have added to the normal increase of population. The statistics he stigma-
tised as “frightful.” The death-rate during the first twelve months was 128 per 1,000; while the rate of
full grown and healthy children still-born was 150 per 1,000. Recent legislation has endeavoured
to ameliorate the condition of maternity amongst the poorer classes of society, both as regards the
conditions of maternal labour and of medical care and nutrition during and after the confinement.
As to the children, much has been done by extending relief to working classes during unemployment,
by the provision of a wide system of medical aid and by the feeding and medical care of school children.
In these various ways the adverse effects of a lessened birth-rate will in all probability be more or
less counterpoised. The causes of the diminution are complex and obscure, and for their detection
as well as their remedy we must turn to the better organisation of society as regards the dis-
tribution of wealth and the other internal economic relationships that lie at the root of all progress in
the public health.

CURRENT TOPICS.

Maternity Benefit and Midwifery Teaching.

A SPECIAL committee was appointed at the begin-
ing of the year by the Glasgow Obstetrical and
Gynecological Society to inquire into the effects
of the maternity benefit upon the teaching and
practice of midwifery in Glasgow during the first
year of the National Insurance Act. The com-
mitee’s data were obtained (a) from medical institu-
tions and public bodies; (b) from the replies of
general practitioners to a series of questions
addressed to 450 medical men. Of the 222 who
made returns, only 166 gave replies suitable for the
purpose of the inquiry. In their report recently
issued the committee states that to the general ques-
tion whether the maternity benefit had favoured the
comfort and safety of the mother and child, 57
practitioners replied in the affirmative, 36 in the
negative, 16 had observed no change, 3 were of
opinion that the Act had been prejudicial in this
direction, 24 that the effect was doubtful or partly
beneficial and partly prejudicial, while 30 could
express no opinion. In such a diverse opinion
in the general result of the replies to this question
in itself would appear to indicate that the maternity
benefit has not promoted in Glasgow the comfort
and security of mothers and infants to the extent
that might have been hoped for. Giving the effect
of the replies to the special questions, the com-
mitee states that the medical profession as a whole
has not obtained—nor does it desire—an increased
amount of maternity work in consequence of the
Insurance Act. On the other hand, as there has
been a marked decrease in the number of cases at
the Maternity Hospital and the Poor-law hospitals,
it is to be inferred that more work is being done by
midwives. It does not appear that the trained
nurse is more frequently employed—and in any case
the untrained midwife continues in favour. The
explanation suggested by the committee is that
now that there is money available, housekeeping
services, which formerly were given free by friends
or neighbours, have to be paid for. Consequently
the “handy woman” who will care for the house
as well as the patient is preferred. The decrease—
amounting to 30 per cent.—in the outdoor practice
of the Maternity Hospital is stated to be a serious
hindrance to midwifery teaching.

The Death-Rate on the Rand.

A severe indictment of the conditions of native
labour in the gold mines of the Rand is disclosed
in the report made by Dr. W. C. Gorgas, Surgeon-
General to the U.S. Army and chief sanitary officer
of the Panama Canal Commission, who was called
in by the Transvaal Chamber of Mines. In the
report which appears in the Journal of the American
Medical Association, Dr. Gorgas brings out the
startling fact that the death-rate among natives
employed in the Rand mines in 1903 was over 71^2
per 1,000. This had fallen in 1912 to just over 26
per 1,000, which, says, Dr. Gorgas, is “still very
much too high, as we are considering men in the
prime of life.” The Panama Canal zone is
notoriously unhealthy, but the death-rate among
the negro labourers on the Canal, in 1913 only 10
per 1,000, one third less than half the Rand record.
The principal causes of this slaughter are pneumonia
and tuberculosis, and Dr. Gorgas found that in the
living quarters each native was only allowed 14 feet
of floor space, against a reasonable minimum of 50
square feet. He says the remedy for the existing
high death-rates is to allow the natives to bring
their families with them and allow each family
to be housed in its individual hut, rather than have
large numbers of native labourers crowded together
in compounds, as is the case at present. All
experiments failed on the Panama Canal zone until
this method was adopted, and he strongly advises
the abolition of the Rand compounds. It is to be
hoped that the South African Government will see
that this reform is carried out.

Children’s Country Holidays.

The attention of the Local Government Board has
been called to complaints that are occasionally
made as the result of town children being sent away
to lodge in country districts by various philan-
thropic organisations or agencies. Sometimes
children are said to bring disease into a village,
or the want of sanitation and overcrowding some-
times prevalent in the village are prejudicial to the
health of the inhabitants as well as to the children
themselves. A circular has accordingly been issued
by the Board to public health authorities through-
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out the country suggesting certain ways in which precautionary measures can be taken. It is not proposed for a moment to place any check on the country holiday movement, but it appears that the uncertainty in the present practice of the different agencies renders it advisable that effective preventive action should begin with them. It is suggested that the medical officer of health of the country district in which the children are sent should be communicated with in all cases, preferably by the central office of the agency, rather than by any individual voluntary workers. Careful inquiries should always be made as to infectious disease before the children are sent, so as to ensure, if possible, that they are not in an infected condition, nor in the incubation stage of any acute infectious malady. Greater care should also be taken to secure cleanliness of body and clothing before the children are sent away, and the assistance of cleansing stations might be sought, where necessary, for this purpose. Finally, the necessity of calling in medical advice should a child fall ill when away is rightly urged, and should infectious disease occur, the medical officer of health of the district should be at once informed. If local authorities and the holiday agencies would exercise greater supervision the complaints referred to should never arise.

Medical Certification in Ireland.

The settlement of the certification question in Ireland has been again postponed. The present arrangements are to continue until October 31st next. That is to say, that in some eight or nine administrative areas the existing panels are to continue, while in the rest of the country insured persons will still rely on the good nature of the profession to provide evidence of sickness, such evidence being subject to review by "medical advisers," district nurses, railway porters, and other such experts. The position is highly unsatisfactory from every point of view, but it is nevertheless better than it might be. It is, at least, not irrevocable. There is no doubt that the establishment of a permanent system of the worst possible character—a system of paid medical certifiers—was imminent. It is a sign of grace in the authorities that they have, despite the extreme political pressure brought to bear on them, remained, at any rate for the time, free from committing such a crime and blunder. The arguments put forward on behalf of the insured at the recent meeting in the Dublin Mansion House, and pressed on Mr. Masterman by the deputation which visited London a few days later, are irrefutable. All that is necessary to establish a system which will be satisfactory to the profession, and will secure justice for the insured, is absolute firmness on the part of the profession, backed by a determination on the part of the insured to secure their rights.

Antidotes Included.

The Americans are a humorous folk, but they do not always know it. They have the laughable habit of taking things seriously. They are the only serious nation. It has been solemnly suggested that tablets of perchloride of mercury should contain 13 grains of tartar emetic, so that "the drug should produce vomiting before the bichloride of mercury is absorbed and before it exerts its irritant action." It is fairly typical of transatlantic caution to consider the average man either a complete fool or an incorrigible suicidal maniac. It is what they call sense and science. One firm across the ocean sells tablets of perchloride shaped like coffins and impressed with a skull and crossbones. That would not deter the determined suicide, and it is questionable if it would save the fool. If enough people are going to be sufficiently careless to swallow contraceptive tablets in mistake for "headache powders," to make such complicated amateur legislation worth while, we can do little but be thankful we are not as other men are. For all that, the idea of incorporating an antidote with every nostrum thing on the market is capable of unlimited expansion. It would be sufficient to dressings of potassium bichloride with every bottle of whiskey is a good idea, and would probably do well till the price of the drug became prohibitive. There is no end to the possible combinations. Every irresistible force would be wrapped up with an immovable object. Motor cars and attendant policemen would be coupled; fair ladies and 606; and every man who bought a safety razor might be presented, free, with a trained ambulance man and a triangular bandage.

Of Subcutaneous Interest.

In these times of organotherapy and complicated synthetic medication the means whereby these new powers are given into our control is neglected. We can pour things into the mouth, we can introduce them by the gut—we cannot do it at the point. We cannot rely on the subject being well, it is a most ambiguous step. By the time the patient is referred to the bar of science, and the barman is the cautionary, he is a doubtful subject. The performance of the barman can never be adequately ascertained. There are no authorities to look at, and we are left to infer what has passed. Hypodermic syringes are used, we suspect, in less than 20 per cent of cases which in a majority of instances have been used. The syringes are used by farmers in the fields, by hospital servants, and everyone. It is a very loose and uncertain method. A small sprig of mistletoe is no substitute for a well-trained and skilled medical attendant.

The Five Neglected Years.

The proposal to establish a clinic for babies and children under school age, recently adopted at a conference held at Manchester under the auspices of the Manchester and Salford Sanitary Association, will be welcomed by all those who have the physical welfare of infants at heart. The ordinary school clinics have proved of great value in dealing with physical defects and ailments among school children, but, as Dr. Benjamin Moore pointed out, one-fifth of all the deaths in the community occur in
children under five years of age. Half the doctoring carried out by medical men is practised among infants and young children. The "five neglected years" during which disease is often left to run riot among young lives are those between a child's birth and the school age. Up to the present health legislators have ignored this important period of human existence, though the need for care and hygiene during these early years are more pressing, perhaps, than at any other time. From the economic point of view, as the Lord Mayor of Manchester remarked, properly conducted baby clinics would eventually prove to be a great saving to the nation, and instead of increasing the rates would reduce them. A good deal of preventable blindness, for instance, might well come within the scope of such clinics. It would be a good thing if the existing schools for mothers could be developed into baby clinics, and, in this manner some degree of overlapping of charitable and municipal enterprises might be saved.

Emetine as a Therapeutic Agent.

Of the three alkaloids found in ipecacuanha root, emetine, cephaeline and psychotrine, the former is the one to which the drug owes its efficacy in cases of amebic dysentery. Owing to the vomiting occasioned by its administration the remedy fell more or less into disuse, until it was revived by Sir Patrick Manson in 1900. Eleven years later, Capt. E. B. Vedder, of the Medical Corps, United States Army, undertook some experiments on the bacteriologic properties of ipecacuanha in dysentery, and Sir Leonard Rogers, of Calcutta, followed these up later from the clinical aspect. It was found that one-sixth of a grain of emetine hydrochloride given hyperdermically caused the disappearance of blood from dysenteric stools, no vomiting or depression being observed. Thus ipecacuanha has been robbed of all its former terrors and discomforts, and it may be said that emetine constitutes a specific treatment for hepatitis and dysentery of amebic origin. In an admirable résumé of the subject contributed to the Therapeutic and Pharmacological Section of the Royal Society of Medicine, Dr. George C. Low states that keratin-coated tabloids may be given, with better results than are produced by the injections. More recently it has been found that emetine is useful in the treatment of hemoptysis and intestinal hemorrhages. Even in hemoptysis the remedy has been employed with success, and it may be noted that no change either in the blood pressure, coagulation of the blood, or in the blood-count was observed after an injection. Hemorrhage in typhoid and in chronic nephritis has also yielded in a similar manner to the treatment. It would seem, therefore, that we have in emetine a useful means of arresting hemorrhage, being comparable or even superior to supra-renal extract in this respect.

PERSONAL.

H.M. THE KING, during his tour in the Midlands last week, opened the King Edward Memorial Wing of the Mansfield Hospital and also laid the foundation-stones of the Municipal Tuberculosis Sanatorium and Hospital at Hull. In both cases the ceremony was performed by pressing an electric button.

COL. SIR WILLIAM B. LEISHMAN, R.A.M.C., and Dr. Louis C. Purser, of Dublin, were among the recipients of the honorary degree of L.L.D. of the University of Glasgow last week in connection with the Commemoration Day celebrations.

DR. GUSTAV MONOD, M.D.Paris, M.R.C.P.Lond., has been appointed Physician to the Vichy Thermal Hospital.

DR. J. GOODWIN TOMKINSON has been appointed Lecturer in Diseases of the Skin at Anderson’s Medical College, Glasgow.

The Earnshaw Cooper Gold Medal in Dietetics has been awarded to Dr. W. Bamford Winston, M.B., M.R.C.S., L.R.C.P.

DR. FRANCIS E. FREMANTLE, County Medical Officer for Hertford, has been chosen as one of the Unionist candidates for Stockport.

DR. HENRY DEVINE, M.D., B.S.Lond., M.D.Bristol, M.R.C.P., has been appointed Medical Superintendent of the Portsmouth Borough Asylum.

MR. P. T. CRUMBIE M.B., F.R.C.S.Eng., has been elected to the new lectureship of Applied Anatomy in the Queen’s University of Belfast.

We are glad to learn that Dr. Edwin Rayner, the Treasurer of the British Medical Association, is making a good recovery after his recent operation for appendicitis.

PROFESSOR ARTHUR THOMSON, M.A., M.B., F.R.C.S., will preside at the official dinner of the Oxford Ophthalmological Congress at Keble Hall on Thursday, July 9th.

MR. JAMES M. GRAHAM, M.B., Ch.B., has been appointed University Lecturer on Surgical Pathology in the Department of Surgery in the University of Edinburgh.

DR. CHARLES JOHN SHAW has been appointed Physician Superintendent to the Monrose Royal Asylum in succession to Dr. J. G. Havelock, who is retiring from the post.

DR. W. E. CARNegie DICKSON, M.D., F.R.C.P.Ed., has been appointed Director of the Pathological Department and Research Laboratory of the Royal Hospital for Diseases of the Chest, City Road.

On the occasion of the tercentenary of the founding of Groningen University the honorary degree of Doctor of Medicine has been conferred upon Sir Edward Schaefer, Edinburgh, and Professor J. N. Langley, Cambridge.

DR. T. N. PARRY, J.P., of Ferndale, was the recipient the other day of a handsomely illuminated address from the members of the Ferndale Conservative Club in recognition of his services on behalf of the club and to the cause generally.

The Nuneaton town council have voted their Medical Officer of Health (Dr. V. Gray Maitland) an honararium of £25 for extra work carried out by him in connection with the treatment of tuberculosis at the Tuttle Hill sanatorium.

The following promotions and appointments to the Order of the Hospital of St. John of Jerusalem in England have been sanctioned by H.M. the King:—To be Knights of Grace, Colonel D. J. Macintosh, M.V.O., A.M.S. (T.F.); Dr. J. MacIntyre, and Surgeon-General W. W. Kenny, K.H.S., A.M.S.

SIR FRANCIS HENRY LAKING, first Bart., G.C.V.O., K.C.B., M.D., LL.D., of St. Clevelands Row, Westminster, S.W., late Physician-in-Ordinary to King Edward VII., to King George V., and to Queen Alexandra, left estate of the gross value of £24,496, of which the net personality has been sworn at £20,033.
CLINICAL LECTURE
ON
PERNICIOUS ANÆMIA WITH SPECIAL REFERENCE TO ITS
ATYPICAL SYMPTOMS AND COMPLICATIONS. (a)

By ALEXANDER GOODALL, M.D., F.R.C.P.Ed
Assistant Physician to the
Royal Infirmary, Edinburgh.

Last session we studied a typical case of pernicious anaemia. You may remember that the patient was a man, aged 35, who complained of muscular weakness. He showed a remarkable degree of pallor combined with a peculiar lemon-yellow colour of the skin. His temperature ranged from 90 to 101. He was breathless on slight exertion, and his pulse was rapid and feeble. Altogether his symptoms were so striking that a senior student could hardly make a wrong diagnosis. Then we examined his blood and found that when a drop exuded it looked pale and watery, the red corpuscles numbered only 900,000 per c.mm., the haemoglobin percentage was 25. We noticed the importance of the relationship of these figures, that is, the colour value of each corpuscle or the colour index. It is obtained by dividing the percentage of haemoglobin by the percentage of corpuscles. The latter is obtained by an easy exercise in simple proportion or even more simply by multiplying the first two figures of the blood count by 2 (only the first figure when the count is less than one million). In this case 25/18 = 1.38. Now a colour index over unity is practically distinctive of pernicious anaemia. Then we found that the leucocytes were reduced to 3,000 per c.mm., the cells chiefly diminished being the polymorphs. In stained films we noticed the greatly increased size of the red corpuscles, their inequality in size (anisocytosis), some deformity (poikilocytosis), and an undue affinity for the basic stain (polychromasia). Some of the corpuscles showed this polychromasia in a diffuse form, but there were a few in which the polychromasia showed in the form of dots—basophilic stippling or punctate basophilia. Then we noticed the presence of nucleated red cells. The majority of these were large cells with a large nucleus showing a very distinct chromatin network. These were megaloblasts. Then we noted a few normoblasts, cells about the same size as the red corpuscles, but with a small deeply staining or pyknotic nucleus. I laid stress on three points, the high colour index, the increased average size, and the presence of megaloblasts as definitely establishing a diagnosis which, however, was never in doubt.

What I wish to emphasise to-day is that not half of the cases of pernicious anaemia show the classical clinical symptoms, and that the blood picture, while usually distinctive enough, does not always present such a striking picture as that of the last case. We are fortunate in having illustrations of these features, for there are at present three cases in the ward, none of which were sent in as cases of pernicious anaemia, and in none of which is anaemia the most striking symptom, although in two of them its degree is extreme. I wish to show you five cases altogether. They are all seriously ill, so the simplest plan for all concerned will be for us to go to the ward and see them there.

CASE SIMULATING GASTRIC CARCINOMA AND DEVELOPING ACUTE MANIA.

This is a married woman, aged 47, who lives in a historic but not very salubrious part of our city, the Canongate. She says that she was taken ill only five days before admission. Her complaint was vomiting and diarrhoea. She was seen by a doctor, who, not unreasonably thought that she might be suffering from gastric carcinoma, and sent her to hospital. Her family history is satisfactory. Her social conditions are not what a residence in the Canongate would have implied in the time of the Stuarts. She has apparently never been a bigoted teetotaller, but asserts that for the last eight years her alcoholic refreshment has been limited to "about" one glass of whisky a week. As regards previous illnesses, her left leg was amputated evidently on account of some septic trouble when she was seven years of age. She had bleeding piles for a long time, but was cured by operation many years ago. She has had several attacks of bronchitis. Although she tells us that she has only been ill for five days before admission she had noticed increasing weakness for some months. The vomiting began suddenly. She says that it was coloured like coffee. She then began to suffer from diarrhoea, and says that she fainted. She also complains of some abdominal pain.

Her history is thus every whit as suggestive of a gastric neoplasm as of her real illness, and the diagnosis rests on the results of our examination.

She looks fairly well nourished, the skin is lemon-yellow and the mucous membranes show a marked pallor.

The teeth are decayed and dirty. The tongue is slightly furred but shows none of the glazed, atrophic areas which are sometimes seen. Free HCl is absent in the vomited material.

There is a little epigastric tenderness and some splashing can be elicited after food. The pulse rate is 96. Its tension is low. A soft systolic murmur can be heard at the aortic and pulmonary areas, but there is no cardiac enlargement and no evidence of valvular disease. The chest is rather emphysematous.

Here then is a case where the history is misleading, and the physical examination cannot be said to clear up the matter. Her colour, her weakness, the vomiting, the absent HCl, and the systolic murmurs are found in cases of gastric carcinoma as well as in pernicious anaemia. We know that in many cases of gastric neoplasm there is no palpable tumour. We depend, therefore, on the blood examination for the diagnosis. Her
red corpuscles number 1,500,000; the haemoglobin percentage is 40, giving a colour index of 40-1.3. Her leucocytes number only 2,000, 30 blood plates, too, are diminished, and the stained films are typical of pernicious anaemia. Our difficulty disappears as soon as we know about the blood. But this case illustrates another feature of pernicious anaemia. On several occasions she seemed to labour under imaginary grievances, but these did not seem of much importance. But a few nights ago, when the House Physician was making his visit, this good lady suddenly got up and attacked him with her teeth. The hand of an absent leg and the intervention of the nurse averted a tragedy, and the patient's excitement soon settled down. Her mental condition is, however, not by any means normal. For instance, she tells us that her husband stood all last night outside her window without being allowed to come in, a remarkable feat of devotion, as we must be some 40 feet from the ground up here. With a little encouragement she will readily discuss a number of other defusions.

**CASE OF CARDIAC DISEASE SIMULATING PERNICIOUS ANAEMIA.**

I wish you just to look at this case. You notice a marked pallor and a very sallow look, which is a little suggestive of pernicious anaemia. She, too, came in suffering from an attack of gastric derangement, and there was marked breathlessness. She is anaemic. Her red cell count is just over three millions, and curiously enough in the first field I looked at in the stained film I saw a normoblast. Her colour index, however, is low and the films are in no way suggestive of pernicious anaemia, while if you examine her heart you will find ample evidence of a chronic valvular disease to account for all her symptoms.

**CASE OF PERNICIOUS ANAEMIA WITH SEVERE RESPIRATORY COMPLICATIONS AND NEURITIS.**

Our next case is a married woman, aged 71. She came in complaining of pain and tingling in her fingers and toes, and the diagnosis made outside was neuritis. This is quite correct, but it is not the whole truth. She has a comfortable home. She has brought up a large family, and has had no previous illnesses of importance.

Her present illness began about two years ago, when she suddenly felt numbness in the toes of the left foot. A similar sensation alternating with tingling began in the other foot and in both hands, and has persisted till the present time. The hands and feet then became painful. A variety of remedies were tried, but failed to give relief, and she was recommended to come to hospital.

We find the patient to be only fairly well nourished. She is bright and intelligent. She had all her teeth removed over six years ago. The tongue is clean. There are no signs of dyspepsia. The bowels tend to be confined, but have been kept regular by the use of cascara. There were no special symptoms referable to the circulatory system, but as you now see she is suffering from a considerable amount of dyspnoea, so that she has to be propped up in bed. This is accounted for by the fact that a few days ago she began to suffer from an attack of subacute bronchitis, with a good deal of spasm. This was accompanied by an attack of pleurisy. The left side, which is fortunately subsiding without any defusion. She is now free from pain and is not afraid to breathe freely, consequently you will be able to hear friction very easily as well as ronchi due to the bronchitis. We are particularly pleased that improvement is taking place, because the respiratory complications of pernicious anaemia are very formidable. Many cases die from attacks of broncho-pneumonia, and pleuritic attacks often go on to defusion and empyema. A closer investigation of the nervous system shows little. By way of one has already indicated. The symptoms are mainly subjective, but there is impaired sensibility to touch in both feet and hands. Now, here is a case which was sent in as a neuritis, and which would readily have been diagnosed as a neuritis by anyone. This type of neuritis—numbness and tingling with little objective evidence is, however, fairly common in pernicious anaemia.

Anyone seeing the case for the first time now might readily be excused for ascribing the symptoms to the worst condition and overlooking the blood condition altogether.

The anaemia is certainly not very severe. The red corpuscles number 3,000,000, the haemoglobin percentage is 68, giving a colour index of 1.1. Films show a definite macrocytosis with a considerable diversity in size. We have never seen nucleated red cells of any kind. The leucocytes number only 4,000 in spite of the inflammatory complications in the chest. As regards the blood you note that I did not mention poikiloctyosis. As a matter of fact it is hardly noticeable, and this is in keeping with what we find in the chronic and less acute cases. Poikiloctyosis may be extreme in the acute cases, but in the chronic cases it is seldom seen. I know you will find a contrary statement in many text-books, but I think that is an error. There is anisocytosis which gives an irregular appearance to the films, and this is put down to poikiloctyosis. In fact, I have often been led to a diagnosis of pernicious anaemia by the absence of poikiloctyosis in relation to the haemoglobin percentage. If one finds a haemoglobin percentage of, say, 60, and finds but slight poikiloctyosis one has reached a point strongly in favour of a diagnosis of pernicious anaemia. In any other anaemia with a haemoglobin percentage of only 40 poikiloctyosis would be extreme. Then as to the absence of nucleated red cells, one can seldom reckon on finding them when the count is above half a million, and even in much more severe cases in old people they are by no means numerous. But here we have two important diagnostics, high colour index and macrocytosis.

**CASE OF BRIGHT'S DISEASE WITH ANAEMIA.**

Now I want you just to look at the patient in the next bed. Pallor is extreme. Indeed, of all the cases in the ward I think most of us would say that this one shows the most intense pallor. Yet she is by no means the most anaemic, and her anaemia is not of the most serious type. She has 3,400,000 red corpuscles and 50 per cent. of haemoglobin. This gives a colour index of only 0.75. The case is therefore one of secondary anaemia, and is due to subacute nephritis. I show you this case because many mistakes are made between these two conditions, and in both directions. One has frequently seen cases with albuminuria labelled nephritis when the underlying condition was really pernicious anaemia. A great many cases of pernicious anaemia die of uraemia.
CASE OF PERNICIOUS ANÆMIA SIMULATING ADDISON’S DISEASE.

I wish now to refer to a case which I have seen outside in consultation. I am sorry he is not here to show you. Patient was a man, aged 55, who complained of great muscular weakness, particularly of being easily tired, and of some breathlessness. On examining him I found little except some indication of a slightly shrunk lung at one apex. The most striking feature of the case was a remarkable pigmentation, chiefly affecting the abdomen and to a less extent the thorax. I was told that the weakness had lasted for some years, and that it had been ascribed to pernicious anæmia. The blood showed the following:—Red corpuscles, 3,650,000; hemoglobin, 60 per cent.; colour index, 0.83; leucocytes, 7,200. Films showed very little. Here was a puzzle. The pigmentation suggested Addison’s disease, and there seemed to be an old tuberculosis focus in the lung which was in keeping with the possibility of tuberculosis affecting the suprarenal capsules. The blood was not distinctive of pernicious anæmia. On the other hand, the pigmentation had not the typical distribution of Addison’s disease, and the opinion of the consultant who had seen the patient in England was not to be taken lightly. The matter could not be decided at the time, but I saw the patient five months later. The count had then fallen to 500,000, the hemoglobin to 30 per cent., and the colour index had risen to 1.5. In stained films the picture of pernicious anæmia was distinct. Pigmentation is moderately common in pernicious anæmia, especially when patients have been taking arsenic, but it may occur before any arsenic has been prescribed.

CASE OF PERNICIOUS ANÆMIA SIMULATING ACUTE YELLOW ATROPHY OF THE LIVER.

This woman was aged 33. Her history is given in a letter from her doctor, who tells us that the patient gave birth to twins three weeks ago. During the pregnancy she complained of pain in the region of the liver. The labour was not severe, and there was no unusual loss of blood. Ever since, however, she has looked exceedingly anaemic. Once or twice she has had haematemeses. Latterly there has been incontinence of urine and faeces. The pulse has been between 120 and 130, and she has complained of pain in the right costal region. She has been rapidly losing weight.

You notice the intense pallor of her lips. There is a yellow colour of the skin and a slight icteric tinge in her conjunctive. The patient looks ill-nourished and anxious. The temperature is 96°. The tongue is very dry and coated with a sticky brown fur. The mouth is so dry that she can only speak with difficulty. There is some abdominal distension, so that the liver dullness is diminished. There are hemic murmurs, and the pulse is rapid and feeble. Respirations are rapid, short and laboured. The alæ nasi move with respiration, but there are no physical signs of disease in the chest. The patient is dull and apathetic, and the pupils are widely dilated. She gives the impression that she is suffering from an intense toxæmia. There has been no evidence of any septic mischief in connection with the uterus. These symptoms gave rise to the suspicion that she might be suffering from acute yellow atrophy, but the jaundice is not nearly intense enough for that.

The red corpuscles number one million. The hemoglobin percentage is 22, colour index therefore 1.1. The leucocytes number 12,000. The blood picture is typical and megaloblasts are very numerous. She has been treated by transfusion and by stimulants, but I fear that prognosis is very grave. (The patient died two days later.) One cannot resist the conclusion that in these puerperal cases there is some special toxin which attacks the bone marrow. The increase in the number of leucocytes is nearly always present in these cases, and indicates the presence of an acute toxin. The prognosis is very serious, but if the patient can be tied over the acute onset, I think that the ultimate prognosis is much better than in the ordinary case. At any rate I know of two cases at least where the patients were very ill indeed during the puerperium, where the blood picture was a most alarming mixture of megaloblastic anæmia and leucocytosis, and where life was almost despaired of, and yet recovery took place, and there has never been any relapse, although several years have elapsed. Perhaps a word of caution is necessary here. Severe secondary anæmia is not very uncommon in the puerperium. This may be due to sepsis, and however unpopular such a diagnosis may be with the practitioner, it may be very important to the patient, since it must be met by vigorous antiseptic treatment. The colour index is less than 1. When nucleated red cells are present they are almost entirely normoblasts until near the end in the fatal cases. Poikilocytosis and polychromasia may be marked features, but the average size of the corpuscles is not increased.

In conclusion, pernicious anæmia is a disease which must be looked for. The diagnosis may be obvious, but on the other hand a large number of symptoms—vague ill-health, chronic dyspepsia, cardiac debility, pigmentation of the skin, changes in the urine, neurasthenia, neuritis, spinal sclerosis, mental derangement and a host of others may be due to the same condition.

NOTE.—A Clinical Lecture by a well-known teacher appears in each number of this Journal. The lecture for next week will be by M. Castaigne, M.D., Physician to the Beaujon Hospital. Subject: "Bronchial Dilatation."

ORIGINAL PAPERS.

AN INQUIRY INTO A DEATH AFTER TWO INTRAVENOUS INJECTIONS OF SALVARSAN

By Dr. F. J. WALDO,
H.M. Coroner for the City of London and Southwark.
Reported by J. S. WARRACK, M.A., M.D.,
D.P.II., Barrister-at-Law.

On March 20th, 1914, and on adjournment to April 3rd, 1914, Dr. F. J. Waldo held an inquest touching the death of S. W. White.

Mr. F. D. White identified the body as that of his son, S. W. White. Deceased was aged 23, and in good health up to a year ago, when he was treated by his doctor for "abcess in the passage of the appendix, and later of the penis. Deceased was under treatment for nine months. Six months ago he had a "breaking out on the skin," and a
month ago a “breaking out on the mouth.” Deceased stated to witness that he had not had sexual intercourse for some time. A doctor advised him to go to St. Mary’s Hospital for inoculation treatment, and deceased went there three weeks ago. Deceased had two injections there, at an interval of ten days between them. Two days subsequent to the second injection on March 10th, deceased returned to business. On March 11th, he was looking white and shaky, but clear mentally. When he came out of hospital after the second injection he looked “pale and shaky” and had head pains, had vomited in hospital, could not take his food and felt generally unwell. Witness subsequently saw deceased in Guy’s Hospital on March 13th, unconscious. Deceased died on March 14th.

Arthur Turner, a clerk to deceased’s employers, deposed that deceased on March 13th, as he came into the office, had fallen down three steps and grazed his arm. Witness was instructed to take deceased to a local doctor. When the taxicab was in Lombard Street, deceased started shaking, and his hands went up and down. Witness thought deceased was in fits. Witness subsequently saw deceased by removal to Guy’s Hospital. Witness and the constable took deceased there. Deceased was admitted.

P.C. Haswell corroborated last witness, and stated in addition that deceased was unconscious, his eyes were fixed and staring, he was foaming at the mouth, and there was a slight stain like blood on it.

Dr. F. G. Richards, a house physician at Guy’s Hospital, deposed. Witness first saw deceased on Friday afternoon about 1.30 p.m. Deceased was delirious. There was blood-stained froth on the mouth, the tongue not bitten, no vomiting; pupils widely dilated, both equally; at first reacted very little to light. Deceased’s limbs were moving about, and there were convulsions. Witness subsequently obtained information from St. Mary’s Hospital about two intravenous injections of salvarsan, .6 gramme each time, as treatment for syphilis.

Cerebro-spinal fluid was let out by lumbar puncture. This fluid was examined. It was clear, and the result of the examination indicated that suppurative and tubercular meningitis could be excluded. The fluid, however, gave the Wassermann reaction. Cerebro-spinal fluid to the amount of three-quarters of a pint was removed at about two-hourly intervals, in large quantities, with relief to the symptoms that had occurred in the interval. Patient died at 3 p.m. on Saturday afternoon, March 14th. A post-mortem examination was made by Dr. Herbert French at which witness and his colleague, Dr. Berry, were present. The post-mortem examination showed no marks of violence, but a puncture wound at the bend of the left elbow. The heart was healthy. There were three or four petechial haemorrhages beneath the pericardium. There was no pneumonia or pleurisy, but multiple diffuse haemorrhages beneath the pleura and in the mediastinum, blood-stained mucus in the tubes. There were numerous submucous haemorrhages in the oesophagus, but none in duodenum, jejunum, ileum, or large intestine. The stomach was opened and preserved, but the contents were lost. There was blood-stained fluid in it. The liver and gall-bladder were normal, as also the kidney and ureters, and suprarenal bodies. The spleen was a little enlarged.

The brain showed an extreme degree of bright red injection of vessels in pia arachnoidea. The grey matter was also pinkish from hyperemia. There were no meningitis and no haemorrhages.

There was a very tiny scar on the penis, not directly pointing to syphilis. There was no syphilitic lesion in any part of the internal organs, nor any external evidence whatever of syphilis noticed.

Witness was of opinion that there were certain risks attaching to the treatment of salvarsan, which was an arsenical compound, and killed the special germ which exists in cases of syphilis.

There was danger in the way of giving it. Everything had to be done aseptically, and patients being treated by it should be kept in bed. From witness’s knowledge of the symptoms, and the appearances post-mortem, he considered deceased died from arsenic poisoning due to treatment by salvarsan. The congestion of the brain, and the haemorrhages found in the pleura and pericardium, were consistent with poisoning by arsenic. They had only had this one case at their hospital.

Dr. P. H. Bell, clinical assistant at Guy’s Hospital, deposed that he was present throughout the post-mortem examination, and agreed with what last witness had said. The fluid in the stomach was altered blood.

By the jury: Syphilis could not of itself cause the condition found or noticed in the brain. The condition was that usually found in cases of salvarsan poisoning.

Dr. G. H. Garlick, Resident Medical Officer to the Inoculation Department at St. Mary’s Hospital, deposed that he had been five months in that position. He had been told to write to deceased’s family to come for treatment. Dr. Fleming, of his department, did the Wassermann reaction. It was positive. A negative reaction did not always mean “no syphilis.”

Witness made the first injection of .6 gramme of salvarsan into the vein of deceased on February 28th. There was no contraindication. Deceased was kept two nights in the hospital. He left quite well, and witness directed him to come again, which he did, on March 10th. The same amount was then injected, and deceased was kept in one night, and directed to come a third time in ten days. Witness next heard deceased was in Guy’s Hospital. He had heard the evidence already given, and considered that the salvarsan had acted as a poison and been the chief factor in deceased’s death. From what he had read and heard, he considered that the signs found post mortem were consistent with poisoning by salvarsan.

Witness was of opinion that the new treatment for syphilis was very efficacious, and more quick than mercury, and exists under no risk. There was a risk in treatment by salvarsan. Neo-salvarsan was considered by them in their hospital to be more toxic in its effects, and not so efficacious. He would personally tell his patients there was some little risk. He could not say if deceased were told, but he had asked Dr. Fleming, who said it was his habit and custom to warn patients of the risks before injections.

By the jury: He had examined deceased himself, and had satisfied himself that deceased’s kidneys were normal.

The Coroner adjourned the inquest, in order that a chemical examination of the viscera might be made, till April 3rd, 1914.
Dr. F. Womack, of St. Bartholomew's Hospital, deposed to having received two jars containing viscera for chemical analysis. One jar contained a portion of the liver, one kidney, and the spleen. In the other were the stomach and a portion of the small intestine.

It would have been desirable to have had the stomach contents and he would have liked portions of many organs, but owing to the intravenous method of administration there would be less arsenic in the stomach than in the glandular organs. Some arsenic would be excreted by the stomach, and some by the liver and kidneys.

He had duly examined the viscera sent for analysis in this case. The liver contained 28 parts per million of arsenic, or a total quantity in that organ (taking the weight as 55 0zs.) of 0.71 grain. The spleen contained only 0.0072 grain. The two kidneys contained 0.014 grain. The blood which had exuded from these viscera into the bottle in which they were contained showed nine parts per million of arsenic. There were traces of arsenic in the stomach, membrane and intestine. He concluded that in the interval between the second injection and death, a good deal of the arsenic had been eliminated by the kidneys, more than half, less by the liver and stomach. In his opinion the cause of death was acute arsenical poisoning resulting from the injections of the organic compound known as salvarsan.

There had been very few deaths from salvarsan poisoning in England, but many more abroad. There was a close accord of the symptoms in this case with those recorded in available literature. This case was the first of the kind witness had had to deal with as analyst. He should say there had been 150 fatal cases since the end of 1910, when the drug was introduced, throughout the whole world. The majority of deaths were due not to arsenical poisoning, but to maladministration, or bad technique. There had been extremely few cases in England. Arsenic was a very potent drug, and very toxic, and there seemed to be an idiosyncrasy—an unusual susceptibility to the drug—which some people showed. Witness thought this case was undoubtedly one of idiosyncrasy. The non-poisonous character was probably due to non-solubility in the blood in some; in others the solubility in the blood was greater. In the latter cases the abnormality of the blood, this special susceptibility was not to be anticipated. Thus the effect would be that of an overdose.

There were two theories: (1) Ehrlich, Spirilla killed in the blood set free endotoxins. (2) Major Gibbard, A special susceptibility to the drug.

There had been cases with symptoms similar to this one, such as cloudiness of mind, and indistinctness of speech. These cases usually occurred after the second injection. Arsenic was a cumulative poison, and the drug was not completely eliminated from the system before the second injection was given. There might be more sensitiveness to the second injection.

Neo-salvarsan was given at St. Bartholomew's Hospital almost invariably. It was as efficient and efficacious, more soluble. It could be given more concentrated. It was less dangerous, troublesome, and took less time. There had been 750 cases there without any death, or any untoward symptoms.

Ehrlich had mentioned 10,000 cases, with four deaths and three of these were in a very serious state and likely to die apart from arsenic.

The salvarsan treatment was efficacious, but he believed the new treatment was more efficacious, and had almost replaced salvarsan. Witness did not think 0.6 gramme an overdose. This was an ordinary dose, unless contra-indicated by symptoms such as in the kidneys.

Mercurial treatment was carried on afterwards, nine or ten repetitions spread over more than three months. This treatment was largely given in the Army and Navy.

The probability was that deceased had four grains in his body. In the organic compound the arsenic was less toxic than in arsenious oxide. The lethal dose of arsenious oxide by the mouth he had known to be 2 grs. only.

If arsenic was taken by the mouth into the stomach, the effects were mostly found in that organ and in the intestine. When administered intravenously, petechie and hemorrhages would be found.

Serious symptoms would appear a day or two after the second injection, such as paralysis, mental symptoms, indistinct speech, sweats, vomiting, fits, and might resemble meningitis. It was most important that the salvarsan should not be dissolved more than the minimum amount of time. It underwent oxidation. It should be made up immediately before use. And as to the technique, the distilled water and salt solution must be used quite fresh and the salt be chemically pure sodium chloride. Certain special skill was required in the administration and by qualified medical men only.

Witness agreed with the Coroner that the operator at first should have some more skilled person present. The treatment was expensive, and the Wassermann test should be performed beforehand.

Witness had read the depositions and thought that death was due to an unforeseen accident. He considered the injections were given in a skilful and proper way.

Salvarsan was a patent. It contained 30 per cent. of arsenic, which was the poisonous element. Benzol was also a constituent.

In reply to Dr. Richards, who asked whether witness thought that arsenic as arsenic, or that salvarsan as salvarsan caused death, witness replied that he attributed death to the organic compound rather than to the arsenic, but in chemical analysis only arsenic was recovered by the chemical tests. Salvarsan was one of the most valuable medical discoveries in recent years.

The medical witnesses agreed that death was due to the poisonous effects of the compound salvarsan rather than to the arsenic.

The learned Coroner, in summing up, recapitulated the evidence, pointing out to the jury that they had to determine how deceased came by his death. They might have to decide as to whether there was any neglect by some person or persons, but there was clearly no evidence of negligence. The drug was a useful one. There were no contra-indications to its administration. It was given in a very careful and skilful manner by an experienced medical man.

A verdict of death by misadventure from acute poisoning consequent on two intravenous administrations of the compound known as salvarsan was returned, the jury adding that the salvarsan...
was skilfully given, and that deceased was properly treated at St. Mary’s and Guy’s Hospitals

LITTLE’S DISEASE AND ITS SURGICAL TREATMENT.

By M. Savariaud, M.D.,

Surgon to the Trousseau Hospital, Paris.

[Specially reported for this Journal.]

By the term “Little’s disease,” or, rather, “Little’s syndrome,” we generally understand a congenital form of spasmodic paralysis especially prone to attack the lower limbs, in other words, paraplegia, associated with spasm and contracture present at birth. It may happen, as with so many other congenital affections, that the symptoms are not very striking at birth; indeed, it is rare that the diagnosis can be made at that stage, since the newly-born, especially those born before time, are normally rather stiff. It is only after a time that the mother or the nurse is struck by the third member being the one that troubles entailing in dressing and washing the infant.

The rigidity is most marked in the lower limbs, which are contracted either in extension or flexion. But always in adduction, so that the two limbs cross each other. If we try to separate them the infant resists and screams. As a rule the child cannot sit up since it is “all one piece.”

The disease may be limited to the lower limbs, but in some instances the upper limbs are affected, usually one more so than the other. The forearms are bent at a right angle, the elbows brought close to the trunk, the hands in forced pronation, the fingers more or less distorted and unable to grasp anything. The child “speaks through the nose” and is barely intelligible. There may be squint and disturbances of deglutition. The contracted muscles are also paralysed, though there, as a rule, more contracture than paralysis, but the contrary is sometimes met with.

It is met with in every degree of severity, according to the extent and severity of the paralysis and the degree of cerebral involvement. The mildest form of the disease is characterised by mere difficulty of walking due to contracture of the muscles of flexion and adduction. The little patients hop along on their toes, with the knees slightly bent and knocking against each other in walking, the active limb describing a segment of a circle round the other limb. In these cases the upper limbs and the intellect are unaffected.

In a second degree walking may still be possible, but it is difficult, and one arm is usually affected. In the third degree walking and the erect position are impossible, and sitting is only practicable by the aid of sundry devices, as for instance strapping the trunk to the back of the chair. In the fourth degree both the upper and lower limbs are paralysed and contracted, and the sufferers are quite impotent, being unable to feed themselves or to hold a pen, and intelligence is at a very low level. In the fifth degree the victims are nothing more than paralytic idiots, and the congenital contracture plays quite a subordinate part in the clinical picture.

The prognosis varies greatly according to the extent and the severity of the lesions. In a certain number of cases the contractures diminish to some extent, constituting an improvement or even spontaneous recovery. Other cases remain stationary or gradually become worse. The less the intelligence is affected the greater the hope of improvement.

The pathogenesis of the disease is still ill-understood. There is reason to believe that it is not unique, and that among the patients who display Little’s syndrome we ought to deduct a certain number of cases of Little’s disease, properly so called.

Little’s disease, properly so called, is characterised by premature birth, rigidity of the limbs, and spontaneous improvement. This affection seems to be consequent upon arrested development of the spinal cord, more particularly to delay in the myelinisation of the pyramidal tract. This variety, however, is very rare, indeed its existence is denied by some.

Alongside this type of Little’s disease are innumerable forms of spasmodic paralysis, more or less congenital, due to cerebro-spinal lesions consequent upon a laborious confinement. The obstetrical traumaism acts by compression, constriction and asphyxia, giving rise to cortical haemorrhages followed by sclerosis and secondary degeneration of the pyramidal tracts. Syphilis and alcoholism on the part of the parents play a predisposing role.

We now come to the treatment of these subjects, and inter alia the question arises, What can surgery do for them? From this point of view our division of the cases into several categories comes in useful. Let us commence by discarding the really desperate cases and the very mild cases, and then we will see what can be done for the others.

Desperate Cases.—The degree of contraction and the multiplicity of the lesions do not render treatment difficult, but what really makes the case hopeless is not so much the state of the limbs as that of the brain. With a normal or approximately normal brain we are entitled to hope much; with a greatly damaged brain it is better to hold our hands.

Very Mild Cases.—Here is a child whose only trouble is that he has a rather hopping gait, his weight only bearing on the anterior heel. Now such the tenotomy of the tendo Achillis is here all that is required to restore equilibrium.

Medium Cases.—These are more difficult cases. The patients walk only with the greatest difficulty, propping themselves up by leaning on the furniture, or indeed they may not be able to walk at all. The legs are crossed in bed and are permanently displaced, the knee is bent, the feet are in varus equinus or valgus, in short no normal prop is available.

In such cases the first thing to be done is to straighten the limbs in order to provide a normal prop. Certain tenotomies or muscle elongations will be necessary, after which the limbs are maintained in hyper-correction for six or seven weeks. In the lower limb, for instance, we shall perform tenotomy of the tendo Achillis elongation or tenotomy of the hamstrings and adductors and of the tendons inserted on the iliac spine. The patient is then placed in a plaster apparatus for a couple of months or so with the legs well separated in extension and external rotation and the feet in hyper-extension.

If, after this operation, the feet still tend to become deviated, the tendency must be overcome by transplantation of tendons. When the limbs are in good position it remains for us to train the patient in the movements required for
walking. We may commence by making him execute simple movements in bed—raising the limbs, flexion, &c. Then he is put on his feet and encouraged to try to walk, movement by movement, the weight of the body being supported by assistants or parallel bars.

Two things may now happen. In the first the spasm may be slight, or at any rate not extreme, and with time one may hope that it will diminish. In this event all we have to do is to continue the course of training with all necessary gentleness and patience.

In the other case we find that the spasmodicity and contracture are such that we make no headway. If this be so, rather than give up the case, we should be justified in performing Forier's operation, which aims at diminishing the reactivity of the spinal cord by dividing a certain number of the sensory roots of the lumbar and sacral nerves \((L_1L_2L_3)\) inside the sheath of dura mater. No doubt this is a big undertaking, but it is so effectual that we must not hesitate to have recourse thereto in a case in which it is worth while. For that matter the gravity of the intervention may be reduced by attacking the nerves of the cauda equinus where they come off opposite the lumbar enlargement. This greatly simplifies the operation. I performed this operation on a child of seven in whom all the ordinary modes of treatment had failed, and the improvement, which so far had been nil, on account of the excessive reactivity of the cord, made rapid progress after the operation. The spasmodicity of course did not entirely disappear, but it did so to the extent of at least three quarters forthwith, and has gone on diminishing since. A year has now elapsed since the operation, and thanks to tonomoties, transplantation of tendons and patient re-education, the patient is beginning to walk, very imperfectly no doubt, but still in an encouraging way. By holding on to articles of furniture he can find his way round the room. For a normal child this would not be anything to be proud of, but it is a great deal for a child who had never left his bed.

I hold that Forier's operation has been of the greatest benefit, and that in presence of such a terrible disease we must be satisfied with having accomplished thus much.

**FIVE CASES OF STRANGLATED HERNIA IN INFANTS, WITH AN ACCOUNT OF A RAPID AND EFFICIENT SURGICAL PROCEDURE.**

By JOSEPH BOYD BARRETT, M.D., B.Cr., Assistant Surgeon, Children's Hospital, Temple Street, Dublin.

I have adopted, and intend to practise, a procedure for the cure of strangulated hernia in infants, which differs considerably from the ordinary routine operation. In brief, I think it is wise and quite unnecessary to isolate and ligature the delicate sac of a hernia in an infant, a procedure which must involve injury to the delicate spermatic cord. Further, the suturing of the external oblique fibres forming the external ring is also omitted. It is only necessary to define the internal oblique and conjointed tendon and to suture both to Poupard's ligament, and then carefully to approximate the skin, preferably by sub-cuticular silk-worn gut. This can be done very rapidly.

The operation has certain merits. It is a neat operation; it involves no injury to the cord; there is no mauling of the tissues. The presence or absence of the sac, and the suturing, or not, of the thin and weak fibres of the external oblique have no influence on the return of the hernia. If the internal oblique and conjointed tendon are properly sutured with medium silk sutures to Poupard's ligament the hernia cannot reappear. The cure is a permanent and radical one. The neatness and quickness of the operation is in the utmost advantage to the child. There is no post-operative shock and no possibility of damage to the cord or testicle.

What happens to the sac? I believe it disappears. When one remembers that the tunica vaginalis is patent at birth and communicates with the peritoneal cavity of the abdomen, there is no reason to expect that an empty sac will persist, and the opening made is it for the reduction of the intestine prevents the accumulation of fluid.

It may be argued that when one has a finger in the sac it is very little trouble to "wipe off" with a sponge the coverings and the spermatic cord. This is not denied. It is not a matter of difficulty, but it is unnecessary and must involve, however carefully accomplished, some injury to the cord. That it does so, even in cases that are not strangulated, is evident from the edema of the testicle which so often follows this procedure in children. It is the most tedious part of the operation. It is dangerous to do it quickly. It involves waste of precious time. It is of no advantage.

The aetiology and treatment of strangulated hernia in infants are very cursorily dealt with in the text-books. It is usually stated that they differ in no matter of importance from similar conditions in adults. There are, however, many differences:

1. Strangulation in children usually occurs in large hernias. In adults the opposite is almost the rule, except in elderly subjects with large scrotal or umbilical herniae.

2. Hernias in infants never contain omentum. The omentum in a child is small, and its fat contents quite insignificant and without bulk. (It is owing to the small size of the omentum in young children, and its inability to wall off an abscess that appendicitis in children demands immediate treatment.)

3. Adhesions in the sac in a child are extremely rare. I have only once seen adhesions, and they occurred in a remarkable case of congenital hernia on the left side, in which I found the appendix attached by two bands to the left testicle. It must not be inferred from this that manipulation may be used indiscriminately in attempts to reduce a strangulated hernia in an infant. Such a procedure usually results in the formation of hematoma in the bowel wall; and, further, owing to the rapid filling of the sac of a strangulated hernia in an infant with serum, haemorrhage may be expected in reducing the contents. If, then fluctuation is present, manipulation can only do harm; an operation is imperative. In none of the cases under my care was it possible to reduce the intestinal contents until the internal ring was enlarged.

4. In infants and young children all inguinal herniae are oblique. A direct hernia is an impossibility. This is of the utmost importance to remember when brought to deal with a strangu-
lated hernia in an infant, because the internal ring must be opened in an outward direction. (This is best done by a Lane’s scissors.) There cannot be a direct hernia in infancy because the inguinal canal has no length. The external and internal rings are superimposed, almost completely. As the pelvis widens the rings separate until the adult proportions are reached. When the two abdominal openings are almost superimposed, a hernia must pass through both. This being so, the internal ring may be divided in an outward direction without fear of wounding the deep epigastric artery.

(5) The necessity for immediate operation and the importance of a rapid and neat operation. These are only comparative differences from the treatment of strangulation in adults. They are, however, worthy of emphasis. An immediate operation is necessary in order to avoid the possibility of having to resect a gangrenous portion of intestine, a proceeding usually attended with fatal results in infancy. The importance of a neat and rapid operation is greater in children owing to the danger of post-operative shock, a condition easy to avoid but difficult to treat.

(6) There are two points worthy of consideration as regards the skin incision—the position of the incision and the suturing of it.

The incision should be kept as high as possible. This is best accomplished by having the external half of Poupart’s ligament and the internal half horizontal above the level of the iliac spine. It well repays to take the utmost care with the suturing of the skin wound. It is vain to rely on dressings to keep the wound clean, and owing to the habits of infants the edges of the wound should be approximated with the greatest care. If this be done and the incision be made at a high level the chances of rapid healing are increased.

The ages of the cases under my care varied from six months to one and a half years. They all recovered from the operations without any post-operative shock. In one case, the hernia recurred in an infant of 1 year, act. 11, who had developed strangulation when suffering from a circumcision which had become septic. The hernia wound became infected, and I had subsequently to remove the deep sutures. The child is now quite well and an operation will be done later for radical cure.

The hernias were all of the acquired variety. (Congenital hernias form a very small proportion—89%—of hernias in children.) They were all large in size, and contained small intestine. The duration of strangulation could not be accurately determined in each case. One gave a history of eight hours, another of twelve, and another of twenty-four hours. In no case was the canal gangrenous; nor did the constricted portions give any cause for alarm when examined. The normal appearance of the bowel, apart from haematomata which had developed, rapidly returned when doused with hot saline.

The duration of the operations from the time of the first incision varied only with the delay in douching. The shortest time was nine minutes, and the longest fifteen minutes. The operations were performed in the Children’s Hospital, Temple Street, Dublin, and I am indebted to Dr. M. F. O’Hea and Dr. P. T. O’Farrell for their able assistance in most of the cases. The anaesthetic used in every case was ether given on an open mask.

In order to shorten the time of the operation, the anesthesia is not begun until everything and everyone is in readiness, even the needles being threaded. The first portion of the operation, up to the examination and return of the intestine, does not differ from that usually performed for adults, with the exception of the method of enlarging the internal ring.

When the bowel is returned, the internal oblique and conjointed tendon, and Poupart’s ligament are rapidly defined by blunt dissection. A good portion of muscular belly is then united to the full depth of Poupart’s ligament, over the sac and its coverings, by usually three medium silk sutures. The skin edges are then rapidly and carefully approximated by fine silkworm gut (preferably a sub-cuticular suture) and the operation is complete.

This operation can be done very rapidly and neatly, and is quite sufficient. The tedious and unnecessary portions of the ordinary operation are omitted. The external oblique in an infant is composed of very feeble and delicate fibres. Their approximation is superfluous. They have no strength, and can offer no resistance.

The sac in an infant is an extremely delicate membrane. The ligaturing of the sac is of no avail if the conjointed tendon is not united to Poupart’s ligament. If the latter structures are carefully approximated the sac may be left; for, if no hernia can possibly return, and, furthermore, by this method there can be no damage to the cord or testicle, the shock which is attributed to manipulation of the cord is avoided, and there is a valuable saving of time. This simple operation does not exhaust the patient, and if it prove as efficient as I confidently anticipate, I may perhaps be pardoned for recommending it for trial.

OPERATING THEATRES.

HAMPSTEAD GENERAL HOSPITAL.

FRACTURED SKULL.—Mr. Jackson Clarke operated on a female child, act. 2, who had fallen out of its mother’s arms at the top of a staircase, falling at the bottom of the flight on to its head. When the patient reached the hospital she was conscious, and had paralysis of the right hand and forearm. There was a haematoma-like swelling crossing the vertex from ear to ear, and on palpating this a fissure in the skull was felt.

The child was anaesthetised, and an incision made corresponding with the extent of the swelling. This revealed a fracture of both parietal bones, and went to a quantity of blood and a considerable amount of brain matter in small floculi, the dura mater being torn in the whole extent of the fracture. The latter was quite half an inch in width, and it expanded and contracted with the respiratory movements of the child. Two drill holes were made, one on either side of the fracture, and a silver wire passed and twisted; this brought the bones into firm apposition. The skin wound was then closed.

The patient recovered from the anaesthetic and made an uneventful recovery. In the course of the four weeks following the operation the paralysis of the right hand and forearm gradually diminished. This improvement has continued up to the present time, some eight months after the operation, the child using its right hand freely, but the grasp is still slightly weaker than that of the left side. Mr. Clarke said that he estimated the amount of brain lost was fully half an ounce, most of it appearing to come from the left parietal lobe. It remained to be seen, he
pointed out, whether any subsequent trouble in the form of Jacksonian epilepsy would ensue. The child is being kept under observation.

The relation of the TUVNOMIUM.—The same surgeon operated on a middle-aged man, who, on alighting from an omnibus, was knocked down by a rapidly moving car, which passed over his body. On reaching the hospital he was found by the House Surgeon, Mr. G. B. Truter, to have a wide separation between the two public bones in front, and also a wide separation at the left sacro-ilac synchondrosis. The general condition of the patient was good, there being no shock. Evidence of extravasation of urine rapidly appeared, and deep large superficial fascia of the abdomen and into the datorious tissue of the scrotum, the latter becoming swollen and dark-red in colour. A five-inch median incision was made, the lower end being just above the root of the penis. The testicle of the left rectus muscle was found to be detached near its insertion; the tendon of the right rectus was partly torn, and both conjointed tendons were also torn from their attachments. A rubber catheter was passed fairly easily into the bladder. The bladder was incised and explored and found to be intact. A hole was then drilled through each public bone, and a very stout silver wire was passed, and this was drawn taut and twisted, bringing the two public bones into close apposition. A rubber catheter was tied in, and a large rubber drain placed in the bladder wound. The incision was then closed except around the bladder tube and also where the silver wire protruded, this last being left long. A second incision was made into the lower part of the scrotum. The patient rallied well from the operation, his pulse being good throughout. An aspiration syphon was introduced into the bladder tube, and by this means the bladder was kept empty. After six days the larger tube was removed. The smaller one of the syphon apparatus being left in the bladder.

Mr. Clarke said that it was evident that there was rupture of the membranous urethra in this case, and it was not clear how the bladder drainage could be discontinued: for this he would allow at least fourteen days. When the bladder wound was healed and the urethra working well, the steel wire would be either cut short at the surface of the rubber bougie, or it would be pulled out and the bone, it would be removed entirely. As to the sacro-ilac synchondrosis, if any weakness should remain there, Mr. Clarke contemplated uniting the bones by one or two large screws at a later date.

TRANSACTIONS OF SOCIETIES.

THE NEW LONDON DERMATOLOGICAL SOCIETY.

MEETING HELD THURSDAY, JUNE 11TH, 1914.

MR. T. P. BEDDIES, F.R.C.S., IN THE CHAIR.

DR. H. C. SAMUEL showed (1) case for diagnosis. The patient, a middle-aged man, came two hours ago with an eruption of papular nodules and papules, some of which were aggregated on the neck. There were discrete lesions of similar nature on the face and forearms, and a semi-papular one on the leg. He considered it a drug eruption, possibly iodide, though there was no history of that having been taken nor was any found in his urine, which had just been tested. He had been recently having medicine from his doctor, and which had a bitter taste. It had come out too suddenly for it to be a phthisis. He had not yet learned the result of the Wassermann test. It might be a toxic erythema.

He next ventured to give a positive diagnosis, that of a drug eruption was largely favoured. (2) CASE OF BROOCH'S PARAPSYRIOSIS EN FLAGE. He said Brooch originally described the condition as "erythrodermie disseminée pityriasis."); it was very resistant to treatment. This patient, a man, had had the condition four years. One could see some sharply defined macular oval patches, somewhat resembling seborrhoea and slightly scaly with no infiltration. Anti-seborrhoeic treatment had no effect on the lesions. Sometimes these cases were referred to as cases of pityriasis persistenta of Crocker. This case differed from those hitherto described in that pruritus was marked. The patient was being treated chiefly for the intense itching, and X-rays seemed to have benefited the pruritus. The patient had been treated with wide-spread X-rays for, what the speaker thought might be a pemphigoid condition, but there was no infiltration and the sections did not show evidence of premorcyosis; there was only dilatation of the endothelial bloodvessels. The Kromayer lamp (mercury vapour) had been tried, but had been found rather loosely. The case shown to-day was only one variety of the condition. The cases which had a chronic resistant scaly erythrodemia and did not respond to treatment had been grouped together and, following Broc, had been called parapsoriasis. But some distinction should be made. What were the lesions of parapsoriasis understood to be? He thought they were the very chronic lesions which resembled either seborrhoea dermatitis, pityriasis, pityriasis rosea, or the pre-mycotic stage of mycosis fungoides, or a fading lichen planus. This present case much resembled seborrhoeic eczema, but there were some cases of pityriasis lichenoides which might not decide whether the condition were lichen planus or psoriasis. The Kromayer lamp was used here not so much with the idea of attacking the parapsoriasis itself, but in order to control the intense pruritus which, he said, had been, was such a marked feature in this particular case.

DR. G. W. SEQUEIRA said he had seen many cases of parapsoriasis, but it was the first he had seen in which there was much itching. He would defer his diagnosis for the time being, being an early stage of mycosis fungoides had to be considered.

DR. J. GALEBRAITH said parapsoriasis usually itch, more or less, which it had, and it had reacted well to X-rays—hal a pastille dose once a fortnight, or a full pastille once a month, repeated three or four times if necessary. Sections of parapsoriasis showed thinning of the prickle layer, and a characteristic feature was the almost absence of the inter-papillary processes and the stretching out of the papillae to form a wavy line with the epidermis.

DR. W. J. MIDELTON said the case of interest to him because of the treatment—i.e., the profound laminae Kromayer administered by the patient. It had been thought by some that there was some specific action exerted by the ultra-violet rays, but he regarded it from the standpoint of the hyperemia caused thereby. Enough was not yet known as to the exact mechanism of action into which it was when hyperemia was produced, but the most people acknowledged its benefits, whether produced by a mustard plaster, or by a lamp costing £25.

DR. J. D. P. MCLATCHIE showed a case of pityriasis rosea in a well-developed young man.

DR. SAMUEL said he thought all would agree that the condition was pityriasis rosea, with which the distribution corresponded. This distribution, he considered, must be determined by the vest, or other article of clothing that was worn, and he had often noted its association with pityriasis capitis. This patient said he had always a "scaly head." Usually it was said not to have any connection with seborrhoea.

DR. C. G. MACK (for DR. Vinarce) showed a case of recurrent alopecia, on both occasions in connection with licea tonsurans.

DR. SAMUEL did not doubt the diagnosis, but thought it was not impossible that the alopecia might have been caused by the licea. The patient had, last week, when three young sisters came up. One had a typical lesion, due to the eczothrix. The second sister had ordinary ringworm, also due to eczothrix. The third sister had a patch of clinical alopecia areata, but in view of the other cases which were observed, it was made, and one stump was found which, on treatment with potash, revealed typical eczothrix.

DR. GALEBRAITH said he did not think there was any connection between ringworm and alopecia, but in all
The case one would find the acne bacillus, though sometimes in the hand form in children it is absent. Some cases had, in his hands, responded remarkably well to vaccines when ordinary treatment had failed. Excluding the cases in which a nervous lesion could be involved, there were, in the year when it was traced in all cases of alopecia with the acne bacillus, none, in respect to the present case, recurrences were common.

Dr. SECHEK, some years ago, he showed a connection at the late Sir Jonathan Hutchinson clinic of typical alopecia areata, and Sir Jonathan said there was no doubt that the wife caught the condition from the husband, probably through leaning back in the same chair. There were no signs of tinea; it was evidence of alopecia areata.

Dr. NORMAN MACHEN showed (for Dr. Alfred Eddowes) (1)

A CASE OF GUMMATA OF BOTH ALÆ NASI

in a female, aged 50. Before coming under his care the patient had been treated by X-rays, probably under the mistaken idea of the antisyphilitic treatment, and it did not yield to the X-rays. There was no indication of tubercle. But the treatment had been rather short for such improvement in tubercle—namely, a month's treatment with mercury and iodide. Treatment of rectal syphilis by suppositories was a good method, the average dose being 15 grs. of mercury a day.

(2) A case of eczematous impetigo—or chronic staphylococcal impetigo—in a gardener. The condition began as a small abscess which had been punctured. Such cases appeared to be common this year.

Dr. GALBRAITH said the case might be called an eczema in the ordinary sense, but it seemed to be a pyogenic infection. It was likely that staphylococcus was the causal organism. It was the kind of chronic eczema in which a vaccine seemed to act like magic; half-a-dozen injections or so of an autogenous vaccine would probably clear it up. Locally he would use only a mild antiseptic ointment, such as weak ammoniated mercury.

(3) Case of Lupus erythematosus of the face in a girl, aged 13 years, of three years' duration. He diagnosed the condition which should be called central atrophy. She also suffered from chilblains during cold weather. When a persistent lesion for over a year occurred on the face, whether of a child or an adult, and it looked seborrhoeic, one had to be careful about calling it eczema. The child's father died of phthisis.

SPECIAL REPORTS.

ROYAL COMMISSION ON VENEREAL DISEASES.

At the forty-third meeting of the Royal Commission on Venereal Diseases evidence was given by Dr. J. J. Pringle, physician in charge of the skin department of Middlesex Hospital and president of the Dermatological Section of the Royal Society of Medicine. He stated that of 36,451 cases of skin disease dealt with in the out-patient department of the Middlesex Hospital during the last 25 years, 1,853, or rather over 5 per cent., presented indubitable evidence of syphilis. He did not represent the number of patients who had attended the hospital for syphilitic manifestations, but only those who had been referred to the special department as suffering from some affection of the skin. Of the 1,853 cases of syphilis, 945 were males and 908 females. Dr. Pringle thought that this apparent equality of incidence in the two sexes was due to the fact that men do not willingly attend hospitals during working hours, except for diseases which in their opinion threaten life or cause grave discomfort or pain. On the other hand, anything causing disfigurement impelled women to seek medical advice. Of the 1,853 cases of syphilis already mentioned, nearly 24 per cent. were foreigners.

Dr. Pringle stated that he could not see his way to support or advocate any measure of compulsory notification of venereal disease. The medical profession was, he thought, practically unanimously opposed to it, and even if it made confidential its effects, the public would be merely to drive them to seek treatment from unqualified persons.

Experiences both in hospital and private practice convinced him that much of the prevalence of syphilis in England was of foreign importation. He believed that a considerable number of prostitutes left their own countries because they were unable to ply their trade there, and came over to England and spread the disease in this country. It was important that this matter should be further investigated and that steps should be taken to deal with it.

THE CARE OF CHILDREN UNDER SCHOOL AGE.

The last of three lectures given under the Chaddock Trust was delivered at Leeds Town Hall on Saturday, June 27th, by Dr. Joseph Cates, Medical Officer of Health, St. Helens, who outlined a comprehensive scheme of public health reform. He said that there were already far too many agencies attempting to deal with the health of the community. Efficiency, economy and public comfort demanded that all matters directly relating to public health should be administered and controlled by one central department acting through the councils of the counties and county boroughs. Health authorities would then for the first time be in a position to grapple with the beginnings of the matter, instead of being in a position to afford assistance to those who were already too ill to be helped. It was essential, therefore, that public health authorities should be able to provide adequate centres to be established throughout the country by public health authorities. To these centres expectant mothers would come for help and advice, and, in order that a knowledge of suitable cases might be obtained, midwives should be required to notify to the medical officer of health their engagement to attend an expectant mother.

The pre-natal benefit provided by the National Insurance Act would be replaced by an adequate grant to every mother coming within a certain income limit, and the administration of the benefit should be carried out by the health authorities. In conjunction with the scheme of public health, pre-maternity and lying-in wards for patients, married or otherwise, were required to require institutional treatment. Infant consultations and baby clinics were urgently needed for the examination and treatment of children under school age. The lecturer said that where the home circumstances were unfavourable or the mother was industrially employed, the crèche, and later on the nursery school, would train and protect the growing child.

Referring to the establishment of municipal milk depots, Dr. Cates emphasised the advantages to be gained from the use of dried milk. The experience of Leicester has shown that it was easily digested, less liable to contamination in the home, economical in use, and could be extensively employed with the most successful results.

Alluding to the difficulty encountered in obtaining early treatment of disease, the lecturer said that it was high time that the medical benefits of the National Insurance Act were extended to the majority of insured persons, and the scope of the benefits were made to include the treatment of conditions such as decayed teeth and defective vision. The prevalence of venereal disease, its importance to public health, and the tremendous expenditure incurred in the maintenance of lunatics, demanded that by a vigorous campaign local health authorities should attempt to eradicate the disease. Free facilities should be provided for diagnosis and effective and prompt treatment.
CORRESPONDENCE.

FROM OUR SPECIAL CORRESPONDENTS ABROAD.

FRANCE.

Paris, June 27th, 1914.

FORMS OF MENTAL ANOREXIA.

Anorexia is less a malady than a syndrome, common to several affections. Its clinical forms are diverse.

HYSTERICAL ANOREXIA.

The most frequent form, described years ago by Gull under the name of hysterical anorexia, is anorexia observed in young girls having in their ascendants some mental disturbance (alcoholism, phobia, mental depression, etc.) These subjects present no signs, physical or mental, of hysteria. Unlike their companions, they are grave, object to noisy amusements, are listless, religious, and sometimes mystic; they appear to be older than their age, and, at the moment of puberty, are observed to be sickly, their intellectual faculties diminish and are incapable of any effect even to mastication. At the same time they complain of painful sensations in the epigastrium, although the region is not tender to pressure.

Outwardly these patients present particular characters, the skin is dry, the nails brittle, the hair falls. To this may be added a change in the disposition, which becomes irritable with intermittent attacks of despair, and in exaggerated cases, with ideas of suicide.

The prognosis of this condition is grave. Relapses are frequent, and in some cases the patient falls into a chronic state that may terminate in death.

NEUROSYMPHETIC ANOREXIA.

Anorexia can be met with in certain neurasthenic patients who from infection or grief producing dyspeptic troubles, diminish progressively their food and study the diverse sensations of their stomach. They make up a regular phobia of food and put themselves on the most reduced diet, they lose several pounds in weight, but are easily cured by isolation and psychotherapy.

HYPochondriac ANOREXIA.

In a superior degree, young nervous subjects with some hereditary affection as to charge and disposition; they renounce the company of their friends, seek solitude and pass their time in complete inactivity. They restrain eating because they have lost taste for everything. No happiness exists for them, they have no desire to speak, nor to eat or do anything. This condition may last for months and be succeeded by a form of depressive mania with intermittent attacks of agitation.

ANOREXIA OF EARLY DEMENTIA.

Fear of being poisoned, intoxication for some imaginary fault, fear of eating dangerous microbes, of catching the pretended malady of the person who prepares their food, are among the chief causes observed in persons suffering from mania.

Anorexia resulting from the different mental conditions described, says Dr. Feuillette, is about the same in every case. The consequent emaciation provokes the same cachexia with pallor of the skin, falling of the hair, congestion of the extremities, obatinate constipation, and all the signs accompanying accentuated denutrition. The menses are suppressed and frequently signs of tuberculosis are observed. On this point it would be interesting to know if tuberculosis is the cause or the consequence of anorexias. But, however, to suppose that the organism of such patients being in a state of denutrition bordering on cachexia, furnishes a favourable soil to the development of tuberculosis.

Anorexia of hysteria can be cured by isolation of the patients; the same treatment applies to persons suffering from neurasthenia and melancholia. But anorexia of hypochondriacs and certain melancholics is modified by the affection it accompanies.

The prognosis of anorexia of dementia is rather grave, the patient opposing to all efforts of the medical attendant and the family an indomitable negativism.

GERMANY.

Berlin, June 27th, 1914.

AMONGST the other subjects discussed at the German Surgical Congress was the SURGICAL TREATMENT OF SUPPURATIVE MENINGITIS, by Hr. Barth, of Danzig. He reported three cases which he had successfully treated by laminectomy of the lumbar vertebral column with drainage of the dural sac. The meningitis was complicated by injury of the spinal cord as regarded origin. Staphylococci, diplococci, and streptococci were all found in the puncture fluid. Puncture had been repeatedly made without effect before the operation was performed. The results of recovery in the suppurative meningitis were clearly not so bad as was generally believed, if the disease was taken in time, as the affection began apparently as a diffuse process, and it was only later that encapsulations took place between the cerebral convolutions. People had been sceptical as to operation for two reasons, the affection had been considered incurable, as the end stage had always been kept before the eye, just as had been the case in meningitis after operation. It was not to be forgotten, however, that with gradual advance of the disease a gradual power of resistance was developed through growth of leucocytes. Whilst lumbar punctate in meningitis acted as a bactericide this action was needed altogether in normal cerebrospinal fluid. Diagnosis depended on the presence of poly- nuclear leucocytes in the lumbar punctate, the infective bacteria might disappear under the influence of the leucocytes. Operative recovery was about 50 per cent of the special power of operation in the early disease. The recovery did not so much depend on the bacteriological condition, both cases of streptococci and pneumococci were amongst the recoveries.

Lumbar puncture was called for on the first appearance of symptoms of meningitis. Immediate elimination of primary centres of disease, continued lumbar puncture until relief of cerebral pressure was obtained, then if this did not suffice, drainage of the dural sac through one of the lumbar vertebræ. Murphy drained through the posterior fossa above the foramen magnum. There was now no longer any reason why meningitis should not be treated surgically.

Hr. G. Axshein, Berlin, followed with a paper on the ORIGIN OF FREE BODIES IN JOINTS and their RELATION TO ARTHRITIS DEFORMANS.

The speaker considered the König method of origin of these loose bodies in joints, viz., by a reactive dissecting process as in a joint in which there was disease already established, to be proved. The inquiry into the so-called false stages of the bodies had been striking. Injury to a circumscribed part of a joint led to a regular series of symptomology, local and others of a general nature. The local appearances
of a regenerative nature were the cause of the bodies, the general, which we were not yet thoroughly acquainted with, were similar to those we had been in the habit of wrongly calling arthritis deformans. The local symptoms in a case of ossification of all the cartilage into living fibrous cartilage by invasion of adjoining living cartilage, and, secondly, in the resorbing and dissecrating invasion of the changed subchondral marrow (subchondral dissection). If the process prevailed, there was a complete softening of the circumscribed unhealthy portion of the joint where exfoliation followed as the result of mechanical causes. The primary injury to the joint to be a traumatic accident, the mechanics of injury to the knee joint was almost always the knocking together of the cartilage of the patella and that of the lower end of the femur, by force from the front and side-front. That was understandable as it was here in this exposed spot that cartilage rested on cartilage. This also explained the localization of the disease (60 per cent. the anterior femur surface, 30 per cent. the posterior surface of the patella). This led to the original idea explained the frequency of the affection in both places at the same time. The practical conclusions reached by the reader of the paper were the following—

As from experience we knew that the free body regenerated only one of the disease in the joint the removal of a solitary body was not sufficient. Rather wide opening of the joint was indicated in order that all parts of the joint might be examined in which the bodies were likely to be met with, and any of the cartilage that had been softened might be quickly, be removed. It was only in this way that the injurious effect of necrosed particles of cartilage could be avoided. In other forms of traumatic arthritis also the dislocated cartilage was at fault. It was for these reasons, therefore, that arthroscopy was in place more frequently than formerly, both in case of a dissection process with inclusion of bone, which could be identified by the Röntgen rays, and also in case of a dissection process without bone involvement, which was negative, when the symptoms pointed to mischief in the cartilage. Juvenile arthritis deformans of unknown origin also was a masked traumatic arthritis deformans and as such was amenable to treatment. According to the views of Fr. Barth, Danzig, these cases were the results of traumatic, arthritic, and traumatic-arthritic processes. Hr. Goetjes, Cöhn, pointed out the importance of the crucial ligaments in the origination of free bodies; he had seen three cases in which free bodies formed through rent in the cartilage from violent action of the crucial ligaments. As the cause for this injury was generally very slight, a slight false step perhaps was sufficient to set up after a time symptoms of loose bodies in the joint.

AUSTRIA.
Vienna, June 27th, 1914.
The Friedmann Treatment of Tuberculosis, (Concluded from our last issue.)

Is one patient the inoculation was followed—locally—after an interval of 48 days by the bursting through of the contents of the“living medicine chest.” Two guinea-pigs were in a similar state and communicated the fistulous discharge. On the death of those animals, a large mass of caseated mesenteric glands was found to be in the abdomen of one, and in the central region of the liver a number of softened nodules, each of these nodules occupied space. One of these similar size and consistence was also found in the spleen. On the other hand, the autopsy of the second animal yielded negative results only. Microscopic examination of the contents of the discharge demanshoned the presence of slender rods, which had been identified as slightly alcohol-fast characters. The cultures obtained therefrom grew and flourished luxuriantly at the ordinary temperature of the room, but rather feebly when exposed to the incubator. The cultures displayed a greasy, viscid, mucous character, which distinguished them markedly from the dry, crumbling quality and consistence of the cultures of the tubercle bacilli procured from mammals. After obtaining a pure culture, another pair of experimental inoculations were carried out on a guinea-pig, and the other on a rabbit. After an interval of three weeks both animals had elapsed those animals were killed. The body of the guinea-pig displayed an advanced stage of degeneration of the parenchymatous tissues of the organs, with formation of some nodules in the lungs, liver, spleen; that of the rabbit presented nodules of the size of hempseed scattered about through the liver. The microscopic examination of the organs had not been carried out but only to the effect that no definite statement could be made regarding the presence of tubercle bacilli. The results of investigation have so far, accordingly, gone to prove that the remedy is not so innocuous as Friedmann would have us to believe. That it occasion-ally provokes rather disagreeable formations is shown by the nodular deposits which follow injection into the tissues or blood-vessels of animals, and its inoculation on serous surfaces. The clinical observations which had been made in cases of human tuberculosis went collectively to show that the condition was made worse by the administration of the Friedmann remedy. Intravenous injection was followed by the production of profound mischief in the parenchymatous organs, which had lasted for months, and had even involved the most minute lesions. In this account it is, of course, most desirable that everyone who has for this purpose prepared would be absolutely warned against the danger of its use.

Dr. W. Budinger described four cases—two of tuberculous fistulae, one of cold abscess originating from the spongy, synovial surface of the symphysis, and one case of tuberculous lymphoma of the neck. The first three had been considered by Friedmann but little suitable for the administration of his remedy, but he regarded the lymphoma as a most desirable case for testing its therapeutics. In the case of a 5 years old child, in which origin of the neck was observed to increase considerably in size after the injection had been used, and the general condition of the patient, who had suffered from proloned fever after the administration, has ever since grown worse.

Dr. O. Földner described the cases of five patients with variously localized foci of tuberculous disease, all of which had been injected by Friedmann himself. One of those had been cases of oesophageal tuberculosis with co-existing fistula; one was a case of cold abscess which had originated at a focus of costal caries, and the fifth case was one of renal tuberculous. The ages of the patients who suffered from oesophageal tuberculosis were associated. One was 6 to 10 years old; the other two, one was 36 years old and the other 40. One of the five cases had an intravenous injection administered, and this was followed by intense reaction, accompanied with high fever, rapid pulse, vomiting and diarrhoea. In the cases of the other patients who remained under treatment and observation at the institution for a period of three months, not one presented any other improvement beyond what had been previously experienced by other cases under the other varieties of counter-therapeutical treatment. In not a single instance did any striking improvement occur which could be attributed to the specific influence of the remedy employed. At present date—that is to say, after the lapse of an interval of five months—the operation in the case of oesophageal tuberculosis with discharging fistulae had had no notice therapeutic effect. The purpose of ascertaining whether any reaction would be manifested in the co-existing tuberculous lymphatic glands of the neck, these were eripated after an interval of three months had elapsed after the date of the injection. In the case of ren tuberculosis, in which nephropathy had been carried out five weeks previously on account of peritrophritic tissue thickening and transitory insufficiency of the other kidney, the infiltrate had been reabsorbed
CORRESPONDENCE.

Dr. Thaddaus Majewski reports that during the past few months 49 syphilitic patients were treated in the dermatological section of the K.K. Garrison Hospital, Lemberg, according to the regime of the merlusin cure. Of that number, 17 had undergone previous treatment. The other 32 were cured of recurrence of the disease after previous treatment. In carrying out the merlusin therapeutics, pastilles of this remedy were administered three times daily, always after meals. All acid foods were rigidly excluded. The preparative regime was maintained during a period of from four to six weeks. During this interval many of the patients increased notably in body-weight. Symptoms of intoxication or other specially unfavorable manifestations were never observed. In some of the cases the previous curricular courses ofunction and injection had produced ulceration and detachment of the tissues of the gums and aggravated examples of mercurial stomatitis, to such extent as to demand immediate cessation of treatment. Every one of those was found to tolerate the merlusin cure without the least inconvenience. The external manifestations of syphilis (initial sciereses, indolent bunoes, nucous and cutaneous patches, condylomata lata, laryngitis, etc.), were submitted simultaneously to appropriate local treatment.

As in the case of every other anti-lictic remedy that has hitherto been tried, the adoption of the merlusin cure has not—on account of the very various degrees of lesion—always been accompanied by correspondingly satisfactory results in all cases. But the external syphilitic lesions attained to complete healing in every one of the cases submitted to the merlusin cure, and secured this result more rapidly and satisfactorily without the use of any other external or internal treatment.

The result of the Wassermann reaction from positive to negative was always established, either immediately after the completion of the cure, or after a short interval had elapsed.

A record so strikingly successful testifies to the possession of energetic curative properties by this new remedy. Besides, a specially favourable item of testimony is afforded by the fact that in the various degrees of success which it has hitherto obtained, and of permanency of results secured, have proved immeasurably superior to those achieved by any of the long list of other mercurial preparations that have hitherto been employed. Thus the claim has been definitely established that in merlusin we have found a remedy which is at the same time energetic, perfectly innocuous and without any disagreeable properties or after-effects.

HUNGARY.

Budapest, June 27th, 1914.

THE ACTION OF MOUNTAIN CLIMATE ON EXUDATIVE DIATHESIS.

Dr. Dalmary practises at Ta'trafured (height about that of St. Moritz in Switzerland), and he states that the climate there has a remarkable action on the Exudative Diathesis, and especially on one of its principal manifestations, bronchial asthma. The general health improves, the blood-picture shows marked benefit, and the nervous system gains tone. It is a familiar fact, he says, that the constitutional diseases are much rarer among the inhabitants of mountain districts than elsewhere, and when they occur they are of a milder type. Of forty 11 patients with bronchial asthma, brought up into the mountains as the last resort after failure of all other measures, had no further attacks. Only two of them had a mild recurrence in the first two weeks after an intercurrent severe cold. But on return to the lowlands, all asthma recurred within 6 days and yielded so readily during a second sojourn in the mountains. His experience confirms the necessity for making the most of the first stay, lengthening it out to a year if possible. The task is to transform the exudative diathesis of bronchial asthma, as this cannot be done in two or three weeks. It requires a year at least. Further treatments should be made for outgrowing the tendency in children. Eight of his forty asthma children had obliterative eczema, and four of these frequently had fleeting urticaria. All were extremely nervous children; three had convulsions and spasms—all that confirms the assumption of the under-lying diathesis.

TRAIAna in the etiology of cancer.

Andriska reviews ten cases in which cancer developed at the point of a trauma, and a claim was made for industrial insurance money. In only a few of the cases was a causal connection probable. In one case the trauma was a fracture of the femur at a point which proved to be already the site of a sarcoma, and the limb was exarticulated—the trauma in this case revealed the malignant disease long before it would otherwise have been detected. In the case of a man of 74 who fell against the lumbar region a sarcoma gradually developed in the right kidney, and the kidney was removed the fourth month, but the patient succumbed to metastasis nine months after the accident. An insurance claim was made, but the death was being regarded as the result of the injury, but this was accepted in only one of the other cases.

ON ACUTE AND CHRONIC INTESTINAL CATARRH IN CHILDREN.

Dr. Aufricht remarks that the diarrhoeas of children are the daily bread of the general practitioner, and declares that the practical wisdom of children to "flour-soup" (brown flour with butter and water to make a soup) after a day of restriction to tea alone, is what often transforms a harmless acute enteritis into a chronic catarrh. He is convinced that excessive carbohydrate fermentation is the primary cause of severe dyspeptic disturbances, both in infants and older children. The physiologically weak intestine of the infant and the intestine of the older child, after it has been weakened by severe disease, behave alike in respect of carbohydrates. Boyau says that at all ages starch, bread, milk, and all carbohydrates entail most readily intestinal catarrh, as the starch waste in the bowel putrefies so easily. Aufricht also strikes milk from the diet in the diarrhoeas of children for at least a week after the stools are normal once more. The albuminous type of food with fat, but very little carbohydrates, should be the main reliance. The food should all be put through a hair sieve for infants, through an ordinary sieve for children. He allows by the second day two tablespoonfuls of white cheese with a slice of white bread, mixed with a little warm saccharin water and put through a sieve; the third day bouillon with one or two tablespoonfuls of boiled or raw meat, all sieved. By the fourth day he permits addition of two tablespoonfuls of spinach or turnip, with a banana. The above is the diet for a child of four or five; it represents about 1,204 calories, which is not much below the normal ration of 1,380 calories for a child of this age, but the proportion of carbohydrates is scarcely a tenth of that in the ordinary ration. In his extensive experience this albuminous type of diet has proved its usefulness in acute cases and is far superior to the "flour-soup" diet in the subacute and chronic cases. He has never known it to fail to date.

Mr. Francis Vacher, F.R.C.S., M.R.C.P., of 5, Carns Road, Birkenhead, Cheshire, late Medical Officer of Health for Cheshire, left estate of the gross value of £39,839.
CONTINENTAL HEALTH RESORTS.

SWITZERLAND.

The Queen Alexandra Sanatorium at Davos Platz.
The Queen Alexandra Sanatorium at Davos Platz, Switzerland, is situated 4000ft. above the town, and gets at that elevation a maximum of sunshine. The attractions of Davos and the unique value of the climate are sufficiently appreciated in England. Situated as it is in a beautiful mountain valley 5000ft. above sea level, it offers to the invalid suffering from pulmonary disease, a dry, breathing climate with the purest of pure air. The valley enjoys a temperate, still atmosphere, particularly in winter, being almost completely sheltered from wind; and the long hours of sunshine render the cure attractive and pleasant both in summer and winter, so much of the invalid's time being spent in the open air. It is not generally known that the climate of Davos affords not only a winter cure for consumption, but a summer alpine cure as well; whilst the summer heat is never oppressive.
The Queen Alexandra Sanatorium is a self-supporting benevolent institution, built by public subscription for the benefit of English-speaking subjects. The fees are extremely moderate, being only £2 25s. weekly, and include board, residence and medical attendance. Every patient has a private room with balcony facing south. To those who wish to combine this cure with an altitude cure with modern sanitary improvements and under English management, this Sanatorium is strongly recommended.

FROM OUR SPECIAL CORRESPONDENTS AT HOME.

SCOTLAND.

EDINBURGH.

The Chairman of the Scottish Insurance Commissioners (who was knighted the other day) addressed the Scottish National Conference of Friendly Societies at Stirling on June 20th, on the possibilities of the Insurance Act in the future. He said that contributions had been very fully paid, and that there had been little or no evasion; the Scottish Fund at present was over five million pounds, and he hoped that they had paid in nearly £2 million pounds, leaving for investment a reserve of £1 million. Nearly £12,000 a week was paid out in sickness benefit, £3,000 in maternity benefit, and £12,000 in medical care. He discounted all stories of the impending bankruptcy of some societies; societies which only took selected lives were over-insured and would have surpluses; those which did not take such good lives were under-insured, and probably would have deficits. All this, however, was provided for in the Act, one of the most valuable provisions of which was that ensuring the solvency of the societies. Levies were unpopular, but all that would happen was that the societies which had a deficit would not be able to pay as much instead of 10s. per week until their affairs righted. That was not bankruptcy, but merely temporary adjustment. As regards women, no purely Scottish women's society had an adverse experience, although it was admitted that the new laws had brought harm. All the same sickness in women, and the figures pointed generally to the health of women, especially married women, not being so good as that of men. There was a case for examining whether the contributions paid by women were high enough. From the point of view of the approved societies he questioned whether many of the claims relating to pregnancy which had been paid ought to have been paid at all. If, however, it was urged that the health of the women was the nation's care, he would be loath to make suitable provision. He thought that complaints against the societies for non-payment were quite groundless; most on the other hand had paid out money, if anything, too freely. The complaints as regards doctors had not been numerous so as far as actual attendance was concerned, but there had been many vague complaints of laxity in certification. This applied only to a minority of doctors, and there had been the greatest difficulty in getting the societies to substantiate the complaints. The present attitude of the Commissioners was that they were meeting the doctors in every way, explaining the position, urging co-operation in securing efficient administration. He thought they were getting this through the doctors themselves, through the panel committees, and through the General Medical Council. The opposite proposal that it be distributed in proportion to the length of the doctors' lists was also rejected. The final decision was to divide equally—carried by 29 votes to 11.

CLINICAL TEACHING IN EDINBURGH.

Arrangements have now been made which will have the effect of systematising the clinical instruction given in Edinburgh. The scheme is rather complicated, but its general principle is to divide the students in their last year into three sections, and to send each section in turn for one week to a particular hospital, and to prevent overcrowding in any one term. In former years, when the special subjects were to a certain extent optional—e.g., when a man might take either diseases of children, ear and throat diseases, or dermatology, the whole number who attended these classes to be taken in the summer, the result being that they were unduly crowded, especially that on diseases of children. Now that they have been made compulsory, some method is necessary whereby the whole resources of each department should be utilised throughout three terms, instead of being partially neglected in one or two terms. As matters now stand, Section A, for example, will be compelled to attend ear and throat diseases from October to December, diseases of children from January to March, and dermatology from May to July. Another advantage is that on the new plan each section will have more time than hitherto for each subject, which is especially important in connection with diseases of children, for the time allotted to this subject has in the past proved quite inadequate. The way in which the new scheme has been worked out reflects the greatest credit on all concerned, and particular thanks are due to the Dean of the Faculty, Professor Harvey Littlejohn, for the wholehearted way in which he has thrown himself into the work of resolving conflicting interests and producing a harmonious scheme.

GLASGOW.

Sanatorium Treatment Cut Short.
As a result of a deficiency of funds, the patients in the sanatoria of Ayr Burgh Insurance Committee are to be brought home, although the letter which the Clerk, in reply to one sent by the Clerk, stated that the Commissioners would not be prepared to advance more than the proportion of funds applicable to each quarterly period, and suggested the exercise of exercising caution in extending the amount of sanatorium benefit. At a meeting of the Committee, the Clerk stated that if they went on spending as they were doing at present, his estimate would be exceeded by about £900 at the end of the quarter. Mr. Corrigan moved the approval of the sub-committee's recommendation that the patients should be brought home. He knew that the proposal on the face of it looked
CORRESPONDENCE.

LETTERS TO THE EDITOR.

We do not hold ourselves responsible for the opinions expressed by our Correspondents.

THE GENERAL MEDICAL COUNCIL AND "THE FAMILY ENCYCLOPEDIA."

To the Editor of THE MEDICAL PRESS and CIRCULAR.

Sir,—I am your obedient servant, on this subject in the MEDICAL PRESS and CIRCULAR for June 24th, page 624, you say, and quite truly, that the advertisement of the names and professional titles of a number of medical men with a popular medical work constituted an outrage upon the established methods and traditions of the medical profession. You did not, however, attach any blame more serious than that of "inadver tence" to Sir Clifford Allbutt, and inferentially to the other inadvertisers. In this respect you stand condemned as guilty of neglect of duty. As I am one of those, I trust you will allow me a few lines to say that even the blame of "inadvertence" can hardly be attributed to me. The only inadvertence of which I have been guilty, if inadvertence it can be called, was that of giving to a young man who had studied at St. Bartholomew's Hospital the assistance which he wished, without ever dreaming that he would misquote my name, and without therefore calling upon him beforehand for a guarantee that he would not do anything out of which I might be supposed to have been offended. The statement that the men whose names were advertised in connection with the "Ency clopedia" revised the proofs of that work is certainly untrue in regard to myself, and to some others whom I have asked to look into the matter with regard to that advertisement. Riddle told me that he was writing a book, and that one section of this was on alcoholism. He asked me to look over his article and see that he had made no mistakes, as he was anxious that anything he published should be correct and that it should do no harm. I answered his request, and looked over his typewritten copy. I thought no more of the subject until I saw my name advertised along with a number of others in the Daily Mail of February 26th. A few hours after my attention was directed to this, I received a telegram from Dr. Riddle to this effect:—"Have been ill past week. Amazed at gross advertising of names in connection with my book. Have wired publishers to cease immediately. Please accept this apology."

This letter was followed on March 3rd by the following letter:—

"Dear Sir Lauder Brunt—, I trust that you will believe that I am as much upset as you yourself must be at the manner in which in my absence (ill for 3 days) your name has been advertised in connection with my 'Family Encyclopedia of Medicine.' I have written the following letter to the Lancet and British Medical Journal, which I trust will, at any rate, show your own complete ignorance of the manner in which your name was to be blazoned abroad:—

To the Editors of the Lancet and British Medical Journal.

Dear Sir,—I wish to express my regret that the publishers of my "Family Encyclopedia of Medicine," in an excess of zeal to make all due acknowledgement of the assistance a large number of my friends and acquaintances in the profession have given me in the way of correcting and revising special articles in the book, have advertised their names in a manner most contrary to the ethics of the profession. It is necessarily severe for me to say that both my medical and nonmedical friends who have been thus advertised were quite unaware that their names were to be advertised in this fashion. I have also taken steps to prevent that in the future when drawing up advertisements for the "Family Encyclopedia of Medicine," the publishers will have due regard for the ethics of the medical profession.

Yours faithfully.

[Signature]

Hugh A. RIDDLE.

The President and Censors of the College of Physicians and the Central Ethical Committee of the British Medical Association demanded an explanation of the appearance of my name in the advertisements. I forwarded them the letter and telegram which I received from Dr. Riddle, and the letter and telegram which Dr. Riddle received from me.
have quoted above in order to show that the advertise-
ments were entirely without my knowledge or consent. These bodies accepted the engagement; and I trust, Sir, that you and your readers will regard them as sufficient to free me from any blame—even that of "inadvertence."

I am, Sir, yours truly,

LAUDER BRUNTON.

London.
June 26th, 1914.

THE "FAMILY ENCYCLOPEDIA OF MEDICINE."

To the Editor of The Medical Press and Circular.

SIR,—In to-day's issue of your journal under the heading "The General Medical Council and the Family Encyclopaedia," you suggest that the Council abstained from taking action against the contributors to the Encyclopaedia because one of its members happened to be in that position, while you further say that the Council "brought the full weight of its ponderous displeasure upon an unhappy panel practitioner whose renegade society's officer lacks the slightest basis of foundation in fact and should be withdrawn. I do not wish to mention the names again, but I will refer to the cases in the order in which they were brought before the Council by the British Medical Association, and the Council would have laid itself open to a serious complaint had it refused to allow the questions involved to be duly enquired into, but not one of the cases affords the slightest foundation for your statement that the Council brought the full weight of its "ponderous displeasure" upon any one of the persons brought before it.

I am, Sir, yours truly,

ROBERT SAUNDBY.

Birmingham.
June 24th, 1914.

The paragraph referred to by Dr. Saundby expressly denied any possibility of the kind as regards Sir Clifford Allbutt. The high character of that gentleman is too well known to admit of any such misinterpre-
tation. If our paragraph be taken to indicate any such belief, we take this opportunity of expressing in the strongest way our regret that it may have been open to any such construction. At the same time Dr. Saundby, in a "Popular Encyclopaedia of Medicine" of the names, titles and professional appointments of a number of medical men constitutes an astounding reversal of medical tradition. That being so, the more illusory, the same necessity is the rehabilitation in the eyes of the profession generally. That can be done either by legal process or by express and explicit letters to the medical journals. As to the other point mentioned by Dr. Saundby, a reference to our original paragraph will show that the word used is the "displeasure" of the Council. We fancy that Dr. Saundby's letter supplies abundant proof of his interpretation. After several months and public apologies are surely sufficient; and if the displeasure, apart from the mere fact of costs of proceedings and mental distress caused by summons before the Council. The British Medical Association, which was responsible for the second presence on that occasion, has issued a strong declaration on the subject of dealing with professional subjects in lay publications—but that is another matter.—ED. M.P. and C.]

OPEN SPACES AND PUBLIC POLICY.

To the Editor of The Medical Press and Circular.

SIR,—My card enclosed will show you that I bear a well-known medical name. My interest in your profession and science is thus accounted for. It leads me to read every week one or other of the medical journals that I find on my club table. To-day I have lighted on your issue of June 24th containing the letter by Dr. Fletcher Little under the above heading. The main fact of the situation does not seem to be recognised by Dr. Fletcher Little. This fact is that the overwhelming mass of the present generation of Britons are absolutely devoid of the smallest modicum of feeling for natural beauty and for art, Members of Parliament, including both Houses, merely sample the general public. If they gave any thought worth mentioning to the welfare of the nation, they would play a larger part in the preservation of our heritage. Our public parks are examples of brutal philistinism of which Dr. Fletcher Little gives only one example out of thousands would be impossible. Dr. Fletcher Little and his friends will discover the inability of the present public, a large proportion of London Members to act with vigour born of personal feeling in the question of Regent's Park, and in arousing even a languid feeling in any part of the House. I believe that the artistic sense has been driven out of public thinking. In a recent century of industrial development the intellect of the people has been almost completely absorbed in the wielding and directing of new mechanical power—steam and electricity—and in gathering the wealth it has produced. Has any local public authority throughout the land constantly offers illustrations of these facts; and the same phenomena are observable in what ought to be our most enlightened bodies of the Metropolis, and in the Government itself. The destruction in Regent's Park of the beautiful buildings and monuments of a great age, a score to be followed by more scores of similar incidents during the development of the national estate of which the Park forms a portion. From Trafalgar Square by Pall Mall, through Waterloo Place and Regent Street to the end of Regent's Park, the beauty of the buildings are now falling, together with Regent's Park, into the hands of the Government. The estate might have been made into a line of thoroughfares superior in architectural beauty to anything in Paris or in Western Europe. The buildings are being allowed of a height detrimental to architectural beauty, and which must prove injurious to health in excluding sunshine and impeding the movement of air. The architects are being given a free hand to carry out their own designs, as if, in the opinion of the Council, the public would be better served. It is, of course, all done by the steel framework within; but it forms the negation of beauty. No people with any feeling for beauty could allow for one day in the very centre of the capital of the Empire the existence of that queer jumble of uninteresting caricatures of architecture and art formed by Trafalgar Square; nor could they have allowed the pitiable modelled made at the entrance to the Mall—a muddle contributed to by two of the chief municipal architects, as well as to the Government itself. London, with its misty atmosphere, which veils so much ugliness, is developing magnificent vistas.
but it is all accidental and not with design or any sacrifice to art. On the other hand, Paris, although open to much criticism, is beautiful because her people will to have it so. As a straw is enough to show the way of the wind, one characteristic of the nation may be enough to show the direction in which it is really marching. A great part of national effort during the past century has represented hurtful movement merely, not true progress, albeit constantly misinterpreted for it. The question is, can people be gradually moving to a higher plane of civilization when devoid of the ideals that express themselves in the cult and care of beauty in nature and art—this question is surely worth the study of the physician and of all men who, to them, are vitally compelled to be students of sociology in general and of the evolution of our modern society in particular.

I am, Sir, yours truly,

AN ARCHITECT.

June 29th, 1914.

REVIEWS.

HELIOTHERAPY TREATMENT.

To the Editor of The Medical Press and Circular.

Sir,—I have been using the sun rays in the treatment of disease for twenty years, especially tuberculous disease, and have employed them in hundreds, if not thousands, of cases referred to in your issue for June 17th, stated that "the cure of tuberculous disease by sunlight is a new science. Of course, English physicians have not the advertisement drum to advertise it. Only a majority treatment like our Continental colleagues and we have not the Alpine altitude, rarefied air and abundance of winter sun, but we have many places where the curative effect of sunlight can be carried out without going to the Alps for it. It cannot be a very new treatment when I have advocated it for such a long period, and I must confess my attention was called to it by reading an account of such treatment by the Romans. I therefore first applied it in some cases of old chronic indolent ulcers and afterwards to tuberculous disease. I reported a very satisfactory case of tuberculous laryngitis recently in a contemporary, where daily exposure of the throat to sunlight formed part of the cure. Of recent years I have employed magnifying glasses to concentrate the rays on a definite spot, and at the present time the Surgical Manufacturing Co. are devising me an instrument to hold the different size glasses, in various positions, so that the cure can be carried on by the patient, or by the nurse or attendant. I hope to submit it for your expert opinion later on.

I am, Sir, yours truly,

THOMAS DUTTON, M.D.

London.

June 26th, 1914.

OBITUARY.

DR. F. T. PORTER NEWELL, DUBLIN.

We announce with much regret the death of Dr. Frank Thorpe Porter Newell, F.R.C.S.I., of Dublin, who died last Wednesday after a tedious illness, at the age of 53. Newell was a graduate in arts and medicine of Trinity College, Dublin, since 1881, and a Fellow of the Royal College of Surgeons in Ireland since 1882. For the past few years he had been a member of the Council of the College. In his young days he was apprenticed to the late Sir George Porter, and was a student of the Meath Hospital. He was subsequently House Surgeon of the Meath Hospital for no less than seven years. On leaving the Hospital he was appointed Dispensary Medical Officer of one of the Poor-law districts of the city, and he held that position up to his death. During the past three years he took an active interest in the questions that have arisen for the profession under the National Insurance Act, and he was one of the most energetic members of the local Medical Committee of the county borough of Dublin. He was also a member of the Irish Medical Committee. As a member of the Council of the Royal College of Surgeons he kept that body closely in touch with the problems that affect the general practitioner, and the loss of his influence in this way will be felt. Dr. Newell was personally somewhat reserved in manner, but to those who knew him he was the most loyal and trustworthy of friends. The energy and business ability which he brought to bear on the work of the profession in regard to the Insurance Act were something of a surprise to those who did not know him well.

Some months ago he developed a tumour in the neck. Operation gave only temporary relief, and for the past two months he bore his illness with exemplary courage and patience.

DR. J. A. KEAY, OF GREENWICH.

We regret to record the death of Dr. Joseph Hay Keay, who took place on June 17th, at 126 Greenwich Road, S.E. A wise counsellor and a skilful medical practitioner, he will be greatly missed by a great many in Greenwich, which is the poorer by his decease.

Born at Forthom, near Blairgowrie, Perthshire, on November 15th, 1849, the son of Mr. John Keay, farmer, of Over-Forneth. He was educated at Blairgowrie, Perth Academy and Edinburgh University, at which latter seat of learning he graduated M.A. at the age of 18 years, and won many prizes and medals, and was universally esteemed by his fellow students of theology for four years, and became a licentiate of the United Presbyterian Church of Scotland, but turned to medicine and took his M.B.C.M. in 1867 and his M.D. in 1862.

Keay practised first in Crook, Durham, where he married Annie Laura, the eldest daughter of Mr. L. Candler, of East Lodge, Crook. He then proceeded to Blairgowrie, where he practised for seven years. As a member of the School Board, he took much interest in questions of local education. After practising in Colne, Lancashire, for ten years, he came to Greenwich in 1899, where his work on the Greenwich Board of Guardians, and, later, State insurance, took up much of his time. He never spared himself in any of the various fields in which he took an interest. He was an active member of the British Medical Association and frequently represented the Greenwich division at the annual representative meetings. He was a keen student of the various kinds of light of St. Ray's insurance against sickness in operation on the Continent, and took an active part in endeavouring to ally professional anxiety in connection with the introduction of insurance. As the first Chairman of the Western Hospital, he represented the insurance practitioners in London, a post which he was compelled to relinquish owing to his failing strength, and the breakdown in his health was no doubt largely due to his unselfish devotion to the public interest. He bore his long and very painful illness with the fortitude and patience which those who knew him would have expected. All his life he was a loyal and zealous member of the Presbyterian Church, and for several years past he was an elder of St. Mark's Presbyterian Church, Greenwich. He leaves a widow, a son and two daughters. In 1902 Dr. Keay published "The Medical Treatment of Gall-stones," and he was also the author of many pamphlets and articles.

REVIEWS OF BOOKS.

HYPNOTISM AND SUGGESTION. (a)

Much progress has been made in the study of psychotherapy during the six years which have elapsed since the last edition of Dr. Lloyd Tuckey's "Hypnotism and Suggestion." (a) That it has attained the position of a classic in the branch of medicine with

(a) "Treatment by Hypnotism and Suggestion, or Psychotherapeutics," by C. Lloyd Tuckey, M.D., M.A., Member of the Medical Faculty of the University of St. Andrews, Etc., Etc., M.D., D.L., K.S.G., Ordinary Physician to the King in Ireland; Theories of Psychotherapy and J. Roget, M.D., Ph.D., Theories of Psychoanalysis, by Dr. C. L. T. Done, S. A. C. P., pp. 288, 481, London: Bailliere, Tindall and Cox, 1913. Price 10s. 6d. net.

"Treatment by Hypnotism and Suggestion, or Psychotherapeutics," by C. Lloyd Tuckey, M.D., M.A., Member of the Medical Faculty of the University of St. Andrews, Etc., Etc., M.D., D.L., K.S.G., Ordinary Physician to the King in Ireland; Theories of Psychotherapy and J. Roget, M.D., Ph.D., Theories of Psychoanalysis, by Dr. C. L. T. Done, S. A. C. P., pp. 288, 481, London: Bailliere, Tindall and Cox, 1913. Price 10s. 6d. net.
which it deals is acknowledged by those who recognise the value of suggestion as a form of treatment. The influence of the mind over the body is so great and so far-reaching that no practitioner who wishes to establish his reputation in general practice can afford to neglect the study of mental methods and their application to the treatment of functional nervous disorders. In view of the recent report of the Committee upon "Spiritual and Mental Healing," it is somewhat surprising to find that no evidence was given there to the effect that spirituality can add a curative touch to physical treatment. Dr. Tuckey believes that instruction in hypnotism and practice should be given in general hospitals and medical schools as a part of the student's curriculum. It is certain that if the medical profession does not recognise the utility of suggestive methods in suitable cases, the door will be thrown widely open to quackery, for hypnotism affords special scope to charlatanism. A succinct account of Freud's method of psycho-analysis is contributed by Dr. Constance Long, who points out its superiority for enabling us to understand the workings of the human mind. It is when the psycho-neurotic approach of his phobias, obsessions, and hysterical symptoms, that they will disappear. We have every confidence in recommending this work to general practitioners and others interested in the study of psycho-therapy, for in its pages will be found the latest information respecting this engrossing subject.

ANESTHETICS. (a)
It is now almost exactly seven years (July, 1907) since we reviewed in the pages of this journal the fourth edition of Dr. Buxton's book, and it gives us great pleasure to welcome a new edition, with a cordial welcome to that which we gave to the last. The past seven years have been full of fruitful activity in the field of research as regards surgical anaesthesia, and Dr. Buxton gives us on the whole an admirable summary of the results that have been obtained. New methods are described and their value appraised by one, who, though he long used the older methods with a master hand, has not shirked the responsibility of taking the ground of experience. How far the new methods will displacce those formerly in use is as yet impossible to say, but we feel confident that much that is new in anaesthesia has come to stay, and to stay too for the advantage of both patient and operator. We believe, no text-book in the English language that will give the student and practitioner a better knowledge of these new methods, their limitations, and their uses, than Dr. Buxton's book now before us.

EXPLANATORY LECTURES FOR NURSES. (b)
It is quite refreshing to come across a modern work written for nurses that is not too advanced, for although this little book includes teachers as well as nurses, the style is simple and practical. The author believes in the free use of homely comparisons when lecturing to nurses, even though, as everyone who has so lectured knows, there may be a risk of homogeneity. We have endeavoured, in the chapter on the blood, intended for young women of the working-class, we find the following:—"The blood is the carrier of the body. The carrying is rather a continuous one. The blood is set in motion by the heart. The blood is supplied and service and vestry, ask-cart service in what worked to gratify the tastes of the principal agent, Mr. Hemo-globin and for the good of the neighbourhood it serves. It should be said, however, that the greater portion of the blood goes on with a wider range of subjects, contains much practical information, delivered in the lecture-room, which will be found helpful by nurses or by those who have to conduct classes for nurses. An index would have added greatly to the efficiency of this useful little work.

ELECTRO-PATHOLOGY AND THERAPEUTICS. (c)
We are always hearing or reading the statement that over-specialisation is one of the characteristic evils—perhaps the greatest evil—of our present generation, as well as not wholly unimined with good—of this over-worked and over-educated and over-worried generation. We believe the statement so expressed to be nearer representative truth than most of those to which we are accustomed to be treated regarding the present as compared with the past. But if British twentieth-century civilisation presents on one side a specialised aspect, it displays an encyclopedic one on the other—originally prepared and illuminated by the possession of such a book as a universal reference as the "Bibliotheca Britannica," and subsequently nourished by the daily bread of the "penny" newspaper. And this existing arrangement furnishes an opportunity for the development—indeed, is practically implies the existence—of connecting links or rods, of pronounced individuality and power of resistance, which unite the opposed and parallel strata. Such individual bonds and bars have their position a good deal favoured by the inevitable and permanent separation of the latter, which gives the intermediates the opportunity of working simultaneously upon the pabulum supplied by both neighbouring structures. The case before us seems to illustrate and exemplify the point of view which we endeavoured to present. The joint authors of the present work are lay scientific specialists at one extreme aspect of their auto-presentation and medical experts at the other. The wide—and still somewhat weird—domain of electricity leaves even now the most ignorant, and yet the imagination of "the general," and the unsatisfactory results of "anti"-campaigns against some of the most familiar and most deadly diseases furnish a temptingly wide scope for the culture of opportunism—to use a somewhat artistic phrase.

It is useless to attempt to examine in detail the claims here advanced. We can only refer to a specimen brick or two, from which the skilled reader may perhaps be able to form an opinion regarding the stability of the case. For example, we are told that the temperature of double pneumonia where the temperature has been 105.6° and 106° F., and show that in every case the temperature fell to 100° within an hour of the electric treatment being applied, and that rapid recovery followed. Corresponding patients have been treated with the result in the treatment of acute appendicitis. Then with regard to the permanent white scourge we are told that: "Specific remedies innumerable have been tried, but of these 'tuberculin' alone retains some semblance of vitality." Not so with the present neuro-electric, under the influence of which "the bacilli are almost at once rendered inert and . . . . thereafter give no trouble which is not in the power of the ordinary medical practitioner to cope with." We trust that we have now helped the reader towards the formation of an opinion, and must here leave him to acquaint himself with the balance of the text of this interesting, well-printed and well-illustrated volume.

A Motor-Car Manufacturer's Munificence
It is announced that Mr. Henry Ford, the motor-car manufacturer, who two weeks ago gave £600,000 to General Hospital, intends to convert the hospital into an institution for the study and prevention of tuberculosis and cancer.

The Newer Conceptions of Syphilis and Parturition.—Lobensteiner (Am. Jit. Obs., lxix., 319) states that in considering Colles' law that of 145 mothers who had at no time been treated, nor had presented signs of syphilis, but who gave birth to syphilitic infants, 71 per cent. gave a positive Wassermann reaction after labour. Of 25 mothers with symptoms of syphilis, 21 per cent. gave a positive Wassermann reaction. That a specific parent or parents may give birth to a non-specific child is greatly doubted from the findings with Wassermann's reaction. Those rate cases in which an infant apparently escapes infection are dependent, not upon immunity, but upon the well-known fact that the syphilitic virus shows a natural tendency to lessen in virulence with passing years. Opinions are rather divergent as to the value of the Wassermann reaction in infants, but with proper technique, the results will give the reaction in most cases. The results upon the fetus from treatment of the mother with mercury have been uncertain. Savaran affords greater hopes of success, especially when combined with mercury by injection. The action of the arsenic protects the child until the birth, and then its action becomes large measure. With salvarsan the intra-uterine death-rate is about 15 per cent., while with mercury it is about 65 per cent. per cent., which is usually used regularly throughout the entire period of gestation. All children born of suspected parents, or parents who give a plus Wassermann reaction, should have their blood examined soon after birth, and should have active treatment in the presence of a positive reaction, even when this is the only indication of disease. The treatment should be direct either with arsenic or mercury.

The Present Status of Fibroids of the Uterus.—Schoenberg (Am. Jit. Obs., xix., 3) from an extensive consideration of the results obtained by operations, either myomectomy or hysterectomy, and the numerous complications and degenerations which the old conservative attitude towards the removal of fibroids is no longer justified. The indications for operation are considered to be—malignant change, when situated in the lower uterine segment, obstructing the birth-channels; the size of the tumour to cause pressure symptoms. In the case of young women myomectomy is the operation of choice. It is estimated that only 10 per cent. of the women who have myomectomy performed subsequently bear children, and therefore future child-bearing should not too strongly influence the decision between myomectomy and hysterectomy. The best results are said to be obtained by supravaginal hysterectomy. The reports of Röntgen therapy are considered, and if the results prove to be as favourable as the early reports showed the method would supplant surgery in many cases. However, unfavourable results are steadily being reported, and only a small percentage can be classified as complete cures. The majority of so-called cures are only cessation of symptoms. Another factor against the Röntgen rays is the damage done to the ovaries. It is claimed that the effect is primarily on the ovaries, and where the ovaries are behind a large tumour the rays produce no result. Therefore operation is claimed to be more conservative than by retaining the ovaries and allowing other structures to be treated which may be involved. Statistics are quoted showing that out of 380 cases in which the tumour was indicated only 5.3 per cent. showed disappearance of the tumour.

Ectopic Pregnancy, and Repeated Pregnancies.—Spengler (Springer's Jit. Obs., xixii., 101, from cases collected, found that in 144 women operated upon for ectopic pregnancy and living subsequently in connection with the pregnancy, in which pregnancy was possible, 47, or 32.6 per cent. had uterine pregnancies, and 21 had repeated ectopic pregnancies, or half as many as had living children. Of 67 women under 30 years of age, 27 had uterine pregnancies, and 10 had ectopic; while of 74 above 30 years of age, 19 had uterine pregnancies, and 17 had ectopic. In 3 out 100, or 3 per cent., less than half the patients bear children subsequently, and 14.6 per cent. repeat the ectopic pregnancy. The question is raised whether it is best to save the other tube when it seems capable of transmitting the ovum, and it is considered that which the disease had been upon the state of the tube for future pregnancies, but upon the number of children the patient has borne, her general health, and her desire for future pregnancies.

Milroy's Disease.—Phillips (Cleveland Med. Jit., May, 1914) records two cases of persistent hereditary oedema of the legs, or the so-called Milroy's disease. The first was that of a man, at 40, in whom the condition had been present ever since he was 15 years of age. The condition had never caused him any inconvenience except at times when his legs became red, swollen, hot and tender. These acute exacerbations would pass off in a few days, and for many years the attacks would recur at intervals of about six months. Latterly, however, they had become more frequent. The second case was in a boy, at 6, the son of the first patient. The condition had been present from the time when he was four months old. The diagnosis of the condition is summarised as follows:—The restriction of the oedema entirely to the legs; the absence of any discoverable cause for the oedema, either local or general; the strong family predisposition to the condition; the painlessness of the pale swollen legs, and the absence of any constitutional symptoms; the sharpness of limitation of the upper level of the oedema, and its persistence when once established. The disease attacks both males and females. No treatment seems to have any effect on the condition, except that the swelling may be held in check by bandaging. The disease does not appear to have any influence on the expectation of life of the individual affected.

Paroxysmal Tachycardia in a Child.—Hutchinson and Parkinson (Brit. Jit. Child's Disease, June, 1914) record a well-marked case of tachycardia in a child, aged two years and nine months. This appears to be the earliest age at which the disease has yet been recorded. Between May 27th and October 12th, 1913, the child had in all four attacks. The first attack lasted twelve days, and during it the pulse-rate reached 160 per minute. During the second attack, which occurred four days later, the pulse-rate showed a rate of 215 per minute. The electro-cardiograms showed a similar rate. The fourth attack occurred about a month later, and though a pulse-rate of 225 per minute was recorded there were no symptoms of distress. The last attack ceased suddenly after defaecation.

Tobacco Amblyopia.—Vandergrift (Med. Record, May 20th, 1914) discusses this interesting condition, and records a well-marked case. The patient was a man, at 45, who had never taken alcohol, but admitted to smoking about six cigarettes and one cigar daily for a long thirty years. Vandergrift holds that if the prognosis in the disease is excellent, even in cases of long standing. It may be necessary to persist in
treatment for many weeks before improvement begins, and many months may pass before complete cure is attained, though six to eight is a sufficient time to cure the average case. Not only is the cure almost always possible, but a relapse is almost unknown, even though the patient may continue to use the tobacco in large quantities. Strychnine is considered the best remedy for the disease besides the abstinence from tobacco. The administration of the drug must be begun with the average dose, but as quickly as possible it should be increased to the physiologic limit. It is also necessary to combat the patient's irritability, worry, and any general debility that may be present.

**Medical News in Brief.**

Medical Sickness and Accident Society.

At the last meeting of the Executive Committee of this Society the claim account presented still showed an improvement over that of last year, and the proposals received for these have increased. Outside is a record in the Society's experience. The new combined sickness and endowment table, with reduced premiums for the first five years, is also proving popular with younger members of the profession.

The votes for Epsom College were dealt with at this meeting, there being two candidates for foundation scholarships who are the sons of deceased members. The widow of a late member was also applying for a scholarship which has been awarded to the son of a deceased member. During the past few years the sons of several members have been admitted to Epsom College as foundation scholars, and it is an undoubted advantage to intending applicants to be sure of a number of votes being polled for them by the Society. No extra premium is required to enable members to share in this advantage.

A Difficult School Attendance Case.

At Clerkenwell Police-court last week, before Mr. D'Eyncourt, a child of six was produced whose "name was unprotected," according to a medical certificate which resulted in the loss of a hole in the head, it was reported, "three inches long and half-an-inch wide, and it is hoped that in time a silver plate can be inserted in place of the lost bone. Meanwhile the child has to wear a shield." In the case of a friendly one. The mother thought the child safer at school than in the streets, and the schoolmistress shied at the responsibility of having the child in the school, where the slightest high play might result in serious injury to the child. The magistrate said he saw and appreciated the difficulty, and suggested a "special school." It was explained that the child was not a "cripple," or "physically defective," as constituted by the Act, and could not be admitted until aged seven. In the end an order was formally made for the child at a certain school, to bring pressure to the teacher to admit the child, and presumably give it some individual attention.

Tuberculosis Dispensary for co. Dublin.

A TROPHAL central tuberculosis dispensary for co. Dublin was opened in the grounds of the Meath Hospital last week by Dr. P. J. O'Neill, J.P., Chairman of the Dublin County Council, who referred to the importance of the treatment in rendering a number of persons fit to resume their employment. The present building was a temporary one, pending the opening of the permanent building now in course of erection, and they had also arranged for the use of two small wards in the Meath Hospital. He urged the need of good housing accommodation.

Dr. Coey Biggar, on behalf of the L.G.B., commended the work, and Mr. K. Nolan, in a return showing the number of cases dealt with from the appoint-

NOTICES TO CORRESPONDENTS.

the Medical Journal (July 1912) up to the end of the last completed Insurance Act period (January 11th, 1913) were discharged fit for work, 60 were improved, 41 were not improved, 6 were worse, 34 were discharged for breach of rules or had left, and 28 had died. In the cases of 77 persons discharged fit for work, in 43 cases the improvement was maintained, 17 returned for treatment, and three died.

The Work of Epsom College.

The annual general meeting of the Governors of Epsom College was held last week, when the treasurer, Sir Henry Morris, presented. It is supported by Sir John Broadbent, Sir W. S. Church, Sir T. B. Crosby, Sir Dyce Duckworth, Sir James Reid, and other governors. Among the honours announced were three certificates for scholarships at London hospitals and exhibitions at Oxford and Cambridge. 18 had passed the whole or a part of the first examination for medical degrees of the University of London: 13 had passed the matriculation examination, three of the first class; nine had gained the higher certificate of the Oxford and Cambridge Schools Examination Board; 18 had obtained school certifices; and 10 had gained lower certificates, with 25 first classes.

The National Medical Union.

Mr. W. T. Greenger, of Brighton, presided at a dinner of the National Medical Union held at the Café Monico on Saturday last. Dr. J. Playfair, of Edinburgh, in proposing the National Medical Union,' said there would show that a union of non-panel men was a necessity for the future and to uphold the best traditions of the profession. Speeches were also made by Drs. F. Porter, Brassey, Brierley, and F. J. Smith.

The Alexandra Day Collection in London.

It was announced by the Lord Mayor that the amount of money collected in London on Alexandra Day was over 2,000.

University of Oxford.

In a Congregation held on June 28th, the following degree was conferred:—D.M., G. H. Hunt, Christ Church.

Society of Apothecaries of London.

The diploma of the society, entitling them to practice medicine, surgery, and midwifery, has been granted to Messrs. C. and W. C.

Apothecaries' Hall of Ireland.

The following gentlemen having passed the necessary examination have been admitted licentiates of the Apothecaries' Hall of Ireland: Michael R. Cleary, F.R.C.S.I., L.R.C.P.I.; Peter O'Dwyer, L.R.C.P. and S.I.

NOTICES TO CORRESPONDENTS, &c.

For Correspondents requiring a reply in this column are particularly requested to make use of a distinctive signature &c, to avoid the practice of signing themselves "Reader," "Subscriber," &c. Much confusion will be spared by attention to this rule.

SUBSCRIPTIONS.

Subscriptions may commence at any date, but the two volumes each year begin on January 1st and July 1st respectively. Terms per annum, 2½; post free at home or abroad. Postage subscriptions must be paid in advance. For India, Messrs. Thacker, S. & Co., and Calcutta, are our officially appointed agents. Indian subscriptions are Rs. 15.12.12. In Canada, Messrs. Dawson and sons are our special agents for Canada. For contributions are kindly requested to send their communications, if resident in Ireland, to the Editor at the London office, 6, Henrietta Street, Strand; if resident in Ireland to the Dublin office, in order to save time, to the name, title, and address of the subscriber. Subscriptions the same rule applies as to office; these should be addressed to the Publisher.
ADVISOEMENTS

For One Insertion—Half Page, Half Page, £2 10s.;
Quarter Page, £1 5s.; One-eighth, 12s. 6d.

The following reductions are made for a series:—Whole Page, 10 insertions at £2 9s. 6d.; 42 insertions at £1, and pro rata for smaller spaces.

Small Articles as for Tracts, Assurances, Vacancies, Books, etc.—Seven lines or under (70 words), 4s. 6d. per insertion; 6d. per line beyond.

REPRINTS.—Reprints of articles appearing in this Journal can be had at a reduced rate, providing authors give notice to the publisher or printer before the type has been distributed. This should be done when returning proofs.

TOOTING RESIDENT.—Some: come to welcome the class of advertisement disclosed in the marked newspaper sheet; on others it held their breaths, the exigencies of press-men. In the special case referred to it would seem to be an accidental oversight, for which it would be unjust to hold Dr. —— responsible.

PRIVATE PATIENTS AND THE INSURANCE ACT.

A correspondent asks for information as to whether dispensing for private patients by general practitioners has diminished since the passing of the National Insurance Act. In reply we would say that there is not much reliable information to the subject, but many practitioners do dispense their own medicines in England, except, of course, for panel patients. In Ireland, on the contrary, it is said that there is no objection to dispensing for a patient by his own medicine, in the case of private patients, and to a lesser extent than a bill. Dr. A. S. (Keart)—The electrical sterilisation of milk, referred to in our columns a few weeks ago, was first carried out with uni-directional combined with slow alternating electricity, and researches show that the best results are obtained by the use of a rapidly alternating current.

THE CULT OF METHUSELAIH.

According to Professor Mackenzie, the secret of old age consists in a diet of beneficent beets.

When golden youth has flown
And you're bound at last to own
That your way of life's decisively down-hilly,
Though your hair is turning grey,
You can keep old age at bay.

By a diet of beneficent beet.

With fearful pains and care
You must regulate your fare,
Nor relax your keen precautions for a minute;
Not a mouthful should be missed.

By a practiced analyst.

Lost a stray unfriendly microbe should be in it.

But, before your hat you bow
To the secret Methuselah.

And try his plan your tale of years to double,
It may come to a terminus,
The question to decide.

If life like that is really worth the trouble?

Daily Express.

Meetings of the Societies, Lectures, &c.

WEDNESDAY, JULY 1st.

British Ophthalmo-Laryngological Society (1 Chandos Street, Cavendish Square, W.-) 4 p.m.—Case.

TUESDAY, JULY 7th.

Royal Society of Medicine (Section of Obstetrics and Gynecology) (1 Wimpole Street, W.)—8 p.m.: Papers by Dr. Stainless, Dr. Malcolm, and A. S. Green, Chief Registrar, Short Communications by Dr. Archibald Leitch, Dr. Donald Roy. Vote of thanks to retiring Officers. The President's Annual Address. Members of the General Meeting of the Fellows will be held in the Robert Bruce Hall, I Wimpole Street, on Tuesday, July 7th, at 5 p.m.

Vacancies.

Certifying Factory Surgeons.—The Chief Inspector of Factories announces the following vacant appointments:—Greenwich (Drury Lane) Galway Union.—Medical Officer of the Shipdhan Dispensary District, salary £120 per annum, with extras amounting to £5 per year. Applications to R. F. Mullery, Clerk of Union.

Sunderland Borough Asylum.—Assistant Medical Officer. Salary £225 per annum, with the usual allowances. Applications to the Medical Superintendent, Borough Asylum, Ryhope, Sunderland, W.R.

Manchester Northern Hospital for Women and Children.—House Surgeon. Salary £120 per annum, with apartments and board. Applications to Mr. Hubert Tugend, Secretary, 36 Burton Arcade, Manchester.

Keat County Asylum, Maidstone.—Fourth Assistant Medical Officer. Salary £200 per annum, with furnished quarters, board, attendance, costs, gas, garden produce, milk, and washing. Applications to Medical Superintendent, Asylum, Maidstone.

Bristol City Asylum.—Second Assistant Medical Officer. Salary £200 per annum, with furnished quarters, board, attendance, and washing. Applications to the Medical Superintendent, Asylum, Maidstone.

North Lonsdale Hospital, Barns-in-Furness.—House Surgeon. Salary £200 per annum, with furnished quarters, board, and lodging. Applications to the Secretary, T. W. Ingham, 5 Southgate Street, Rotham.

Rotherham Hospital.—Senior House Surgeon. Salary £200 per annum, with board, lodging, and washing. Applications to the Secretary, G. W. Roberts, 8 Norfolk Street, Rotherham.

North Manchester Hospital, Manchester.—Assistant Medical Officer. Salary £200 per annum, with furnished quarters, board, attendance, and washing. Applications to the Medical Superintendent, Asylum, Maidstone.

Royal Albert Hospital, Devonport.—House Surgeon. Salary £200 per annum, with furnished quarters, board, and lodging. Applications to Mr. Frank Taylor, 56 Upper Richmond Road, Putney.

Salop Infirmary (Country Hospital).—House Physician. Salary £110 per annum, with board and apartments. Applications to Mr. John Jones, Secretary, Board Room, Salop Infirmary, Shrewsbury.

Appointments.

Dr. Dennis, Henry, M.D., B.S., Lond., M.D. Bristol, M.R.C.P., Medical Superintendent, the Royal Borough Asylum.


Mr. Fenton, Thomas Gerald, F.R.C.S. Eng., L.R.C.P. Lond., Senior Surgeon of the Nuns Monastery District of the County of Middlesex.

Dr. Findon, Thomas, F.R.C.S. Eng., L.R.C.P. Lond., Certifying Surgeon under the Tuberculosis (Sanatorium Benefit) Scheme of the County of Middlesex.

Mr. Ashton, Thomas, T. W., M.R.C.S., L.R.C.P. Lond., Anæsthetist to the Western Orthopaedic Hospital, London.

Mr. Mowbray, Harold, M.D. Edin. Additional Radiographer to the Royal Chest Hospital, City Road.

Dr. Roberts, C. Herbert, M.D., F.R.C.S. Eng., L.R.C.P. Lond., Examiner in Midwifery and Diseases of Women to the Joint Board.

Dr. Stevens, T. G., M.D., F.R.C.S. Eng., Obstetric Surgeon to St. Mary's Hospital, Paddington, W.

Births.

Dr. Willcox.—On June 29th, at 27th, 146, St. James's Street, Settlement, the wife of Dr. Willcox, of a daughter.

Dr. Carver.—On June 16th, at 9a. Terrance, Torquay, the wife of A. E. Carver, M.D., of a son.

Dr. Cole.—On June 22nd, at Laurent Mount, Sh. H. Cates, the wife of Joseph Cole, M.D., D.P.H., of a son.

Dr. David.—On June 21st, at "Linda," Westhill Road, Torquay, the wife of Arthur E. Dratt, M.R.C.S., of a son.

Mr. Porter.—On June 30th, at 36 Queen's Rd, Dalston, to James Houston Porter, M.R.C.S., L.R.C.P., and Mrs. Porter—a son.

Marriages.


Deaths.

Dr. Allen.—On June 26th, suddenly, at North Parramatta, N.S.W., L. H. Dr. Allen, M.R.C.S., L.R.C.P., Lord, youngest son of the late Charles John Allen, to Mrs. Allen, daughter of Mr. W. J. Allen, M.D., formerly of 39 Trafalgar St., Melbourne.

Dr. Frie.—On May 5th, 1914, at Hampstead Hospital, Emery Norbert, M.D., dearly beloved husband of Maud Tresilian Frie, L.R.C.P. S. E.

Firth.—On June 26th, at Hindhead, Dr. Carl Firth, formerly of the United States, to Mrs. Firth, of 33 Barnett St., Brentford.

Margaret.—On June 26th, at "Cater," Brent Knoll, Somerset, the wife of Henry Margaret, to Blanche Katherine, eldest daughter of the late Robert Bruce, Esquire, M.D., F.R.C.S.E., Edinburgh.

HUME DISPENSARY.

Dale Street, Stretford Road, Manchester.

WANTED a HOUSE SURGEON daily registered and fully qualified. Salary £100 per annum. Annual increase £10 for every five years, with apartments and gas. Applications, with testimonials, at once to Honorary Medical Secretary.
The Medical Press and Circular.

"SALUS POPULI SUPREMA LEX"

Vol. CXLIX. WEDNESDAY, JULY 8, 1914. No. 2.

Notes and Comments.

The letter from Sir Lauder Brunton published in the last issue of the Medical Press and Circular throws a lurid light upon the way in which the list of "contributors" to that popular work was drawn up. He practically disclaims any authorisation whatever for the use of his name, and quotes verbatim documentary evidence from the editor placing the blame for objectionable advertising upon the publishers, Messrs. Harmsworth. It may be pointed out, obiter, that these "explanations" do not account for the hardly less objectionable list of names of contributors, with titles and professional appointments, that appeared on the front of the 2nd and 3rd fortnightly parts. Was Dr. Riddle to blame for that lapse from professional ethics or is that also due to the publishers' excess of enthusiasm? In the latter case, surely Dr. Riddle could have deleted the list after its appearance in the first number. The persistence of the list with the reference to the medical books of four authors, during three numbers, that is, six weeks after the matter had attracted general attention and criticism, demands further explanations from Dr. Riddle. So far as Sir Lauder Brunton is concerned, his account shows that he was the victim of those responsible for the production of the Encyclopædia. It is not easy to understand why other "contributors" have not come forward with explanations of a similar kind.

The Duty of Medical Journalism.

Whichever course be taken by other leading medical journals in this country, we have remained faithful to the out-spoken policy of the Medical Press and Circular, which for nearly a century has endeavoured to uphold a high standard of professional ethics. Sir Lauder Brunton's letter shows that the matter has received the attention of the Royal College of Physicians of London. It may perhaps be presumed that other corporate qualifying bodies—including both colleges and universities—will also ask for an explanation from those medical men, whose names have been associated—voluntarily or involuntarily—with the "Family Encyclopædia of Medicine." As we have all along insisted, there is no moral offence in the advertisement of medical men in by publications; the British Medical Journal recently published a sort of guide as to where and how such publication was ethically permissible. This statement we found quoted in a Scotch lay newspaper, but we failed to discover it in a single newspaper published south of the Tweed. The rules of the ethical game, then, have been reduced to some sort of written form—so
that the contributors can learn precisely and exactly upon what ground of established professional opinion they could take legal action if that course were decided upon. Failing the vindication of a law court it is surely incumbent upon the "contributors" to the "Encyclopedia" to follow Sir Lauder Brunton's example, and to publish a full and particular account of their personal appearance in public under circumstances of so unusual a nature.

LEADING ARTICLES.

CRIME AND MENTAL RESPONSIBILITY.

Last week a man named Marjoribanks was sentenced to three years' penal servitude and seven years' police supervision on a charge of obtaining goods by false pretences. There is nothing of unusual interest in the actual crime of which the prisoner was convicted, the offence being that of stealing a cheque-book, by means of which he passed a number of forged cheques. A special feature of the case, however, arises from the astonishing criminal record of the man, an architect by profession, and a member of a well-to-do family. At the present time he is only thirty-four years of age, but he has contrived to perpetrate a series of crimes that is in its way probably unrivalled in the annals of criminology. He first came under the notice of the police in 1896, and the longest period he has been at liberty since was stated in court to have been one month. His offences were of a most varied nature, many of them dealing with forged cheques, by means of which tradesmen were induced to supply him with goods. He assumed many aliases, including the names of military and naval officers and of noblemen. Judging from the police report, his offences were in the main those of a man of some intellectual force, and they were apparently carried out with great daring and skill. Of his power of organisation and his reckless courage the police have had several unpleasant experiences. In Maidstone Prison he was the ringleader of a riot amongst the prisoners, to quell which the governor had to call in a company of soldiers, who suppressed the outbreak at the point of the bayonet. In June last, again, he was being conveyed from London by train in charge of two police officers when he suddenly jumped from the carriage and made good his escape while the train was in motion. There is no need to enlarge upon the doings and the character of this unfortunate criminal. It may be well, however, to point the moral of his experiences by some reflections on the way in which society has dealt with his shortcomings. The first great fact that emerges from the sordid history is the absolute failure of criminal law administration as a deterrent. It has neither protected property nor reformed Marjoribanks. The next point that suggests itself is that of the mental responsibility of a man who seems to commit crimes habitually as ordinary persons play golf or go to the theatre. There is nothing to show that the state of this man's mind—his sanity, his mental and moral responsibility—has been investigated by any expert or person fitted to speak authoritatively on the point. As a matter of fact, the legal mind is slow to grasp the idea of mental irresponsibility. If advanced in court, a plea of the kind has to face a hostile battery of criticism from counsel and bench, and is often met by a pitiful display of contradictory expert evidence. In any well-considered system of criminal law administration there should surely be some permanent expert body available to determine the question of a prisoner's sanity. Without some such machinery there is the danger of individual injustice in all criminal courts, from the lowest to the highest. The action of such an expert body should be automatic, for, from the very facts of the case, an accused person would not be likely to plead insanity of his own accord. The subject cannot, of course, be more than glanced at here. Clearly, it is one of considerable social importance, and it is to be hoped that among the sweeping reforms that are needed in the procedure and the administration of the law, that of the determination of mental responsibility will receive due attention.

THE ANNUAL ELECTION AT THE ROYAL COLLEGE OF SURGEONS, ENGLAND.

It must be conceded that much general interest centred around the annual election at the College on Thursday last, a fact which was not surprising. In the first place, there was a record number of candidates competing for five vacancies. Again, just at the last moment, an element of political flavour was introduced by an appeal from the Society of Members, urging the Fellows to support three candidates who had intimated their intention, if elected, to favour the claims of the members for some share in the government of the College. This was the first occasion upon which such an appeal had been openly made. It was brought under the notice of the constituency by a circular issued at the beginning of the week. Again, a second record was established as showing the interest which the election had created. No fewer than 1,037 Fellows recorded their vote. The number of Fellows on the roll of the College is about 1,600, that is to say upwards of 61 per cent. took part in the election. The result of the poll was declared by the President of the College, Sir Rickman Godlee, as follows:—Mr. William Thoburn (Manchester), 534; Mr. Chas. A. Ballance, 434; Mr. W. McAdam Eccles, 351; Mr. J. Stanley Boyd, 337; Mr. Chas. Ryall, 304; Mr. J. B. Lawford, 256; Mr. T. J. Openshaw, 245; Mr. W. G. Spencer, 238; Mr. Raymond Johnson, 218; Mr. F. F. Burghard, 204; Mr. F. J. Steward, 177; Mr. H. S. Pendlebury 106; Mr. T. H. Kellock, 99; and Mr. P. M. Yearsley, 90. The five first named were successful, and to these we offer our congratulations. In reviewing this remarkable contest, one or two points suggest themselves for notice. The first is the success of the provincial candidate who heads the poll. As we pointed out
a week ago in these columns, a provincial candidate ought always to be successful; the success of such a candidate is merely a matter of agreement among the Fellows in the provinces, who greatly outnumber those within the metropolitan district. The provincial representation on the Council has always been a negligible quantity, for which the provincial Fellows have only themselves to blame. We believe that each large medical school in the provinces might with advantage in turn run a candidate at these elections; if this were done, as it might be, by organisation, the impression that the Council is practically a closed borough for the surgeons of the metropolitan schools would soon receive its quietus. The next point claiming attention was the intrusion at the last moment of the appeal of the Society of Members. The circular requesting the Fellows to vote for three candidates who had expressed their sympathy with the members' claims contained the following paragraph:—

"To govern a great College there is needed a body of men of wide and comprehensive intelligence. To secure a Council of such men we must avoid those persons whose only idea is to glorify their own existence and to remain deaf to all suggestions for improving the College administration, and who refuse to adopt the only course which will make the College of Surgeons a real power for inspiring surgical knowledge and for protecting and guarding surgical practitioners." It is not unnatural that the members should think themselves worthy of a share in conducting the affairs of the College, and that their inclusion would not lower the position, academically and professionally which it occupies at present. It is a matter of some regret that members have failed in this instance to formulate a clear and moderate policy, which might have advanced their cause materially. A plain statement of the main reasons actuating the members to claim a share in the government of the College might possibly have influenced many Fellows in their favour. The Royal College of Surgeons of England is ancient enough to require those fundamental changes in its constitution which sooner or later are essential to all corporate bodies, that is to say, if they are to keep abreast of social evolutionary thought and movement. Most of all is salutary reform needed in a body that is intimately connected with so progressive a subject as that of surgery.

CURRENT TOPICS.


A most interesting display of pathological specimens consisting of recent additions to each section of the Museum of the Royal College of Surgeons of England, is now on view in the Hall of the Museum and in Room 1. In his annual report, Professor Arthur Keith, the Conservator, states that the scheme of re-arrangement of the entire pathological collection, sanctioned by the Council four years ago, is on the eve of completion, so far as it relates to the section of general pathology. Some thirty-two cases now hold this latter collection, and others illustrating the biology and experimental creation of neoplasms and the effects produced by the introduction of foreign bodies into living tissues and organs are now in process of being arranged. Special mention may be made of the important gifts received during the year. The "corrosion preparations," illustrating the structural details of the human body, prepared by Dr. Wahby, Professor of Anatomy in the Egyptian Government School of Medicine in Cairo, are on view, and also the curious specimens prepared by Dr. Edward Smith, of the Department of the Library, at Washington, U.S.A., showing the occurrence in plants of tumour formations of a malignant nature. Both these exhibits were to be seen in the Museum of the International Medical Congress held in London in 1913, where they excited much interest. The preparations made by Dr. Wood Jones, of the uro-genital system of animals presented by the London School of Medicine for Women, and the first model made by Mr. E. T. Newton, F.R.S., showing the detailed anatomy of the brain of the common black-butterfly, are well worth a careful examination. Considerable interest is being taken in the specimens of the male pheasants, presented by His Majesty King George V. The Archaeological Survey of Nubia and the Egypt Exploration Fund have continued their liberal support. Altogether the exhibition is one which deserves at least one visit from medical men and scientists.

Unprofessional Conduct.

There are many occasions on which the conduct of a medical man, while coming short of what would be considered "infamous" by the General Medical Council, is yet what some might truly describe as "unprofessional." It is of some interest to discuss what should be the attitude of members of the profession towards a man whose conduct is habitually or deliberately unprofessional. The conduct must, of course, be habitual or deliberate, for small breaches of etiquette are better ignored. A particular objectionable action may have happened by inadvertence, and medical men should not be too touchy. Where, however, the commonsense of the profession decides that a particular line of conduct deliberately pursued is unprofessional, it is necessary to take steps to bring the fact home to the offender. In the first place, he should be given an opportunity of explaining his conduct, or of withdrawing from it, and, if necessary, expressing regret. The proper steps for such a purpose are best taken by the local medical society, if there be one. We assume that all this has been done, and the offender remains obdurate in his evil courses. What steps are his brethren now to take? In the first place, it is inconsistent that he should remain a member of any medical society which regards honourable conduct as an essential qualification in its members. In the next, honourable medical men will withdraw from him those privileges of courtesy and comradeship which it is customary for one medical man to extend to another. He has abused the privileges of the profession, and he is no longer entitled to them. His withdrawal of comradeship, or refusal to assist or consult really punishes the offender's patients, and not himself. This is not so. A patient can choose...
between one doctor and another. If one doctor, by his own action, has deprived himself of certain privileges open to others, it is a matter his prospective patients must weigh in choosing him to attend them or in retaining him in attendance when they learn of his limitations. We will add just two observations on this subject. One is the impossibility of accepting charge of a patient a medical man has absolutely no responsibility toward him. The other is that if an honourable medical man, out of pity for a sick person, thinks it is obligatory on him never to refuse to meet any practitioner, however disgraceful, in consultation, he must hold himself equally bound to meet the herbalist and the bone-setter.

Work.

Work is doing things because we must. They may be things we like doing or not, but the essential thing about them is their necessity. Willy-nilly work is what we must do. When we do it is another question. Sometimes we must do it now, even eagerly and finally; often we can leave it over till to-morrow. Some of us work for a fixed time and know that, once closing time has come, we are free till the clock comes round again. We often like our work, or even enjoy it. But we feel that enjoyment is furtive and forbidden. "In the sweat of thy face shalt thou eat bread." That was a curse; but we are not dejected as if Hampton Court perspirings a pleasure. The Germans—paddling race who often miss the price—have been investigating work. They have been trying to determine the best time for it—a futile waste, for only the few can choose. They agree that the morning is the best time for mathematics or mechanics, and that a tired mind cannot remember. They are satisfied that school children should not work at night. It is worse than a waste of time, and the effort to make the brain work at all is absolutely harmful. Evening is story time, and always was from troglodyte days. The imagination is unfenced, and wafters in the pastures of the stars. But many men tear up in the morning what they wrote the night before. We should have many philosophers at the breakfast table. We do not, because they are not properly awake. All these results are no doubt worth knowing, and their authors have done some little thing to advance knowledge. But most of us cannot feel the time for that. We must; and our more casual fellow-workers work when they feel like it, or when there is nothing better to do. Anyway, it can do no harm to record the facts.

The Problem of the Germ Carrier.

From the public health standpoint much interest has centred around those individuals who, all unconsciously, scatter the germs of disease and death broadsheet. Whether he has or has not suffered from a but terminal infectious disease, the chronic germ carrier who bears in his alimentary or his urinary tract the micro-organism of that disease is a distinct source of danger to the community. In regard to the milk-supply, for instance, it has been shown that outbreaks of infectious disease have occurred from time to time as a result of the employment of infected persons, if not actually contagious from enteric fever, have nevertheless been carriers of the Bacillus typhosus. It is just in relation to cases of this description, as Mr. Herbert Samuel pointed out the other day in a Standing Committee of the House of Commons to discuss the Government Milk and Dairies Bill, that greater powers of inspection should be provided. The subject was also referred to last week in a lecture before the Royal Institute of Public Health, by General L. Vaillard, the President of the Board of Health of the French Army, who gave an apt illustration of the danger of disease carriers in the case of a certain cook, a chronic typhoid carrier and also a carrier of the Bacillus typhosus, who was said to have been responsible for five epidemics of enteric fever in nine years, having been engaged in the preparation of ice-creams for wedding parties and banquets. In the case of diphtheria it is well known that the bacilli are carried in the faces of healthy individuals in times of epidemics of that disease. Scientifically Bacon was the first of the great iconoclasts, and after him there was a deluge of disrupted matter. Analysis was endemic, and men saw nothing but the marvels of simplicity. To-day we have experimentally smashed almost all our surroundings, and we are trying to put them together in new ways. There are drugs and bacteria and passionate people no less ingenious than their composition, while their alleged qualities are more wonderful than all.

We have synthetic sugar and synthetic rubber; we have heard of synthetic milk—made chiefly from a Chinese bean—which is an ever-present dread. There was an American who tried to manufacture eggs. The yolk, the white and the shell he could do "on his head." He stuck at the skin. He finally perfected it, but the cost of the necessary rubber ruined his enterprise commercially. Synthetic life is no new idea. Men have striven to imitate the masterpiece of the Ancient of Days with soap and oily films. Their amoral moved and were still. They have had and still have the Internationale de la Tuberculose. Dr. Alexandre Marie has made "asaetically by the action of the tuberculin of the Pasteur Institute upon sterilised glycerophosphate of soda" bodies identical alike in form and capacity for stain with Koch's bacillus. What is more marvellous, they grow on potato and guinea-pig's liver, etc. The one thing is true we must turn over our ideas. They are probably not true, but nowadays it is more popular to believe than to doubt. "Go round." That is the real way to knowledge. Swift used to call the man who made two blades of grass grow where one did before a benefactor of the human race. We wonder if the same comment is applicable to the multipliers of tubercle bacilli.

Sanitation in Camps.

In view of the increased number of organisations that arrange for the spending of summer holidays in camp, the sanitary conditions of camp life may well receive more attention from health authorities than has hitherto been bestowed upon them. Some excellent rules with regard to camp sanitation have recently been issued to officers of the East Anglian Division of the Territorial Force, and published in
full in The Medical Officer. Under the heading of “Responsibility” each unit and the individuals composing it are urged to study sanitation and the laws of the preservation of health. Great stress is laid upon the importance of the prevention of contamination of food and drink. Food and excesses must be avoided, the latter especially in regard to meat, jams, sweets, tobacco, alcohol, lemonade and cold water. Extra food, such as coffee and biscuits before early parade, and fruits and fresh vegetables are to be encouraged as conducive to health and efficiency. The dangers of refilling water-bottles from just any source and also of filters, except under medical supervision, are pointed out. Some sound advice is given in the matter of the disposal of refuse, as well as in the elements of personal hygiene. Whenever possible opportunities for personal cleansing should be provided and used. A debilitated unit from want of rest or neglect of some vital sanitary principle will figure badly in manoeuvres and will be useless in time of war. Attention to the rules and elementary principles of military hygiene will do much to promote the health and good spirits of men, and the same applies, though to a lesser extent, to boys’ summer camps.

The Plasmodium Tenue.

As important communication was made at a recent meeting of the Royal Society with respect to a new malaria parasite infecting the human subject. This new organism was discovered by Dr. J. W. Stephens, Sir Alfred Jones, Professor of Tropical Medicine in the University of Liverpool, in a blood slide sent to him from a native child from Pachmari, Central Province, India. The peculiarity of the Indian parasite appeared to be its irregularity as compared with the regular, almost monotonous, conformational “rings” of the malignant tertian parasite (Plasmodium falciparum) which it resembles at first sight. In a series of consecutive drawings made by Professor Stephens of each parasite the specific differences of the new organism become apparent. Its most conspicuous features are that it is extremely ameboid, the cytoplasm is always scanty, the parasite having little bulk or density, and the nuclear chromatin is out of all proportion to its volume, being abundant in quantity and very irregular in its distribution. Typical rings are absent or exceedingly rare. It is doubtful, at present, whether the parasite be pigmented or not. After a prolonged study of the morphological characteristics of the organism, it is concluded that it is differentiated thereby from any other malarial parasite of man. The name proposed for it is the Plasmodium tenue. Other points regarding its morphology must necessarily remain unsettled until further material be forthcoming.

PERSONAL.

DR. R. A. ASKINS has been appointed whole time School Medical Officer to the Bristol Education Committee.

DR. CHARLES NYMAN, of Ebbe Vale, has been appointed Medical Officer of Health for Brynmawr, in succession to the late Dr. M. Sheedy.

In memory of their father, Sir William Lawrence, F.R.S., Surgeon-Surgeon to Queen Victoria, and of their brother, Sir Trevor Lawrence, long Treasurer to St. Bartholomew’s Hospital, the Misses L. E. and M. W. Lawrence have presented £4,000 to the Royal Society for research into the cause and cure of disease.

DR. T. DIVINE, of East Hull, was the recipient last week of a suitable testimonial in recognition of his valuable services as Hon. Secretary of the local Medical and Panel Committee in connection with the working of the National Insurance Act.

SIR HENRY LINN, M.D., has purchased the Bridge of Allan Hydropathic, and intends to open it this month under the name of the Allan Water Hotel.

MR. HOWARD JONES, M.B., B.S.Lond., M.R.C.S., L.R.C.P., has been appointed Honorary Anaesthetist to St. Mark’s Hospital for Diseases of the Rectum.

MR. JAMES B. HOWELL, D.P.H., M.R.C.S., L.R.C.P., Assistant Medical Officer of Stepney, has been appointed Medical Officer of Health for Hammersmith.

DR. EVAN ABLAS was the recipient the other day of a suitable presentation from his many friends at Lindfield, Sussex, upon the occasion of his relinquishing practice in the district.

A HANDSOME monument, in the shape of a clock tower, to the memory of the late Mr. Walter Whitehead, the well-known Manchester surgeon, was formally presented to Bury last week.

DR. THOMAS DRUSLYN GRIFFITHS, M.D., D.Sc., of Fern Combe, St. Stephen’s Road, Bournemouth, a former President of the British Medical Association, left the estate of the gross value of £2,046.

DR. A. P. BEDDARD, M.A., M.D.Oxon., F.R.C.P., Lond., and Dr. E. P. Poulton, M.A., M.D.Oxon., M.R.C.P.-Lond., have been appointed respectively Physician and Assistant Physician to Guy’s Hospital.

DR. JAMES FULTON, of Woodvale Road, Belfast, was the recipient the other day of a handsome testimonial in token of the high esteem and respect in which he is held by the district. A suitable presentation was also made to Mrs. Fulton.

DR. J. W. ASLEY COOPER will open a discussion at the meeting of the Society for the Study of Inebriety to be held on July 14th, at 4 p.m., in the rooms of the Medical Society of London, 11 Chandos Street, W., on “Proposed Legislation for Inebriates.”

The following medical practitioners have been placed in the Commission of the Peace for Glamorgan by the Lord Chancellor:—Drs. Peter J. O’Donnell, S. G. Morris, County Alderman Thomas H. Morris, D. N. Morgan, County Councillor W. Evan Thomas, and R. D. Price.

CIVIL LIST Pensions have been awarded to the widows of Dr. R. H. Traquair and Professor N. H. Alcock, M.D., respectively, and also to the daughter of the late Dr. E. H. Willoughby, in consideration of the valuable services rendered by the deceased to medical science as well as in consequence of the inadequate means of support of their survivors.

The following members of the medical profession have been appointed upon a Committee appointed by the War Office to inquire into the working and organisation of voluntary aid detachments:—Colonel Sir George T. Bentzon, K.C.B., Col. Sir John T. Clark, Bart., Major Sir Anthony A. Bowley, C.M.G., and Surgeon-General W. G. MacPherson, C.M.G. The Secretary is Lieutenant-Colonel G. B. Stanistreet, R.M.C.

MISS SELINA FOX, M.D., at present Superintendent of the Bermessey Medical Mission, has been appointed by the Home Secretary, on the recommendation of the Prison Commissioners, Lady Superintendent and Deputy Medical Officer of the institutions for women at Aylesbury, comprising the Female Convict Prison, the Borstal Institution for Females, the State Inebriate Reformatory for Women, and the Preventive Detention Prison for Women.
CLINICAL LECTURE.

ON

BRONCHIAL DILATATION.

By M. CASTAIGNE, M.D.,

Physician to the Beaujon Hospital.

[SPECIALY REPORTED FOR THIS JOURNAL.]

Cases of simple bronchial dilatation have become rare since we took a look at the subject. Delboeuf and Grancher demonstrated the fact that in most instances bronchial dilatation, or bronchiectasis, is of tuberculous origin, at any rate in adults and elderly people.

A patient, 64 years of age, a baker, came to us the other day with a history of having suffered from bronchial dilatation for upwards of thirty years. In the course of his life he had had a whole series of diseases. At 10 years of age he suffered from febrile attacks ascribed to malaria, and, as we know, a relationship betweenague and bronchial dilatation has been remarked more than once. Then, too, Hustin showed that bronchial dilatation, common enough in children, may reappear in the adult, so that this detail is not without importance.

In 1884, when 30 years of age, this patient had an attack of broncho-pneumonia which seems to have been the starting point of the dilatation, for the attack was protracted and was followed by a relapse since which he has always had a chronic cough. But we must not omit to mention that he has been under treatment at the Ricord Hospital for troubles presumably of syphilitic origin.

At the present time the patient complains of cough and copious expectoration. Directly he wakes in the morning he is seized with a harassing cough accompanied by copious expectoration—as much as a tumblerful, he tells us. This presents the characteristic appearances of the expectoration in bronchial dilatation—that is to say, it usually separates into three layers: a lower one which is frankly purulent, a middle layer which is clearer, and a frothy upper layer.

He tells us that, like most of his fellow-sufferers, he is obliged to take certain precautions at night in order not to be awakened and worried by this convulsive cough. It is generally stated that these patients prefer to lie on the affected side, but the contrary is often the case, and that is the case in this instance, for he tells us that he is more comfortable on the opposite side.

In conjunction with these functional signs it is to be noted that there is no haemoptysis. Now, haemoptysis is certainly more frequent in cases of tuberculosis, but we must not forget that it is also met with, and this by no means rarely, in cases of simple bronchial dilatation. In support of this statement we might quote the classical observations of Hanot and Gilbert, which are conclusive inasmuch as they were confirmed by post mortem examination.

We will now pass on to the physical signs, and here it should be noted that when we are dealing with a tuberculous patient with such copious expectoration as this we generally find a cavity, and this cavity is at the apex of the lung. Here, on the contrary, there is no trace of a cavity at the apexes—or, indeed, any suggestion of breaking down. The physical signs are limited to the left base. At the right base we only hear occasional sibilant rales and signs of pulmonary emphysema.

At the left base we note retraction of the chest wall with well-marked dulness extending into the axilla and exaggeration of vocal fremitus, and on auscultation we hear gurgling sounds, which are louder when the bronchus is partially filled and are at times quite cavernous.

Apart from the clinical signs, other physical means are available for the purpose of verifying the information afforded by percussion and auscultation, especially radiography. At first radiography was only made use of to detect pleural lesions, and from this point of view we know that it yields very valuable data. Then, little by little, as the process became more rapid, it became possible to utilise it in apoplexy for the differential diagnosis between a cavity and bronchial dilatation. This patient was, therefore, radiographed, and inspection of the photograph yields the following information:—The apices are clear, while the lower two-thirds of the lung present a series of patches due to sclerosis and suggestive of bronchial dilatation.

But what are the other clinical elements of the diagnosis? To begin with, we have to ascertain whether this broncho-pulmonary disease, which has been running on for thirty years, has produced in the patient the constitutional effects which we are entitled to expect in pulmonary tuberculosis. Now we find on inspection that his general health is good, seeing that during these thirty years he has been able to continue his work as a baker, a laborious calling, in which all the time he is inhaling dust which is irritating to the bronchi. Owing to this and sundry improprieties on his part, there have been superadded attacks of bronchitis, which have obliged him to lay up from time to time, but little is of this he has not lost strength to any great extent.

He presents very plainly the so-called Hippocratie fingers, that peculiar bulbous form of the finger ends due to the interference with haematoysis caused by bronchial dilatation. The heart is not the seat of any disquieting lesion, the patient is not threatened with asystole and his blood pressure is practically normal. Radiology shows a dilated, stretched aorta, a symptom which may be referred to his syphilis. Our assumption that we are dealing with a case of bronchial dilatation and not of tuberculosis is based on both the physical signs and the constitutional symptoms.

The physical signs are: The localisation at the base, whereas pulmonary tuberculosis mostly runs its course in one of the apices, the other showing signs of infiltration, the bases being pretty free. Here, on the contrary, the principal lesions are limited to the left base. This is already a valid reason for suspecting bronchial dilatation. But this is not sufficient. During the last few years it has been shown that we sometimes get tuberculous cavities at the base giving rise to very similar manifestations.

Nothing in this case justifies a suspicion that this might be tuberculous cavity at the base. The auscultatory signs are not quite the same, and radiography confirms this conclusion. Then, too, the
sum total of the functional signs is clearly in favour of its being a case of bronchial dilatation.

The constitutional signs militate in the same direction. The condition of a good state of the general health for thirty years without any spitting of blood and without oscillations of temperature is exceptional in pulmonary tuberculosis, while it is constant in bronchial dilatation.

Everything, therefore, points to the latter diagnosis, but there is one point which cannot be overlooked—viz., the presence or otherwise of the tubercle bacillus. Now, repeated bacteriological examination has invariably proved negative.

But although we have now arrived at the diagnosis of bronchial dilatation, this is, after all, an incomplete diagnosis, since we have merely diagnosed an anatomical lesion which may be due to various causes. At the present time we can distinguish between ordinary and specific causes—the latter comprise syphilis, tuberculosis and a recently discovered affection, oosporosis.

A tuberculous origin has been excluded in this case, but he may easily become tuberculous in certain environments. Nor is all certain dilatation with tuberculosis, says Grancher. It would be more accurate to say that bronchial dilatation may in any instance be due to tuberculosis or may become tuberculous secondarily.

Syphilis has been incriminated on several occasions. Bensaude presented to the Medical Society of the University of Liverpool the following case which he had done before and after treatment, of a patient with dilatation of the bronchi associated with syphilitic sclerosis of the lung, who greatly improved under specific treatment. We must therefore bear syphilis in mind, and here the dilatation of the aorta is in favour of syphilis. The Wassermann test would give us useful information, and if the case might serve him on treatment. But we are not entitled to invoke syphilis solely, it is a secondary infection which has acted on an organism previously enfeebled by chronic bronchial dilatation.

Oosporosis has been investigated principally by Professor Roger and his pupil, Bory who, in a series of cases of bronchial dilatation discovered peculiar rods in the sputum and identified the peculiar rods of the *oospora pulmonalis*. In these cases iodine is remarkably efficacious.

In the case of this patient, we may conclude that it is one of bronchial dilatation of the ordinary kind consequent upon a broncho-pulmonary affection. It seems that acute broncho-pulmonary affection which has already existed, and which may be due to dilatation. Hutinon has shown that this is the case in children, but in adults it does not appear that acute inflammatory diseases can per se determine dilatation. It requires a slow chronic process or some, superadded cause. There was something of the kind in this instance in the shape of inhalation of dust.

Now, as to treatment. Our intervention can only be of service at the acute stage, during convalescence from the broncho-pneumonia. The patient must be watched, prevented from committing imprudences, and induced to quit any calling that exposes him to bronchial irritation.

At the advanced stage which this patient has now reached, all we can do is to protect him against secondary infections. The balsams and antiseptic inhalations are useful in order to ward off gangrene of the lung. It is only in the specific forms that we can hope to effect anything of the nature of cure.

During the last few years attempts have been made to intervene surgically. Pneumotomy has been performed, and gives good results in cases of superadded infection and actual abscess of the lung. But pneumotomy is not indicated here, nor could it be in the absence of such some complication. Tuffier has observed satisfactory results by milder means when the dilatation is strictly circumscribed—viz., by stripping off the parietal pleura and introducing adipose tissue in order to compress the bronchi. This might prove useful in a young subject not over 40, but certainly not in this instance.

Note.—A Clinical Lecture by a well-known teacher appears in each number of this Journal. The lecture for next week will be by Herbert French, M.A., M.D. Oxon., F.R.C.P., Physician to Guy's Hospital.

Subject: "Some Further Therapeutic Points."

ORIGINAL PAPERS.

CASES SIMULATING APPENDICITIS. (a)

By ROBERT E. KELLY, M.B., B.Sc., F.R.C.S.,
Assistant Surgeon, Liverpool Royal Infirmary, Lecturer on Practical Surgery, Liverpool University.

In reading a paper on appendicitis, one feels that one ought to apologise for treating a subject which has been written on in both lay and medical journals ad nauseam. The vast majority of the papers, however, are concerned either with the pathology or the treatment of the disease, and I thought that a short paper on some difficulties of diagnosis might be acceptable to a Society such as this, or at any rate serve as an introduction to an interesting discussion.

When the “New English Dictionary” was begun in 1884, the term “appendicitis” was unknown. At the present time appendectomy is the most frequently performed operation in any large general hospital. In the Royal Infirmary, during the year 1911, 200 cases admitted for appendicitis were operated upon.

In my personal experience of nearly 200 cases of the disease, I find that in a large majority a correct diagnosis has already been made. A small minority remains, however, in which the diagnosis is at fault, and it is my purpose and desire to-night to consider these cases of mistaken diagnosis.

They fall naturally into two distinct classes.

First, those in which immediate operation is undertaken; and, second, the interval cases.

The former or acute cases are amongst the most interesting of one's experience. It is, of course, highly disappointing, though often unavoidable, to disclose a healthy appendix where one expected to find it gangrenous. Fortunately, a further exploration of the abdomen generally suffices to localise the mischief.

The Interval Class.—This class comprises those cases which after one or more attacks of pain in the right iliac fossa are referred to the surgeon for operation during a quiescent period. Every surgeon will agree that a normal appendix has occasionally been removed under these circumstances. The fact that subsequently he may be called upon to operate for another condition affords a sufficient conviction that the previous diagnosis was wrong. Now it seems to me that a consideration of these mistakes in diagnosis will prove both more interesting and more instructive than a mere recital of successful cases. I have therefore collected the following from my own case books as a basis for my paper.

(a) Read before the Birkenhead Medical Society.
Of the acute cases I have seen pneumonia, hip-joint disease, kidney disease, and general infections mistaken for appendicitis. In regard to pneumonia one must always bear in mind the examination of the chest, especially in children.

In hip-joint disease, movements at the hip are limited in all directions; whereas, in appendicitis accompanied by flexion of the right hip-joint, the limitation of movement is found to be for extension only, rotation remaining perfectly free.

In kidney disease the diagnosis may be most difficult. A woman, aged 28, was admitted with a huge abscess extending from the mid-line of the abdomen over the right iliac fossa. On the loin on the right side. She had had it for six weeks. On evacuating this abscess the pus which was let out had a distinctly faecal odour, and in the pus were found four concretions. It seemed obvious from the smell which one usually ascribes to the B. coli and the concretions that this was a large appendix abscess. Subsequently, however, it became certain from the urinary discharge that what I had been dealing with was a pyelo-nephrosis, and that the concretions were urinary stones.

An X-ray might have saved this mistake in diagnosis, but incidentally I may mention that I have some appendix concretions which gave well-marked X-ray shadows in the X-ray examination. Of several infections I will only refer to two cases. Both were sent to the Royal Infirmary with a diagnosis of appendicitis.

The first was a boy, aged 14, who had been scalced on the dorsum of his right foot. It was treated at school with some ointment! Twelve days later he was seen by a doctor, who sent him to the Infirmary because he had a rigid right rectus abdominis muscle. The whole abdomen, however, proved to be stiff, and on making a rectal examination the boy showed marked opisthotonus. He was obviously suffering from tetanus, the result possibly of infection from the dressings used to treat his scalp. It is interesting that the stiffness of the muscles should first be seen on the same side as the injury. It was suggested that time (now five years ago) that tetanus should be treated by injecting the anti-tetanic serum over the Rolandic area. This was done, but whether it had anything to do with the boy's recovery I cannot say.

The second case was that of a boy also admitted with the diagnosis of appendicitis. He looked very ill. He had a raised temperature and pulse rate, and he was delirious. The hip-joint was normal. Locally, there was just above Poupart's ligament on the right side a tender brawny swelling, with the skin red over it. The swelling appeared lower than is usual in appendicitis. I suspected acute osteo-myelitis of the iliac bone. Instead of pus I found a mass of glands which I sent to the laboratory to have examined bacteriologically.

It was surprised to hear two days later that the glands were infected with the bacillus tuberculosis. The patient was isolated. No fresh development of cases occurred. Gastric and duodenal ulcers, Gall-stone disease, Acute pancreatitis, Intestinal obstruction, Tubercular and malignant ceca, and Diseases of the female genital organs.

My youngest and oldest cases of perforated gastric ulcer were both mistaken for appendicitis. The first was that of a boy, aged 10. The abdomen was of a board-like rigidity, the pulse-rate and temperature were both raised, the lips were blue, and his expression anxious. A stab wound over the pubis indicated free fluid in the abdomen, but an incision in the right iliac fossa revealed a normal appendix.

The stomach was therefore explored, and a hole found in the lesser curve about an inch from the pylorus.

In my oldest case there was at the time of operation a history of sixteen hours' pain in the abdomen. The patient stated that the pain began above the umbilicus; but when I saw him, just before operation, there was no pain at all above the umbilicus. It was entirely confined to McBurney's spot. Moreover, the whole of the right iliac fossa was exquisitely tender. On cutting down upon the appendix by the usual split muscle incision there was marked edema in the tissues of the abdominal wall. This appeared to me that in both these cases the patient's history and statements were not sufficiently considered.

I used to think that by making a small stab wound above the pubis in all cases of peritonitis one could tell by the smell of the free fluid in the pelvis whether one had to deal with a perforated appendix on the one hand, or a perforated stomach or duodenum on the other.

Though it is true, for the most part, that the fluid associated with appendicitis had the so-called rotten, faecal, faeculent, or fishy smell, it is not always true, for I have had cases in which the reverse condition was found.

We come now to cases in which a large, full gall-bladder is mistaken for an appendix abscess. Edith M., aged 25, admitted with a large, tender swelling under the right rectus muscle. Pulse and temperature above normal. In this case there was no history of indigestion or jaundice. She was sent in as an appendix case, and the diagnosis lay between a distended gall-bladder, an appendix abscess, or renal mischief. Operation revealed a very large gall-bladder surrounded by adhesions to the large bowel and omentum, and showing not only pus and stones in its interior, but also some free pus lying between the gall-bladder and the omentum.

In connection with gall-bladder disease, I had a case which presented some very unusual features. Jane H., aged 40, had been ill some days. No vomiting, but much excessive, sickening thirst. Abdomen hardly moving at all, and very tender in the right iliac fossa. Temperature 104, pulse only 90. Her doctor considered it appendicitis;
personally, I leaned towards gall-bladder trouble, as the greatest tenderness was rather above the umbilicus on the right side.

I therefore made a high split muscle incision, so that I might have access to either, should occasion require it. A very red and oedematous gall-bladder presented itself, evidently full of pus as well as stones; but on looking at the appendix region, although that organ itself was healthy, about ½ ins. above the ileo-cecal valve there was a hard mass in the cæcum showing a typical ring structure. This would, I thought, just admit a cedar pencil only, and would certainly give rise to intestinal obstruction after the operation, it left alone. Removal of the growth was out of the question. The condition of the patient would not admit of it. I made, therefore, a lateral anastomosis between the ileum and transverse colon. The gall-bladder was brought out through a separate small incision, and the pus and stones evacuated. About three weeks later I removed the growth. This, fortunately for the patient, turned out to be tubercular, and not malignant, as I had feared.

Another curious case was that of a girl, aet. 26. She gave a history of having had, three years before, a previous attack of pain in the abdomen which kept her in bed for a week. On the afternoon before operation, whilst shopping, she was suddenly seized with acute pain in the pit of her stomach. She was also some vomiting. She was seen by her doctor three hours later. The pulse rate was 80°, and the temperature 99. There was severe pain and tenderness over the appendix region, somewhat relieved by ½ grain of morphia. The doctor saw her again next morning. The vomiting had continued during the night. There was no permanent relief from the pain. The temperature had gone up to 100° and the pulse rate to 90. The tongue was dry and the abdomen rigid.

An operation for appendicitis was therefore advised. I agreed with the diagnosis, although when I saw her she had some pain and tenderness in the left iliac fossa. This I thought was due to the fact that her pelvis had filled with fluid, and was now irritating the left parietal peritoneum. At the operation the appendix was normal, but there was free inodorous dark-brown fluid in the abdomen. A second incision above the umbilicus was made to ascertain if she had a perforated gastric ulcer, but both the stomach and duodenum were normal. The omentum, however, showed extensive fatty necrosis, and the pancreatic head was glazed with lymph, and somewhat swollen. On further exploration some stones were found in the gall-bladder, so a third incision was made over this organ and twenty stones removed. A fourth incision, a stab wound over the pubis, was made to drain the pelvis, and continuous salines instituted.

This patient exhibited what one might consider a typical history of appendicitis. If the condition of acute pancreatitis had been correctly diagnosed, she would at least have recovered with two scars the less.

I will now consider intestinal obstruction simulating appendicitis. The first of these is the case of a girl, aet. 8, who was seized with acute abdominal pain after partaking of some fruit. Purgatives failed to give relief, and she came into hospital with a lump in the right iliac fossa. Pulse 140°, temperature 101. Intestinal obstruction was complete. The abdomen was moving normally. She looked very ill, and immediate operation was advised. The lump which had been diagnosed as an appendix abscess was found to consist of six or seven coils of small intestine, with mesenteric thrombosis, I resected the gut, but without avail, the girl dying of operative shock some hours later.

Another interesting case was that of a boy with almost the same history and objective signs as in the case just mentioned. At the operation the tumour consisted of a mass of coils of small intestine, with thickened and oedematous walls. There was, however, no thrombosis. This turned out to be a case of Henoch's purpura in which the rash did not appear until after the operation.

These cases of Henoch's purpura are somewhat rare, but the mistake of operating on them as cases of appendicitis or intussusception is common.

One must always bear in mind that cases of intestinal obstruction may depend on the sequelæ of appendicitis. A man, aet. 50, was admitted for intestinal obstruction of five days' duration.

There was marked distension of the bowel and a lump on the left side of the abdomen the size of an orange. This patient was found to have a mass of adherent coils of intestine and omentum surrounding some fætid pus produced by the bursting of an appendix near the ileum. This had occurred when the appendix had roamed into its anatomical position, pointing in the direction of the spleen.

Diseases of the cæcum are also common causes of mistaken diagnoses.

The tumour formation of both malignant and tubercular cæca are very apt to be mistaken for appendix abscesses. Sometimes, indeed, the malignant disease may have engraved on it some pus formation. A diagnosis of appendicitis in the aged should always be attended by a grave prognosis.

About two years ago, I was asked to operate on a case of appendicitis in a woman, aet. 55. On inquiry, I found that the obvious lump in the right iliac fossa had been there for four months. She had had temperatures, but the lump was so hard that I diagnosed the condition as one of malignant disease. This was further strengthened by the presence of visible peristalsis. On exposing the lump, the growth was so firmly fixed to the posterior abdominal wall that I had to content myself with an enterotomy. Almost exactly twelve months later her doctor told me that the lump had entirely disappeared. I closed the enterotomy.

I, unfortunately, have no evidence as to the nature of that case, but I believe that it was a tubercular cæcum, mimicking, as it sometimes does to a remarkable degree, malignant disease. The cure of the condition followed on the rest given to the cæcum by the enterotomy.

We have in the infirmary at the present time a girl who was admitted with a large tender swelling extending from the loin to the right iliac fossa. It was breaking down on the surface, and the diagnosis lay between disease of the kidney or the appendix. At operation the pus showed typical actinomycosis granules.

The disease had probably commenced in the cæcum.

Lastly, I would like to say a few words about the very common error of operating for appendicitis and finding disease of the genital organs.
The very first abdominal operation I ever did was that of a young woman with all the signs of acute abdomen. I felt uncertain as to the cause, and was fortunate enough to have the help of the gynaecologist. We came to the conclusion that as we thought that the appendix was at fault I had better do the operation. I had to remove two large Fallopian tubes distended with pus. I have repeated this error since on two other occasions; but perhaps I may be pardoned if I tell you that they were both in single women.

In another case of pyosalpingitis occurring nine days after confinement, the resemblance to an appendix tumour was remarkable, for the right and diseased tube was 6½ ins. long and 2 ins. thick, and lying on the side of the still enlarged uterus was exactly in the position of the appendix and appendix. Moreover, the pus from this tube, which burst just as I was getting it out of the abdomen, had a distinctly foetid odour.

In another woman, at 36, also sent in as a case of appendicitis, I had to remove a ruptured ectopic pregnancy.

Even in the male I have operated on a man who had a previous attack of pain over an undescended testicle.

It had been called torsion of the testicle. On opening the abdomen the testicle was found bound down by adhesions to the posterior abdominal wall and to the cecum, but in the midst of the adhesions there was an appendix covered by omentum, obviously the result of an old attack of appendicitis.

The appendix itself was distended and full of a mucoid secretion.

So much for the acute cases. They were all mistakes in the diagnosis of acute appendicitis. Yet I think that you will agree with me that not a single case was made worse by the immediate operation, and some of them, I am sure, were benefited thereby. They all recovered with the exception of the mesenteric thrombosis case. The patient I had to bring out of two cases that had been left for an interval operation, in most of the cases the appendix would have been removed without in the least eradicating the prime cause of the mischief.

It is this thought that always strikes me when, in operating on an interval case, I come across what appears to be a normal appendix.

About a year ago, I removed the appendix in the "cold" from a patient who was said to have had three attacks of appendicitis. My patient left the nursing-home two weeks later, but on the very day she reached home she had another of her attacks. I was called to see her, and the site of the pain made it perfectly obvious that her gall-bladder was at fault. She had never had any jaundice. I operated on the next day, and evacuated a gall-bladder full of stones and pus.

Another class of case which presents difficulty is the condition of tubercular glands about the lower end of the mesentery of the ileum. The glands sometimes reach a large size, and by their periadenitis cause adhesions to form round the end of the ileum and lower end of the cecum. I am sure that this condition very often simulates appendicitis; but the case is usually so mild that it is nearly always operated on in the interval, and then one finds these adherent bands and cascous or calcareous glands as the sole remaining pathology. One has heard a good deal lately of the masses of adhesions about the cecum which have received the name of Jackson's membrane, and the pathological condition of the ileum known as Lane's kink. Though I have never satisfied myself as to the presence of the latter, I have often seen in these interval cases that, although the appendix appears to be normal, yet the whole cecum is large and freely movable though united by lateral bands of adhesions to the outer parietal wall.

This condition may aptly be called the "floppy" cecum. It nearly always occurs in young females, and is generally associated with a history of constipation and attacks of pain in the right iliac fossa, which simulate in a remarkable degree appendix attacks. These, I am sure, form the large part of the cases which are mistaken for appendicitis, and which are operated on in the interval. They get well on purgatives, and are the cases which are so commonly cited in favour of the use of purgatives in this disease. They are the exceptions which prove the rule in appendicitis to give no purgative, for, to use an Irishism, they are not a bad kind of appendicitis at all.

Lastly, I need only mention the mistake of confusing recurrent renal colic due to stone in the ureter with attacks of appendicitis.

Now, the foregoing list of cases sounds somewhat formidable, but, as a matter of fact, they form under 9 per cent. of all the cases. Still, in every ten acute cases there will be one in which the appendix is found not to be the source of the trouble, and I am sure that in the interval cases the percentage where the appendix is removed for some other condition will be found somewhat larger.

In a correspondence lately going on in the British Medical Journal, Mr. Edmund Owen, in a plea for early operation, insists that the case should be seen repeatedly until a diagnosis is made, and then immediate operation should follow. Dr. Ewart, in answer to this, stated that the rule to operate immediately for appendicitis has a strong tendency to become a rule to operate immediately for suspected appendicitis. If he is right, we must face the idea that, to be well, he says, to face that new situation squarely, and to give the subject of suspected appendicitis its diagnosis, and operative conditions the exhaustive consideration which it deserves. Practically, this has been the aim of my paper, and the conclusions which may be drawn from these few somewhat scattered remarks may be summed up in the following:

Every pain in the right iliac fossa does not necessarily mean appendicitis, even when accompanied by the signs usually designated acute abdomen. As Murphy has so succinctly stated, there should be no deaths from appendicitis, yet we are still having them. The reason is, that the deaths are due to procrastination. They are due to waiting for the interval, or they are due to the case remaining a suspected one until it is too late. Operation in the first day or so is no more fatal than the operation in the interval, and I think that it is better to have operated and found a normal appendix during the acute stage than to delay and have a normal appendix in the interval; for in the first case one has a chance of discovering the real cause, but, if one waits until the interval, this chance has been lost, and may render two operations necessary instead of one.

It is not generally appreciated that the operation for the removal of the appendix is easier in the first 24 hours than in the interval, for adhesions may then be troublesome. The really difficult
THE NEED OF PUBLIC LABORATORY CLINICS.

By DAVID WALSH, M.D.,
Senior Physician, Western Skin Hospital, London, W.

By a "laboratory clinic" is meant an institution that combines the work of a clinical laboratory with the actual administration, when necessary, of technical methods of treatment, such as those by vaccines, intra-venous medication, and the like.

The rapid advances of medical science have necessitated the use of many complicated and costly methods of diagnosis. One has only to compare the practice of ten or fifteen years ago with regard, say, to enteric fever, tuberculosis, malaria, and venereal diseases, to realise how vital is the help of an expert pathologist in order to form an accurate diagnosis. Blood examinations are imperative in a large number of cases; sputum must be tested for micro-organisms; and a complicated series of investigations carried out with reference to a host of morbid processes.

The relation of general practice to advanced medical science is well illustrated in the special case of venereal disease, which, above all maladies, demands the services of the clinical laboratory. A great campaign is now on foot to rid the nation of that heavy burden, and a Royal Commission has been appointed to inquire into the subject. As medical men know, many venereal patients come to the special hospitals to have the skin, throat, eye, ear, and nervous system, and to those for women and children. Another large contingent applies to practitioners on the Insurance panel, and to others who treat poor patients. In the majority of cases the real nature of their malady is unsuspected by the patients themselves. Happily, it is now possible in obscure cases to ascertain by means of the Wassermann blood test and other methods of diagnosis whether syphilis is or is not actually present, and whether it has or has not been definitely driven out of the system. Moreover, the prospects of cure have been immensely quickened and aided by the introduction of Ehrlich's famous remedy known as "606," or "salvarsan." Unfortunately, the costs of tests and of remedy is so great as to be almost prohibitive if used extensively in the small hospitals, and still more so among patients of the insured class. A similar observation applies to the bacteriological diagnosis of other maladies, and to the vaccine and other modern remedies needed for many infections of a non-venereal character.

THE COST OF MODERN METHODS.

The increased cost and complexity of modern scientific methods involve serious economic results. They threaten to undermine the whole fabric not only of the smaller voluntary charities but also of the immense field covered by the National Insurance Act, and to a somewhat lesser extent by the Poor Law Medical service. By denying the worker the chance of speedy relief from his illness this modern costliness throws the burden of his support upon the public purse. In many ways it adds to the already heavy problem of how to deal with the waifs and strays of humanity. In the long run, however, it must be met by the provision of modern scientific methods which may be looked on as a sound investment, inasmuch as it lessens the ultimate burden upon the community by its deplorable results. The pressing problem of the moment is how to bring modern medical science to the homes of the poor.

As regards this question of advanced scientific method, existing hospitals may be divided sharply into two classes: first, those that possess well-appointed clinical laboratories, and, secondly, those that are unprovided in that particular way. The latter class are placed in this dilemma: either they must furnish their patients with medical service or else, speaking out the truth, they must be deprived of his purse. Under the last-mentioned conditions it is obvious that physicians would naturally spare the resources of the hospital by limiting the number of investigations, even if no direct pressure were brought to bear upon them by the hospital management. Much the same may be said of the preparation of vaccines and of special methods of treatment.

THE SAVING OF A CENTRAL LABORATORY.

Economically, as I have shown elsewhere, (a) there would be a great saving in the provision of a central laboratory available for a number of small medical charities. To that scheme I would now add the important suggestion that such a laboratory should be thrown open to private and to panel practice.

My scheme aims at the establishment of a central laboratory and clinic, intended primarily to supply the needs of the Metropolis, but capable of wider extension to the provinces later if such a course were desirable. To this institution all voluntary hospitals, panel and non-panel doctors would be enabled to send patients on certain simple conditions for the testing of blood and sputum: for bacteriological diagnosis: and, generally, for all kinds of clinical laboratory investigation. In addition the institute would, at the special request of the medical man concerned, provide and administer vaccines, tuberculin, salvarsan, and other highly specialised and often costly remedial agents.

An immediate result of the establishment of a central laboratory of the kind would be to bring under the best modern treatment a large amount of disease that is now being dealt with more or less ineffectively. Take the case of the panel doctor into whose busy hands drift a large proportion of those patients whose maladies demand laboratory investigation. How, for instance, is he to determine whether a doubtful rash is of tubercular, syphilitic, or other origin? Yet the decision may be vital to the health of the patient, not to mention the friends of the patient and the pockets of the ratepayers. What

a boon it would be to the overworked panel doctor, harassed by many such perplexities in his day's work, were he able to send off his patients to have a diagnosis made or confirmed, to be followed, if necessary, by appropriate treatment! He himself has neither the leisure, nor the special experience, nor the means, nor the appliances for carrying out highly technical and costly modern scientific methods. In the case of the voluntary medical charities the assistance of a central laboratory could hardly be otherwise than valuable. Hospitals are often so crowded, especially in their out-patient departments, that it is impossible to give to individual patients the amount of time and care that is required if scientific justice is to be achieved in each case. In a word, to all medical men who have to see poor patients a central laboratory and clinic such as that under discussion should prove an invaluable aid to the proper performance of his duties.

THE SCHEME IN OUTLINE.

What would be wanted to carry out such a scheme?

First of all, premises would have to be secured in a central situation convenient for the purpose of a laboratory and clinic, the prominent features of which would be:

1. A well-equipped clinical laboratory with various departments, having a staff of expert salaried pathologists.
2. A clinical out-patient department for the administration of vaccines, salvarsan, and other special treatment by a staff of medical assistants.
3. Both the laboratory and the clinical departments would be placed under the charge of a salaried medical superintendent (part-time appointment).
4. The administrative staff would require a secretary, a matron, a nurse, a cook, a wardmaid, and porter.
5. It would be well to have ten to twenty beds available for male and for female patients whom it might be advisable to keep under observation for one night after the administration of certain remedies by intravenous methods.

The cost of the premises and the equipment of the laboratory and of the organisation as a whole would not be great, as things go nowadays; certainly nothing like the vast sums that have been recently lavished upon more than one institution for special treatment, the therapeutic claims of which are still largely of a tentative character. On the other hand, the proposed laboratory and clinic would go straight to the heart of things and would from the first moment of its existence put into the hands of the medical profession the means of dealing with a vast amount of disease in its more insidious forms.

Sooner or later, it may be assumed with a fair amount of conviction, the State will be compelled to furnish some such free laboratory organisation if the principle underlying the National Insurance Act—namely, the supreme necessity of guarding the health of the individual citizen—is to be logically maintained.

For the funds necessary to the carrying out of the scheme I would apply to:

1. The philanthropic public.
2. The small hospitals, which would benefit largely from the laboratory clinic.
3. The King Edward and the other great distributing hospital agencies, inasmuch as the suggested laboratory clinic would (a) lessen the burden on the special and the smaller hospitals, and (b) greatly increase the efficiency of their work.

4. Subsidy from the State on the ground that the efficiency of the panel system would be greatly increased were a central laboratory and clinic available. (It is within the power of the Insurance Commissioners to sanction grants of the kind.)

5. The payment of small fees by institutions sending patients and by panel and non-panel patients on the guarantee of a medical man that the applicant is unable to pay ordinary medical fees, but is in a position to make a small contribution to the payatory clinic. (Indigent persons would, of course, be treated free.)

It may be that amid the conflicting interests which mark the voluntary medical charities of the Metropolis a practical scheme such as that above outlined may not at present find a footing. On the other hand, it may perhaps win approval from one or more of those philanthropists whose generosity appears to be well nigh inexhaustible.

Since the above scheme was outlined in December 1913, its features have been adopted by the Chancellor of the Exchequer in regard to the Insurance Act. In his Budget of 1914 Mr. Lloyd George is providing for the cost of bacteriological, X-ray, and other highly specialised medical treatment for the free use of panel practitioners.

The fact that the State is about to establish free public laboratories does not do away with the need of my scheme. There is plenty of room for a consultative institution for persons who, although not of the insured class, are nevertheless not in a position to employ a consultant and specialist fees. The scheme, in order to bear its fullest fruit, should be connected with a resident hospital in a healthy suburb for the purpose of treating cases which after the fullest scientific investigation are likely to be materially benefited by indoor hospital attention. Any attempt to deal with chronic or hopeless cases would simply detract from the value of the clinic hospital to the curable. In the same way there should be a chronic convalescent home at some secluded place, available for the treatment of cases which after full scientific investigation it is concluded may reap a real benefit from rest and change amid healthy surroundings.

Under present conditions our hospitals and convalescent homes are occupied by many patients who are not likely to receive any lasting and material benefit from their treatment. The clinic is intended to act as a sort of clearing house where the merits of each individual case may be tested, with a view of securing the utmost value from our charitable medical organisations and of throwing open the best modern treatment to those who by lack of system have hitherto had little chance of obtaining sound medical attention and modern treatment in the earlier and curable stages of their maladies. The good that might be effected by a thoroughly equipped clinic is simply inestimable. There would be little difficulty in finding plenty of medical men of the highest skill to help in a scheme, which might be tested by the foundation of a clinic in Central London as soon as there is a prospect of adequate financial support.

PREHISTORIC MAN AND HIS EARLY EFFORTS TO COMBAT DISEASE. (a)

By T. Wilson Parry, M.A., M.D. Cantab.

Ladies and Gentlemen,—The President of the North London Medical and Chirurgical Society stands, I believe, in an almost unique position. His annual address is always delivered at the close, instead of, as is customary in other societies, at the opening of each new session. This somewhat topsy-turvy arrangement of things merits at least one compensation. When the little boy was asked by the registrar, "What were you doing last week?" he simply replied, "Farver never had no last words, Muver always got those."

The president of this Society, not unlike this irresponsible offspring of Mother Eve, is graciously granted the last words, and I wish mine to be those of grateful thanks to you all for the honour you have done me by electing me as your president during the past year.

The subject I wish to introduce to your notice this evening is the relation to the dim and distant past, and is one which, I think, will serve to stimulate the imagination, as well as exercise the more prosaic reasoning faculties. It is always a matter of fascinating interest to delve into anything of a mysterious nature, and the one mystery which, to many thoughtful observers, comes nearest to the obscure and inexplicable origin of Man himself. When and in what form did he first put foot upon this planet, and what was the condition of that planet itself that must have cooled to an extent to have permitted the previous introduction of plant, as well as of animal life. At present all seems impenetrable as to the birth of protoplasmic life and the rise of the human race. Professor Sir Edward Schäfer has given us hints of life being chemically formed. If such, indeed, could be proved, how far should we have progressed on our path towards the Unification of Knowledge. At this present moment, however, we must renounce these philosophical speculations and must transport our thoughts to the more primitive ages, and consider the creation or formation of what we call "life," to that period in unwritten history known to us all as the Stone Age.

Now the Stone Age must be regarded merely as a stage of culture, as every nation and people on emerging from an animal to a human level, however low, starts with its "Stone Age," passes through its "Copper" or "Bronze Age," thence through its "Iron Age," until it eventually arrives at its Historic period, when it begins to depict its acts and its thoughts on stones, pottery, papiri, or coins. The anthropological world is indebted to the late distinguished antiquarian, Lord Avebury, for suggesting the division of the great Stone Age into two parts, namely, the Paleolithic or Old Stone Age and the Neolithic or New Stone Age.

This was no arbitrary division, but a really natural one, and based entirely on geological data. He traced the present geological condition of things back to its source, and this he made his starting-point of the Neolithic Period. In Great Britain and the north-western part of Europe it may be roughly dated as beginning somewhere between twenty and twenty-five thousand years before the Christian Era and lasting till about the year B.C. 2000-1800. It may thus be roughly said to cover a period something like 20,000 years. The Bronze Age succeeded this and lasted till about the year B.C. 800. After this came the Early-Iron Age, which is represented in Britain by the Late Keltic, Early British, or pre-Roman culture.

Immediately preceding the Neolithic Age was a huge gap which cannot well be estimated, but during which geological changes of a gigantic nature were taking place, which constitute the Late Palaeolithic Period. During this transitional period many things were happening, the map of the world was undergoing vast alterations, climates were changing, till, in North-Western Europe, to speak of only one portion of the globe, the dry cold of the later Palaeolithic Period had given place to a more temperate and rather milder type of climate. This change of climate led to extremely important results. While many of the animals that roamed our woods and forests during the Palaeolithic Period were becoming extinct, among which may be enumerated the mammoth, woolly-haired rhinoceros, ursus, cave-dog, cave-bear, and sabre-toothed tiger, others sought summer climes, wandering south—owing to the then unroofed lakes of the prairies, lion, leopard, and hyæna; others again chose to live in a temperate climate and these embrace our present British fauna, together with the bear and the aurochs, both of these latter having been now long extinct in this country.

A third group of animals preferring a cold climate, to which the reindeer, the musk-buck and the arctic bear, the rhino and aurochs, the glacier lads, migrated north or sought the cold mountainous districts of Europe, among these being the musk sheep, glutton, arctic fox, ibex, chamois and reindeer.

And what was happening to Man himself during this long chain of years? In Paleolithic times he was a mere animal, finding his food in the mountains or in the rivers or on the shores of lakes ("River-Drift Man") he was then called) till he overcame his dread of caves which were dark and gloomy and filled with savage monsters or evil spirits and found the protection they afforded more congenial than his previous rough dug-out homes, situated beside streams or rivers and covered probably by branches of trees and leaves, or clay and mud. Having taken to cave-life he began to cultivate Art in a way he had never done before. Although still hunting the mammoth, reindeer and other animals, certain members of his tribe became artists and some of their productions, which we still possess, are of exceptionally high artistic value. We have pictures of the ibex, glutton, wolf, reindeer, mammoth, and other animals drawn on bone, stone and ivory. To two of his carvings I should specially like to draw your attention. One is the conversion of the point of a mammoth tusk into two fletching reindeers. It was originally probably the handle of a dagger made in one piece out of mammoth ivory and a few thousand years before the Christian Era. This was discovered in the rock-shelter ofMontastruc, Bruniquel, France. The other example is the representation of a mammoth itself, carved out of reindeer horn and was also probably the handle of a dagger. This also hails from Bruniquel. The treasures unearthed in the caves of the Dordogne and other places in France give us an insight into the mind and character of the Caveman. By the skilful way he shaped many of his implements, by the thoughtful manner in which he fashioned his bone needles, awls, sceptrs and ornaments for personal adornment, he was evidently a man of high average intelligence. What is our surprise, then, that we, at a much more advanced stage of culture, should suddenly disappear. But such is the case. Caveman in France and the British Isles either became extinct or followed the reindeer to
the far north, and his descendants may be living in those arctic regions today as the race we recognize as the Esquimaux.

Neolithic Man was of a different type to his predecessor. He was not a hunter in the same sense as was Palaeolithic Man. I think he may best be described as a farmer, a builder and a surgeon; at least two of these three, the greatest of his occupations, have been handed down to us. I do not say that individually every Neolithic Man possessed these three accomplishments, for it was possible there were specialists even in those golden days. It is, however, quite within the bounds of probability that a versatile Neolithic Man sowed his cereals on the Monday; hunted on the Tuesday; helped (with lever, fulcrum and mother earth) to raise a ponderous stone of some forty or more tons, and fishered on the Wednesday; flaked flakes or hafted polished stone hatchets on the Thursday; fished on the Friday with bone or shell fish-hooks or speared fish with barbed bone-pointed javelins; trephined an unfortunate friend who suffered from fits on the Saturday, and on Sunday gave up his time to worshipping the glorious God of the Sun, who gave him light and warmth and ripened his corn to a golden harvest. Like the wise men of old he came from the East, probably bringing with him animals he had already domesticated, and we can follow his trail all along the north coast of the Mediterranean Sea by the dolmens and cromlechs he has left behind him. He was no modern pretender, but had a genealogy of proud dimensions, for dolmens have been found on the site of ancient Nineveh. And here I may not done altogether from altruistic principles, but because he felt that, if his dead friend were happy and comfortable, he himself would be less likely to be molested by his spirit. The Neolithic Period is divided into three parts: (a) The Campigyn Period; (b) The Robenhausen Period; and (c) The Carnac Period. It is this last period, the Carnac Period, that will specially interest us tonight, as we have absolute and certain proof that during this period the surgical operation of trephining was performed.

The above sketches of Palaeolithic and Neolithic Man have been given in order to demonstrate that these prehistoric personages were by no means lacking in brains, the former exhibiting specimens of true genius in Art, while the latter produced builders and surgeons of indefatigable and accomplished talent.
To begin at anything like a beginning we must
hark back to times much more remote than these,
to pre-palaeolithic times, indeed, when palaeolithic
man would be looked upon by us as a cultured
gentleman in comparison with those first primeval
savages. In those very early days Medicine and
Surgery were somewhat different to what they are
today. Man was then little above the lower
animals. His instincts were, therefore, akin to
their instincts, and under the same circumstances
he would act similarly, only rather more intelli-
gently. The picture that I have of the earliest
primitive man, at present, is an admixture of Pithe-
canthropus Erectus and the Piltdown woman.
With the former man we are only little above the lower
anthropoid. We see in Simian lower maxilla and canine
tooth we are getting dangerously near our cousins, the
anthropoid apes. A large male gorilla may have a
capacity of 600 c.c., and there would, therefore,
be much less distance between him and "the fossil
man of Java," than exists between this latter and
an average modern European cranium. I need not
enter into the controversy as to whether these fossil-
ized human crania belong to the Early Pleistocene
or late Pliocene Period. The geologist has strong
inclinations towards the former, while the anthrop-
ologist has much to say on the latter. Indeed,
the very mention of the word "cokith" in a mixed
gathering of these two distinguished classes of
savages, if it is not held up to ridicule, will entitle
the golden apple of Eris in an otherwise polite
and agreeable assembly. I have great faith in
what Browning says, "The best is yet to be," and
feel that there are still to be unearthed anatomical
surprises of unparalleled importance which, when
discovered, will necessitate a constant re-arrange-
ment of ideas as fresh material is brought to light.

Now it is well known that animals, like man, seek
solace in the misfortunes of man. When they meet with an
accident or are stricken with a malady, they
eavour to cure themselves. Let me give a few
instances, some borrowed from fact, others from
fable, in order to show not only what authentic
experience has to say, but also what many of the
ancients attributed to the mental processes of the
lower animals. Damage, it is said, which is inflicted,
will cure grasses that have a medicinal action usually
of an emetic or purgative nature. (1) The fibrous
rooted wheat-grass, Tritium Caninum, is fre-
quently eaten by the former. If an animal is ill it
seeks out a dark place and starves itself, taking
nothing but water. This often is all that is re-
quired, as it combines mental and physical restraint
and a good wash out of all toxic substances. If an
animal has been injured, it is noticed to continually
lick the affected part, which is a somewhat crude
combination of our modern fomentation and
massage. Prehistoric Man would most certainly have
licked his wounds. Later when he had lost some of
his earliest animal instincts he probably observed
what the former did, and thus the use of (2) helbore was believed to have been dis-
covered from the goat. (3) Virgil tells us that
dittany was "eaten by wild goats when they were
shot with darts." Pliny gives us one of those
delightful fables referred to above, namely, that
bleeding was taught man by the hippopotamus.
These are his words: (4) "That an intelligent man,
finding himself plethoric, goes out on the banks of
the Nile, and there searches about for a sharp-
pointed reed, which he runs into a vein in his leg,
and having thus got rid of a sufficient amount of
blood, closes the wound with clay. Buffaloes,
horses and camels are exceedingly fond of licking
salt. Prezevalsky says, "On the Mongolian camels,

ally if they have been long without it. Livingstone
says that the chimpanzee, solto, or other anthropoid
apes will staunch bleeding wounds by means of
their finger or of leaves, turf, or grass stuffed into
them. And now we once more resort to fiction.
(5) Cornelius Aprippa tells us that "The sick mag-
pie puts a bay-leaf into her nest and is recovered.
When the lion, if he is feverish, is recovered by the
eating of an ape. By eating the herb dittany, a
wounded stag expels the dart out of his body.
Cranes medicine themselves with bulrushes, leop-
dars with wolf's bane, boars with ivy; for between
such plants and animals there is an occult friend-
ship." Among birds the snake and an animal
particularly in India. (6) Fatig before the Great
Surgical Society of Geneva the case of a snipe who
with his beak and feathers makes a dressing,
applies plaster to bleeding wounds, and even binds
broken limbs with strong ligatures. M. Magnin
corroborated this in the case of a snipe which he
observed fly away with a broken limb, and later
found with the fragments of the limb forming in a
parallel position and undissected by a splint made
of intermingled feathers and moss and bound round
the limb, in a spiral form, by a flat-leaved grass
and fixed by means of a sort of glue. (4) With-
ington reminds us that a number of these stories
that seem improbable must not be entirely refuted,
and he cited the fact that Count Mauclerie, in
the last eighty years, declared that he had
secured in a certain case, a broken leg, by
observing the plants eaten by a mangy dog in the
Appennines. So much for what animals and
birds do for themselves when confronted with illness
or injury. Primitive man did likewise, only always
a little more. Now comes the great separation
when Man stepped away from beasts and birds
and began to think for himself. Originally he may
be thought to have started his development of his
imagination. And here I may remind you that imagination is one of those
forces that, if directed on right lines, is the very
impetus that is essential for progress in both
Science and Art, and is the true basis of originality
and even of genius itself, while, on the other
hand, if allowed to run as a confused course will pro-
duce an over-anxiety of conflicting ideas with
delusions of a detrimental or even dangerous
character.

At this moment we must pass, and not irrele-
vantly, to the history of medicine. This has
been divided into three great parts by two important
landmarks, and these landmarks correspond with
the lives of two illustrious men. The first of these
was a Greek who was born in the year B.C. 460,
and was no other than he who had been distin-
guished by the title "The Father of Medicine." I
refer, of course, to Hippocrates. The second, no
less eminent, was, I am proud to think, an English-
man, and his name is household word among all
scientists, the name of William Harvey. These
two form the stage for the commencements of two great
epochs in medicine and divide the history of
medicine into three prominent parts—namely:
(1) The period from the earliest primitive
times to the coming of Hippocrates;
(2) from Hippocrates to the coming of Harvey;
and (3) from Harvey to our own days. To-
night we are only concerned with the first period
of this division, but it is necessary to point out that
Hippocrates entirely altered the whole system of
medicine, transforming it from a bewildering chaos
of superstitious and frenzied fancies to a definite
science which had for its aim the careful collection
of symptoms of diseases, the courses they ran and
the best treatment that could be applied. No
wonder the name of Hippocrates stands out as a
shining light in a time of darkness and superstition, when truth itself was at an amazing discount. I said just now that it was the imagination of man that first led him to think wrongly, and I will explain this by saying that the first period in the History of Medicine is known as the Instinctive Period, or the Period of Demonology. It might equally well have been called the Experimental Period, for was it not during this time that Man was making his first tests—and during tests many of them must have been—to discriminate between various leaves, roots, berries, fruits and fungi to ascertain their dietary and medicinal values? Now I wish to state here that as embryology epitomises

Fig. 2.—Flint-pointed box-drill used in first stage of trephining skull for removal of rondel of bone.

evolution, so the study of the present-day primitive savage unfolds to us the larger history of prehistoric man. It was no doubt the twin mystery of Disease and Death that first stimulated man to think, that is why the Medicine-man and the Priest were one and the same individual at the outset. The position of the Medicine-man in the tribe must have been a most exalted one. In a fascinating book just published on the American-Indian called (6) "The Vanishing Race," this is well shown. "The Indian," it says, "aspires to be a great hunter; he seeks fame as a noble warrior, he struggles for the eagle feathers of distinction, but his greatest longing is to become a Medicine-man and know the Great Mystery." Witchcraft and magic early took a chief part in the treatment of disease, and Demonology reigned supreme for many millenniums. Demonology is based on "Animism," and this latter briefly consists in the belief in the influence of the spirits of dead persons. Animism has its beautiful as well as its hideous aspect. The wide belief among savage races that inanimate objects, as well as animate beings, are all possessed of a spirit has been well demonstrated lately by Maeterlinck's exquisite allegory "The Blue Bird," which shows the happy side of this creed. The unhappy side is illustrated by the reverence bestowed on spiritual monsters and the propitiation required of them. Can we afford to smile at such beliefs? Was not the God of the Hebrews on many occasions regarded as a demon of unparalleled dimensions, to wit (6) "The Lord shall laugh at him, for he seeth that his day is coming"? The three chief theories of disease were: (a) The anger of a disaffected spirit; (b) witchcraft; or (c) offended spirits of dead persons. The Manirata, a low race of the Malay Peninsula, believe that there is a separate disease-spirit for every illness (this is not unlike our present germ theory), one for small-pox, one for inflammation of the hands and feet, and one for hemorrhage; in the latter case the spirit is thought to fasten itself on the wound of the individual and suck out his blood. In the Indian Archipelago disease-spirits are conciliated by presents and dances. (9) In Polynesia every illness is set down to deities which have been offended or which have been urged to afflict the sufferer by their enemies. (9) The Prairie Indians treat all diseases in the same way, as they must all have been caused by one evil spirit. (9) The aboriginal New Zealanders had a separate demon for each part of the body to cause disease. Tonga caused headache and sickness; Moko-Tiki was responsible for chest pains, and so on. The Zulus believe that spirits, when angry, seize a living man's body and inflict disease and death, and when kindly disposed give health and cattle. (9) The Dayaks of Borneo acknowledge a supreme God, but attribute all kinds of diseases and calamities to the malignity of evil spirits. Their system of medicine consists in the application of appropriate charms or the offering of conciliatory sacrifices. Verily the whole world is kin, for we have only to step across the channel into Brittany to-day, to find that similar pagan ideas are still universally accepted there, but, of course, under very different auspices. The Briton's deities are neither Tonga nor Moko-Tiki, but if they are suffering from boils they offer prayers to St. Maudez, if from fevers
the XVth century the Catholic Church had a very
long list of saints, each of which presided over
some special complaint. St. Agatha healed sore
breasts, St. Apollonia toothache, St. Benedict stone,
St. Blaise quinsy and hemorrhages sticking in the
throat, St. Erasmus colic, and so on indefinitely.

References.
(1) "Tratt's British Grasen," pp. 69, 123
(2) "The Origin and Growth of the Healing Art," by Edward
Borodine
(3) "Antidote to Atheism." By More.
(4) "History of Medicine from the Earliest Times," by
Withington.
(5) "Life of Cornelious Agrippa." (Occult Philosophy), Vol. I,
P. 124
(8) "Vilic Medecine," p. 3.
(9) "Volk Medicin." p. 21.
(11) "The Land of the Paruns." By Anciste Le Bras. p. 4.

OPERATING THEATRES.
KING'S COLLEGE HOSPITAL.
Amputation of Limb.—Arthur Edmunds operated on a man, at about 30, who had
been admitted with the following history. The patient had always been a well-conducted, quiet, and indifferent
person in regular employment, with no personal worries except some slight disability on
examination two or three times, and was expecting to hear the
result of a further attempt. He had retired to his room,
changed his clothes, but he remained for so long a
time that his father knocked at his door to see if he
had fallen asleep. On answering, the father insisted on being admitted, when he
found that the room was dark and heard his son utter
a groan and fall back on the bed. A light was fetched,
and it was found that the patient's right hand was
almost entirely useless. The police were sum-
mmoned, and a small penknife with which the injury
had probably been inflicted was found in the bed.
A temporary tourniquet was applied and the patient
removed to the hospital. On admission he was found
to be suffering severely from shock and loss of blood.
On examining the hand, there was a deep incision
about an inch above the wrist joint, dividing all the
superficial tendons and other structures down to the
bone, actually tearing into the promotor quadratus.
On the back of the wrist were two small stab wounds
perforating the joint, as if the patient had endeavoured
to locate the articulation with the point of the knife.
Opposite to these punctures on the front of the wrist
was found another division of the distal part of the
tendon, opening the articulation and leaving the hand
connected with the arm merely by the skin and the
extensor tendons. This remarkable accident was self-
inflicted, the patient's expression being that "he
had been having a go at himself." Hemorrhage had
stopped to a great extent, and the problem which
presented itself, Mr. Edmunds remarked, was whether
it would be possible to save the hand, or whether
4 would be wiser to amputate straight away. The latter
course was decided upon for several reasons. In
the first place it was very doubtful whether the tag of skin
would contain sufficient vascular supply to prevent
gangrene; in the second place, any attempt to restore the
tendons and extensor" was a mere dream, for neither
of which had been severed in two places, would
have required an operation so prolonged as to have been almost certainly fatal: besides it
was not clear whether under any conditions a useful hand could be restored. Mr. Edmunds had pointed out that it was tempting to adopt an expectant attitude
to see how far the circulation would become restored
and to allow the patient's general condition to improve;
but such a course would be accomplished by a risk of
sepsis in a lacerated wound through avascular tissues.
It was therefore considered advisable to perform an
aseptic operation through the forearm just above the
upper end. This was done by equal flaps with a
circular division of the skin. The wound healed kindly, and the patient's
pulse and general condition rapidly improved after
an intravenous saline injection. Forty-eight
hours after the operation the patient seemed quite con-
tented, and referred to his mutilation complacency
with apparently no realisation of the disability which
the loss of his right hand would entail. A few days
later he seemed to lose all memory of the incident
except as if it had occurred 10 years before, and no time was he
able to give any reason for his act, nor was it possible by
questioning his relatives to obtain any clue as to
the reason for his extraordinary self-mutilation.

Mutilation of the genital organs, Mr. Edmunds said,
was not uncommon among the lower classes, and
with morbidly exaggerated remorse for some lapse of
chastity, but for a normally right-handed man to hack
off his right hand with a small penknife was a problem
for which it was difficult to find an explanation.

TRANSACTIONS OF SOCIETIES.
EDINBURGH MEDICO-CHIRURGICAL SOCIETY.
Meeting Held July 1st, 1914.
The President, Dr. John Playfair, in the Chair.
A committee which had been appointed at a pre-
vious meeting to consider
Quarantine and Infectious Periods,
submitted the following report:
I.—(a) That certain of the common infectious
diseases—viz., chickenpox, rubella, and mumps,
being of such slight importance from the points of
view of morbidity and mortality that no serious
advantage be ignored as far as quarantine is concerned,
the actual patients themselves being of course at once isolated.
(b) This is not meant to apply to contacts
including school children, hospitals proposing to
return to a school which is free from infection.
(c) As for all practical purposes the above-named
diseases do not occur twice in the same patient, where,
in the case of patients over seven years of age, there is
evidence that the contact period has suffered from a pre-
vious attack, the above rider (b) does not hold.
(d) As the use of the term "German measles" leads to a
serious confusion in carrying out regulations for both
"measles" and "German measles," it is strongly
recommended that the name "rubella" be substituted
for that of "German measles.
(e) In the case of a patient contracting any of the above diseases,
the isolation period is as follows:—(1) Chickenpox,
when every scab has fallen off; (2) rubella, in five
days after the eruption of the first rash; (3) mumps, in
not less than a fortnight from the date of onset, and
in not less than one week after the subsidence of all
swelling in the neck or elsewhere. (f) In the case of
contacts who have not had previous attacks, the
following are the isolation periods:—(1) Chickenpox,
in three weeks from the last exposure; (2) rubella, in
three weeks from the last exposure; (3) mumps, in 25
days from the last exposure.

II.—Whooping-cough.—The spread
of these two diseases is largely due to the fact that they
are most infectious before they can be diagnosed; still,
in view of their serious character, isolation of actual
cases and of "suspects" should of course be promptly
carried out. Chickenpox is not an infectious
infectious disease is not to return to school for at least three
weeks from the date of the appearance of the rash.
In the case of "contacts" who have not had the disease
the period of quarantine should not be less than 12
days. Chickenpox is not a communicable disease. A
previous attack may return to school if the patient has
been isolated, and efficient disinfection of the contact has
been carried out. (This recommendation is subject to
modification in the small schools of houses.) Whoop-
ing-cough.—It appears most probable that the infec-
tivity of whooping-cough is associated with the
catatrophic stage, and in the absence of complications
appears very shortly after the development of the
"whoop." It is desirable that, in a patient's own
name that he be under careful treatment or observa-

CORRESPONDENCE.

July 8, 1914.

The Medical Press.

III.—Diphtheria.—A patient contracting the disease must be isolated until the condition of the throat, nose, ears, etc., is normal, and until at least two consecutive negative swabs, taken at intervals of 24 hours, have been obtained from the affected parts. "Contacts" should be kept under supervision until two negative swabs have been obtained at intervals of not less than 24 hours.

IV.—Typhoid Fever.—A patient contracting the disease must return to school in not less than six weeks from the onset, and after complete recovery. No quarantine of "contacts" is required except in special circumstances.

V.—Scarlet Fever.—Patients contracting the disease must be isolated for not less than six weeks from the date of the eruption, and until recovery from all complications, which may have a distinct bearing on the question of infectivity. "Contacts" must observe a quarantine of not less than ten days after efficient disinfection. It being generally agreed that the incubation period of scarlet fever does not in any case exceed five days, the Committee (with one exception, Dr. Maxwell Williamson, who of opinion that "contacts" should return to school in seven days.)

Dr. C. B. Ker thought the report was an advance as regards the more trivial infections. He still believed that five weeks' hospital detention was sufficient in scarlet fever.

A long quotations just made the patient's "carrier" of the disease. Desquamation had nothing to do with infectivity.

The report was adopted.

The report of a committee appointed at a previous meeting to consider the

RELATION OF THE MILK SUPPLY TO THE PREVALENCE OF TUBERCULOSIS

in the City was submitted. The conclusions and recommendations of the Committee were as follows:—

Conclusions.—The general conclusion of the Committee after consideration of all the evidence is that infection of children in Edinburgh with the bovine bacillus derived from milk is prevalent. From the absence of data it is impossible to say whether the disease is more common here than in other cities under similar conditions. The Committee is further of opinion that the means taken by the Edinburgh Public Health authorities to secure a non-tuberculous milk supply for Edinburgh are at present insufficient. The Committee believes that at present the only means by which the consumption of milk in Edinburgh can be rendered certainly safe is through its being sterilised by boiling at the hands of the consumer. They are aware that two main objections have been raised to that procedure,—namely, firstly, that thereby the nutritive qualities of the milk are seriously impaired; and, secondly, that the sterilisation process destroys certain qualities of the milk and renders children nourished upon it liable to a form of scurvy. With regard to the first of these, the Committee is of opinion that the objection is groundless. It has arrived at this conclusion from a consideration of the evidence collated by Lane-Claypon (Reports to the Local Government Board on Public Health and Medical Subjects, New Series, No. 63, H.M. Stationery Office, 1912), and from the evidence which has come under the observation of its own members and of others whom it has consulted. With regard to the second objection, the Committee apprehends the position to be as follows. It is very possible that the process of sterilisation, if not wisely carried out, may cause damage to the milk, and if the milk is not made up by mothers or fed exclusively on boiled milk, in a certain small number of cases a degree of scurvy may result, but the condition is a slight one and readily yields to simple treatment given in time. Where children from the time they begin to be nourished on a properly adjusted mixed diet, infantile scurvy is practically unknown. It has been stated that children fed on boiled milk are more liable to rickets than where raw milk is used, but in the opinion of the Committee no evidence exists pointing to such an occurrence. Within recent years the argument has been advanced that it is actually a benefit to a child to be fed on the milk of tuberculous cows when this is mixed with a large quantity of tubercle-free milk, in that the children are thereby immunised against tuberculosis and are less liable to infection with the virulent human strain of the bacilli in later life. In the opinion of the Committee this contention is at present unproved, the opinion advanced, that the bacilli so advanced have largely been of an academic nature. In any case the Committee is of opinion, firstly, that the risk of serious disease being contracted from tuberculous milk must be put against the supposed immunisation effect, and secondly, that it is establiished that the bovine bacillus can immunise an individual against subsequent infection with the human bacillus, there are safer means by which this immunisation can be accomplished than by using living tubercle bacilli given in milk.

Recommendations.—The Committee recommended as follows:—First, that the members of the Medico-Chirurgical Society use every opportunity meantime to urge upon the public the necessity of drinking all milk consumed in their families; secondly, that a strong representation be made to the Town Council with a view to the reorganisation of the administration regarding milk examination and the inspection of cows, and thirdly, that Government be urged to carry through at an early date a Milk Bill along the lines of the Bills which have been under the consideration of Parliament in 1912. Prof. Koch's view that bovine tuberculosis was non-infective to man was now exploded. The idea that a moderate infection by bovine tuberculosis might be salutary as a preventative of human infection had no scientific basis. It was the duty of the Government to press this on attack, or at least not to encourage any such idea.

Mr. Stiles said that he was in the habit of tracing the milk history of cases of tuberculosis in children, and that of the cases of bovine infection coming forward.

He would allow adults to drink tuberculous milk at their own risk if they were so minded, but infants ought to be protected. The larger towns should appoint bacteriologists to examine milk coming from the country. The rural households would have difficulty in their bacteriological work done free, but they would have every inducement to see that their milk was free from infection.

The report was adopted.

CORRESPONDENCE.

FROM OUR SPECIAL CORRESPONDENTS ABROAD.

GERMANY.

Berlin, July 4th, 1914.

At the Congress for Surgery, Herren Meyer and Magnus Marburg, reported on some experiments they had made on the

SURGERY OF THE KNEE JOINT.

The object was to learn what were the conditions under which mobilisation was resisted by tissues that had become ankylosed. With this in view they had opened the joints of rabbits, removed the whole of the cartilage replacing it with other tissues, muscle or fascia, placing those substances between the ends of the bones forming the joint, or in other cases leaving the joints without further treatment than the simple removal of the cartilage. The surprising result of the experiments was that in every case the joint was still movable after recovery had taken place, whether the ends of the bones or not. The fact was that the ends of all the bones implicated became covered with a fibrous cicatricial tissue. In the cases in which muscular tissue was inserted the fibrous tissue was formed of degenerated muscle, and when nothing was inserted the replaced tissue was granulation tissue that had
developed at the ends of both bones. The essential thing was the isolation of any part removed by the operation, and prevention of the development of free bodies in the joint; the flaps of fascia acted best, however, on the blood poured into the joint at the operation. The technique was not the same for all the joints. In the knee joint the patella was partly removed by operation and the operation laid in a bed of fat. At the reconstruction a tenon of the peroneus enveloped in fascia was made use of for extension. The Kirschner's pin was not always in use now on account of the danger of its softening, but the operation was performed through two lateral incisions. In order to prevent lateral movement a wide groove was made for the patella, and extension tendon by chipping off the anterior surface of the condyle. At the hip joint there was no chisel followed by insertion of fascia or osteotomy at the neck of the femur with formation of a saddle joint with a view of providing for movement in two directions.

At the elbow joint the triceps and ulna were covered with a mantle of fascia. At both the finger and wrist joints the fascial tissue was made use of.

The further fate of neartubes was studied by careful examination. In arthritis deformans developed, nor any serious secondary deformity. The thick covering of the ends of the joints resembled that of the tendon sheaths. The newly-formed cavity was to be looked on as a serious cavity which developed in spite of the most extensive extirpation of the capsule. The free joint bodies which were not covered with cartilage showed no change in either size or form. This also showed the role of the cartilage in regards to adaptability to function of the newly-formed machine. The deep sensibility and the reflexes were completely retained. They, in fact, satisfied the highest requirements.

The indications for such operations had undergone some restrictions since Payr had had unpleasant experience in a case of joint tuberculosis.

The speaker then brought forward four cases; one of tuberculous of the knee, two cases of neartubes of the knee, and one of epiphysitis of the intra-phalangeal joint. In all the cases mortality was sufficient for the requirements, while the mechanism proved itself reliable. During the last two years the speaker claimed for the case of tuberculous joint to function in stiff joints with five failures. The condition of the joint in the case that had been operated on the longest—four years—was excellent and permanent.

In the discussion that followed, M. Hesse, St. Petersburg, said that in injury to both crucial ligaments he had replaced them with free fascia with good result. M. Hochholz had good results in five cases of injury to the elbow. Dr. Röpke Harnbem had more good results with bad embolism into injured joints. The customary indications were to be observed, but it had been shown that even with long existing inflammations and fistula into the joints success could be obtained after resection and embolism of fat into the joint. Recently he had made use of free transplanted fat flaps for filling up defects after extirpation of a meniscus in the knee joint, as a substitute for the bone lost and in the treatment of congenital dislocation of the hip.

He had operated also in cases of tuberculous disease of several joints. In cases in which there were old fat flaps, longer lasting results were obtained. Fat flaps of fat had healed in without the least trouble. The incisions were so made that the muscles were as little interfered with as possible. It was an object to operate with as perfect arrest of hemorrhage as practicable and the great disadvantage of the local immobilising dressing remained on about three weeks especially over the larger joints. The treatment in tuberculous cases was the same as in others. Treatment had not been so successful in the knee joint cases as in the elbow. The one occurring in the knee joint, and fistula in consequence of non-healing in one fistula, there was a partial casting off of one of the fat flaps, where, however, the motility of the joint was not much interfered with. In some cases the range of movement of the joint had minimised the result as the resection of the condyles had not been sufficient that for the haemorrhage it would have been enough. In that a comparatively wide circumscribed recurrence in the skin, but recovered without sequelae. In both of the cases, however, the patella remained free over the bolstering up with fat. This was important as regarded retention of the function of the extensor muscles. The later operation for mobilisation had then a better chance of success.

AUSTRIA.

Vienna, July 4th, 1914

TENTH CONGRESS OF THE DEUTSCHE RÖNTGEN-GESELLSCHAFT.

PROF. PAUL KRAUSE (Bonn), President, presented the report of the Committee on

THE BIOLOGICAL INFLUENCE OF THE RÖNTGEN RAYS ON THE MOVEMENTS OF ANIMALS AND MAN.

This report opened with a dissertation on the influence of the Röntgen-rays on bacteria isolated on agar. Both had been found to remain unaffected by the rays, or affected to a merely unsubstantial degree. Neither in test-tube nor in living tissues was any noteworthy influence observed. Ferments were no more affected by exposure to the rays than to other organic structures. Small living animals were killed by the Röntgen-rays; in case of mice, the lethal dose ranged between 20 and 30 r. Experiments on animals will perhaps furnish data for a judicious regulation of the dosage. The fluids and secretions of the human organism were not affected when exposed to the rays in test-tubes. But these exercised a rather considerable influence on the lymphoid tissues, on the bone-marrow, and on the lymph-follicles of the walls of the alimentary canal. The degenerated thymus gland was found to take on a regenerative growth under the influence of moderate doses; when large doses were administered it was completely destroyed. The following effects were noted and classified:

Blood: at first, hyperleucocytosis; afterwards, hypoleucocytosis. Eyes: where the eye was considerably affected, tendency to formation of cataract under exposure was especially noticeable in case of young animals. Nervous system: in young animals, there was a decided tendency to form a Röntgen-ray effect; not in case of old ones. This tendency in young animals was by some observers seen to be influenced. Such influence was not, however, noticeable in the cases observed by Krause. The liver displays but little radiosensitivity; the kidneys just as little. In the growing stage the mammary gland showed the same, so is the thyroid; neither is so after completion of its development, in any of the animals experimented on. The lungs, bones, and cartilages display little radiosensitivity. Krause had repeated the experiments which had been made in the United States and had constructed large tables of results, which included both his own and those that had been obtained by others. The skin displays dermatitis of the first, second, and third degrees; at later periods secondary changes appear, in the form of Röntgen carcinoma. In one case scleroderma was observed to occur. The condition of the blood is very amenable to the influence of the rays. The first manifestation of their influence appears in the form of a hyperleucocytosis; this is followed by a decreased proportion of leucocytes present. The presence of leucocytes is not clearly demonstrable. With regard to the eyes, a stimulating effect on the conjunctiva, cornea and choroid was always observed. A tendency to the formation of a drop-like opacification of the surface of the lens was also noticed. Children under the age of three must be warned off from the Röntgen-rays, but they
are not injuriously affected by the degree of exposure necessary for diagnostic purposes. The peripheral nerves are not injuriously affected. The President, in degenerative the theories which had been offered in explanation of the influence of the rays on the skin. According to some authorities, the cells were directly affected, especially the young and vigorously proliferating ones. According to others, the destruction is attributed to the photodynamic effects, the lecithin hypothesis, and the destructive action of the ferments. In summarising, he reproduced a table from Wetterer, in which the respective degrees of sensibility of healthy and pathological tissues to the action of the rays were placed in order according to the reports of the various observers. And we find that their effects are so graduated that small quantities stimulate, while moderate dosage restrains, and large doses kill.

The Influence of the Röntgen Rays on the Ovary.

Dr. Reifferscheid (Bonn), Vice-president, then read a communication on "The influence of the Röntgen-rays on the ovary in the animal and in the human organism." The author had carried out extensive experimental and histological investigations in this department, which he had arranged and carried out on the white mouse. He demonstrated the fact that in this animal grave degenerative processes were produced in the ovary by exposure to the Röntgen-rays, which are manifested in grades varying from the degeneration of the epithelium of the follicles to complete dissolution of the same, and to destruction of the ova themselves. Under the influence of large doses even the stroma was greatly injured. In case of larger animals, it was also found that corresponding degenerative processes were brought about in apes and dogs, for example. The similarity of histological structure tends indeed to lead us to anticipate that corresponding conditions will inevitably cause the production of similar alterations in the human body. And in fact the experiments which had been carried out by the author on the condition in which he had applied to seven human ovaries, with a dosage of from 5 to 30 vistas, demonstrated the fact that degeneration of the follicular epithelium and the ova resulted in the same way from the action of the rays. Thus, a positive histological foundation for the therapeutic employment of Röntgen-rays in gynaecology was proved to exist. In addition, the occurrence of haemorrhages of greater or less extent was always noticed in the ovary which had been experimented on; these haemorrhages in general were not marked, but in specific cases the blood was found to have a larger collection and which had always found, in every one of a great number of experiments which he made on the living ovary in various animals, that no regeneration of the ovarian structures which had been injured by exposure to the Röntgen-radiation was ever attempted, which he had observed after doses which had once been destroyed could never be restored. The only example of regeneration observed has been of a vicarious form; when the neighbouring follicles that had nearly reached maturity had been destroyed, while the approximation of the stage of ripeness remained unimpaired, one of the latter was found to attain maturity after the lapse of some time. This communication was illustrated by many microscopic sections, of which the figures were projected on the screen.

The Biological Effects of the Röntgen Rays.

Dr. Simmonds (Hamburg), Vice-president, made a communication on "The Biological effects of the Röntgen-rays on the Testicles." Here the influence of the rays was manifested solely by their effects on the spermatoblasts—the other cells all remaining unaffected. After having passed through a latent stage of two or three weeks, the spermatoblasts break down, and the seminal tubes are filled with masses of debris only. Functional repair is possible through proliferation of the spermatoblasts which have escaped destructive injury; this fact was proved by experiences derived from observation on men and animals, who had been experimentally injured by exposure to the rays.

Hand in hand with the disappearance of the spermatoblasts appeared the active proliferation of the intermediate cells, while the fact that the latter carry out the function of production from the internal secretion is proved by the unabridged retention of sexual desire and of other sexual characteristics, even after the complete disappearance of the spermatoblasts. The Röntgen-rays annihilate procreative power, but not manhood. This communication was illustrated with a series of extremely beautiful microscopic slides projected on the screen.

Dr. Körncke (Poznań-Poldersdorf), Vice-president, then brought forward a communication on "The Biological Effects of the Röntgen-rays on Plants." This communicate vindicated the view that the influence of the Röntgen-rays on the most diverse forms of the vital activities of plants, and discussed in this connection the exhaustive photographic investigations which have been made, partly by the author himself, of the influence of the rays on manifestations of movement, circulation of plasma, turgescence, assimilation, formation of chlorophyll, cell multiplication and nuclear division. The net result derived from the whole of these experimental observations may be briefly summarised as follows: the germination of the seed is often promoted, and to a striking degree, by exposure to powerful Röntgen-rays, while, on the other hand, the corresponding rays have a distinctly retarding effect on growth—which retardation comes to be most manifest only after the lapse of some time subsequent to the radiation. The range of this interval depends on the object tested by the experiment, and on its physiological condition at the exact period of exposure to the rays. With moderate intensity of radiation, the retardation of growth was found to be merely transitory; while small quantities of the rays had the effect of promoting growth. No marked difference could be made out between the respective actions of the "hard" and "soft" rays. The various species of plants, and even the different individuals of the same species presented differences in their degrees of radio-sensibility. Up to the present, no practical application of the results obtained in this way to the objects of agriculture, could be said to have been definitely reached.

II.—Diagnostic Application.—Thorax and Abdomen.

Note.—Report of committee and discussion will be given in our next issue.

FROM OUR SPECIAL CORRESPONDENTS AT HOME.

SCOTLAND.

Dr. W. E. Carnegie Dickson,
Pathologist to the Edinburgh Sick Children's Hospital, has been appointed Director of the Pathological Laboratory, Royal Hospital for Disease of the Chest, City Road, London. Dickson was Lecturer on Bacteriology in the University of Edinburgh for a number of years, and on the appointment of Professor Robert Keith, the Chair of Bacteriology was converted into one of applied bacteriology, which Dr. Dickson now holds. He has been a most successful teacher, and has done a great deal of original research in connection with the study of the blood and on bacteriological subjects; he is the joint author of a standard work on pathology, and has recently written an excellent small manual on bacteriology.

The National Insurance Act in Scotland.

The administration of the Drug Fund formed the subject of a most excellently contributed article in the Scotsman of June 30th. The writer regards the Drug Fund as the most vulnerable point in the panel system. He points out that in the early days of the Act it was believed that 1s. 6d. would be more than enough to meet demands, and that for this reason
many doctors did not practise economy in prescribing. This
however, has been falsified, much as reports from several Insurance Committees for the first quarter of 1914 show that not only has the Drug Fund been exceeded, but the “floating sixpences” (Drug
Subvention Fund for instances), and the chemists’ bills will have to be discounted. This is due to the action
on the panel system, and the responsibility of checking it lies with the doctors and chemists, who
are the expert advisers of Insurance Committees, and hence in the hands of the Fund. Chemists’
committees can not only check improper items in
chemists’ accounts, but report on extravagant pres-cribing. It is, however, the fact that in some areas
two chemists are employed, that is, that in some parts to that we would have a salutary effect in this respect. It is highly probable that those who would stop using proprietary preparations, which are expensive for which satisfactory pharmaceutical substitutes exist, and also probably stop the prescribing of drugs which remain in the pharmacopoeia mainly as relics of past empiricism, there would be enough money for standardised modern drugs, something which has been long advocated. On the other hand, those who have had to forgo repeats would have to be considered.
In the opinion of the writer of the article, this question of prescribing must be seriously taken up by the doctors’ and chemists’ committees if they wish to prevent the reinstallation of the Approved Societies in place of, or to transmute the panel system, in itself a compromise, into a State Medical Service.
From the second annual report on the Insurance Act, issued the other day, it seems that in Scotland
the number of exempt persons is very few—not more than 5,000. The most important case of exemption is that of the share farming communities, which provide a savings scheme for their own members. In this respect, the number of exempt persons is very few, but the number of exempt persons is very few, and they have had an exceptionally light sickness experience. Only 50 per cent. of their claims were paid in full, owing to lack of funds at the contributors’ credit. The number of deposit contributors does not tend to increase. There has been during the year a movement towards absorption of small societies in large ones, which, actuarially, is in the right direction. As regards
Insurance Committees, in smaller areas the funds for administrative purposes are provided, and the Cod
mission are considering supplementing these. The magnitude of the work of collecting 12 million funds is obvious: it has been lessened by changing the duration of the members from 1 year to 2, so that there are nearly 23,000 lost cards, or 70,000, lying with the Commissioners, in spite of every possible step being taken to secure their return to their owners.
A curious deal has been heard during the year about sickness certificates. The matter has now been simplified by the adoption of a uniform form. The Commissions are advised that a doctor acting in good faith were not responsible for the action for damages for specifying the patient’s disease on a certificate. The cost of medical referees is to be borne on societies’ administration funds. As regards maternity benefits, doctors’ and midwives’ fees have increased over the work, but, of course, not on the scale, and any attendance given is better than before the Act. There is also an increase in the number of confinements attended by doctors, and a decrease of from 15 to 35 per cent., in the case of attendance at maternity hospitals. Cases of mis-spending on medical benefits have been very rare. Medical benefit has worked smoothly on the whole. The introduction of the medical card as a voucher, which was the chief change during the year, is proving a great encouragement to all concerned. The great difficulties presented by the introduction of the new insurance are overcome by the Insurance Committee are referred to. These are in effect the censuses of a constantly fluctuating population, and the expedients for paying the doctors for the two months on the tips which were n chosen doctors are mentioned. It is well known that the present question of the indexes is by far the greatest difficulty that clerks to insurance committees have to contend with. The report contains a number of other points of interest, to which we shall refer next week.

ADVANCE IN THE TREATMENT OF INFECTIOUS DISEASE.
At the farewell dinner given to Dr. John Brownlee
on his leaving Ruchill Hospital to be statistician to the Medical Research Committee in London, there
were present Dr. T. K. Dalziel, Dr. J. C. McVail, Dr. A.
K. Chalmers, Professor T. K. Monro, Mr. A. E. May-
lard and others, the company numbering about 120.
Dr. McVail, in replying to the toast, spoken by the
deputy chairman, Dr. Gibson, Professor of Midwifery
in the University, Dr. Brownlee said that he had been
from 14 years a superintendent of hospitals in Glasgow,
and having a fair acquaintance with the whole of the
modern developments of the science of medicine in
the scientific and administrative work, and treatment, he wished to say a few words in regard to the future of fever hospitals. The next great advance in medicine must come from fever hospitals. The great work of practical physiology of the scientific work which had been done during the last 10 years in medicine had been done from the point of view of infectious disease. He had received every consideration from the Corporation of Glasgow; he had an equipment in which the country had not had before. He had no doubt that the committee in Glasgow would realise that as they must supply laboratories, they also must supply sufficient men.

INCORPORATED GLASGOW DENTAL HOSPITAL.
The annual general meeting of members and sub-
scribers was held on the 30th ult. Among those present were the Dean (Dr. W. C. Anderson), Coun-
cillor Dr. Henry Whitehouse, Dr. Stromer, and Dr. Webster. The total number of operations was 16,058. During the year 27 students joined the Hospital for the full course of two years, and in addition eight for shorter periods, averaging 17 each year. Dr. William Beattie, said the work done at the Hospital was remarkable and the expenditure really small. Ex-Deacon-Convener James Macfarlane was appointed Vice-Preident of the Hospital and Chairman of the Board of Governors.

NATIONAL HISTORY SOCIETY OF GLASGOW.
Although materia medica is threatened with expul-
sion from the medical curriculum, neither botany nor
zoology is seriously menaced. At a meeting of the
National History Society of Glasgow, Mr. James
Stirton, M.D., exhibited some very rare mosses. Among
the species was Amblystegium Juratakanum Sch., which was got in France and the mosses by Mr. Sch.,
and Barbara Oubusula Lindb., from Bridge of Allan, a moss that has not hitherto been found out of certain parts of Sweden. Mr. John R. Lee exhibited
with notes, The Bryhnea, a new record for the Clyde, from Drumchapel: W. Polymorpha Schip., from Ben Naunain; and Trichotonium Tenneostre Lindb. var. Dalhinum De Not., from Glenfalloch. Mr. D. A. Boyd read a paper on "The Botany of the Clyde Waters," giving a number of new records. Mr. John Paterson read a paper on "The New Forest," giving a short account of the main features of the forest, and showing how these affect the plant life, in particular the tree forms, on which so much interesting notes with Glascow. An instructive account of the bird life of the forest was
also given, with many valuable observations on some of the rarer species.

**Ante-Natal Hygiene,**

Dr. A. K. Chalmers, Medical Officer of Health for Glasgow, has been reading a paper at the annual conference, held at Liverpool, of the National Association for the Prevention of Infant Mortality. His subject was "Ante-Natal Hygiene and its Relation to Still and Premature Births in the First Months of Life." In the course of his address he said that from a table relating to Glasgow and dealing with deaths in the first four weeks from several causes per 1,000 births during 1891-1898, it was shown that the principal cause was immaturity. In conclusion, Dr. Chalmers said that Dudley and Ballantyne especially had recently focussed the argument for the registration of still births in a convincing manner, and that until some such movement as that of a national league for the reduction of the mortality from premature births should be instituted, much of the obscurity which surrounded post-natal deaths from immaturity would remain.

**LETTERS TO THE EDITOR.**

[We do not hold ourselves responsible for the opinions expressed by our Correspondents.]

**IMPERIAL ASPECTS OF THE POPULATION QUESTION.**

To the Editor of The Medical Press and Circular.

Sir,—To those who recognise the full significance of the falling birth-rate as a prime factor in shaping the destiny of our country and our empire, it is satisfactory to notice the increasing attention which it is gaining from statesmen and the Press. Not only the Medical Press and Circular, but also the Times of to-day and the Journal of Philanthropy, have in the last months devoted to the subject far more space than is given to the question of our national defence. The efficiency of the means by which all these evils can be mitigated and speedily put an end to has been proved by experiment. The number of our unemployed can be reduced to a minimum. We need not compel our sailors to go to sea. We might offer a home across the seas to every decent subject for whom a place could not be found in these islands, and we could make the conditions so attractive that multitudes would avail themselves of the opportunity. To do this is no doubt due to economic pressure among some sections of society. For this remedies might be found, and it is to be borne in mind that children are the emigrants most in demand. The fall in our birth-rate is most conspicuous among the classes upon whom the rearing of a large family imposes no real burden. The motive in most of these cases is financial and in France is entirely anti-social and anti-patriotic. It is of a moral disease which, as the French experiment has proved, is fraught with danger to our country and our empire.

I am, Sir, yours truly,

HENRY SEWILL.

The Old Rosery,
Earlwood Common.
July 1st, 1914.

**OPEN SPACES AND PUBLIC POLICY.**

To the Editor of The Medical Press and Circular.

Sir,—Discussing the root causes of the evils described by Dr. Fletcher Little in my last letter I wrote as follows: "No people with any feeling for beauty would allow for one day in the very centre of the capital of the Empire the existence of that queer jumble of incongruous caricatures of architecture and art formed by Trafalgar Square. It is interesting to note that the same writer in the Times has, since my letter appeared, expressed the same view. M. Abel Hermant, who has lately visited London, describes Trafalgar Square as "The most frightful place in the world," and the New York Evening Post, I believe, is of a similar opinion. It is really astonishing that so little has been done to improve the square, which is the gateway to Parliament and the West End, and is the first space upon which the eyes of foreigners rest when they arrive at Charing Cross. Why not impose a dignified style of architecture upon the surrounding buildings? The haphazard methods of London builders and the utter indifference of the authorities to any kind of aesthetic Hygiene have surely had their day."

The answer to M. Hermant is that suggested in my letter—the British people at the present day lack the aesthetic sense which is an indispensable attribute of a really civilised race.

I am, Sir, yours truly,

AN ARCHITECT.

July 4th.

Mr. A. Hopewell-Smith, L.R.C.P., M.R.C.S., L.D.S., John Tomes Prizeman of the Royal College of Surgeons of England, and Surgeon and Lecturer on Dental Anatomy and Physiology at the Royal Dental Hospital of London, has been appointed to the Chair of Comparative Odontology and Dental Histology which it has been decided to establish in the University of Pennsylvania at Philadelphia.
OBITUARY.

DR. C. T. VACHELL, OF CARDIFF.

We regret to record the death of Dr. Charles T. Vachell, J.P., the well-known Cardiff physician, who took his place on the staff of the Monmouth Infirmary at Clifton, where he had been undergoing treatment for a chronic malady. The deceased, who was born in 1845, qualified M.R.C.S.Eng., in 1869, and became F.I.C. in 1877. After holding house appointments at King's College Hospital, London, and the Glamorgan and Monmouth Infirmary, he became attached to the medical staff of the Cardiff Infirmary. Dr. Vachell was Consulting Physician to King Edward Hospital, Cardiff, an ex-President of the South Wales Branch of the British Medical Association, President of the Cardiff Naturalists' Society, and Honorary Curator of the National Museum of Wales. He was also formerly a Surg.-Lieut.-Col. of the 2nd Glamorgan Volunteer Artillery. Dr. Vachell took an active part in Welsh educational affairs.

REVIEW OF BOOKS.

AIDS TO MEDICINE. (a)

The object of this little work is to supply the student with books for revision purposes and to carry about, and provided its use is limited to such purposes we consider that the publication is of undoubted service. There is given a brief résumé of the chief points regarding etiology, diagnosis, pathology, treatment, etc., of the most important maladies. The book has been revised and some new matter has been added. We are rather surprised to find that the author has placed chrome under the heading of nervous diseases, as this hardly coincides with the more modern conception of the etiology of this affection. We might also suggest that a short section on Baciliria should be included in the next edition. Judiciously employed, this small volume should prove useful, not only to the late of his examinations, but also to the busy practitioner or to the memory of many useful items of knowledge too easily forgotten in the rush of everyday work.

HERBAL SIMPLES. (b)

Is the "calling of simples" be a lost art in the twentieth century? We doubt it! We believe that the claims of herbal physic to therapeutic recognition have hitherto been based more or less upon empiricism. But there are signs that the remedial properties of many of the discarded herbs, seeds, and roots of the gardens and countryside are ben to be more appreciated as medicines. Scientific analysis has pointed out the virtues of many an obscure plant, so that at the present time the orthodox practitioner need not consider the use of approved herbal remedies beneath his notice when his customary medicines fail or are beyond speedy speed. For those desiring a detailed exposition of the healing remedies of every conceivable medicinal plant the work of Dr. Fernie may be cordially recommended. The veteran author, with a charm of language all his own, has, in the third edition of this unique handbook, incorporated several portions of his "Meals Medicinal," and he has given us a delicious compendium of folk-lore, medical history, botany and pharmacology. Its pages are replete with classic extracts and fragrant with the odor of rare and precious herbs for use in the healing of mankind. Here will be found all that is worth knowing about lavender and lettuce, mushrooms and mint, seed and spices. It deals with disease in alphabetical order, and there is an index of diseases indicating the dose for each. It is a book that may be read and re-read both for profit and pleasure, and the demand for it is sure to be great.

HEALTHY OLD AGE. (a)

The desire to live long and to see many days is innate in the majority of people, but so often the road to old age is anything but smooth, physically speaking. Many of the ills that beset the individual or near the end of his days are due to neglect of care and attention to be paid to hygiene and especially to diet. The little series of essays before us deals specifically with the prevention and treatment of the diseases that belong more or less to advancing years. The author believes that the true old age of a healthy folk should be nearer fourscore than seventy years, and that the extra years should not be those of labour and sorrow. The chief cause of the mortality in persons over sixty years in certain Australian and British, in connection with Bright's diseases or to the non-tubercular chronic chest diseases that are so frequently associated with them. Arteriosclerosis, consequently, receives special attention, and the advice given for the reduction of the tension of the blood pressure by diet, is sound and helpful. The author's son, Surgeon Gilbert Boody Scott, R.N., contributes a chapter upon the preparation of vaccines. Altogether this little book deserves a careful perusal by every medical practitioner.

A HANDBOOK OF HYGIENE. (b)

The present edition of this well-known manual, which has long been a favourite with students and practitioners, is further enriched by a thorough revision. The all-important question of the contamination of milk, more especially in relation to tuberculosis, is fully discussed, and recent official reports upon the subject are freely drawn upon. The section upon food-poisoning embraces those conditions due to the ingestion of some chemical poison (ptomaine) or to bacterial infection with organisms of the true Gaertner group. An account is also given of "onchocerciasis," a parasitic affection found in certain South American and American meat. In dealing with bread, the authors believe that the agitation in favour of a standard loaf will not have proved useless if it results in the creation of a public opinion adverse to any undue manipulation of grain during the milling process. Once permit the removal of certain portions of the grain, and the way is left open for chicanery of all sorts." A good account is given of pellagra, which is grouped under the heading of "Intoxications," and the theories regarding the etiology of beri-beri are adequately discussed. The question of venereal diseases is much more fully dealt with than is usual in a textbook of hygiene, and the authors, while asserting that "compulsory examination and registration of prostitutes is, therefore, merely tinkering with the fringe of the problem," believe that "the general feeling of the medical profession, in this country at least, would certainly not be in favour of what the majority would look on as a breach of professional confidence." The section on communicable diseases and their prevention is packed with information; indeed, it would be difficult to pick out any part of this excellent textbook which is not replete with the latest information upon the subject. In the "Addenda" of eight pages are contained some valuable notes from various official reports bearing upon the different sections of the book. We have pleasure in recommending this work as a trustworthy guide to the science and art of preventive medicine.

(a) "Aids to Medicine." By Bernard Hudson, M.D.Camb., M.R.C.P.Lond., Visiting Physician to the Queen Alexandra Sanatorium at Davos, late Assistant Physician to the City Road (Beth Israel) Hospital, etc. Second edition. London: Balliere, Tindall & Cox. 1914. Price 6s. 6d. net.

BOOKS FOR MOTHERS.

The seventeenth authorised edition of Dr. Chavasse's well-known handbook (a) upon the management and rearing of children has been re-arranged and re-written by Dr. T. D. Lister. The matter has now been placed in chapter form, thus doing away with the old method of dealing with the subject in a question and answer. The book, which has been a favourite among works of this class, cannot fail to enjoy continued popularity. The general directions with regard to giving drugs to children and to obtaining medical advice are improved with the use of a useful portable dictionary of useful appliances, medicines and sundries is placed in an appendix.

Another work of a similar, though less pretentious, character is Mrs. Usher's "Book for Mothers" (b), to which Dr. F. D. Rutter has contributed an introductory note. The following extract will illustrate the general character of the book:—"When the child gets a blow on the head, 'Pomade Divine' is the very best thing to put on." If a child has swallowed a pin or a piece of paper or anything sharp, send for a doctor, and a small piece of adhesive plaster (sic) can now use Röntgen-rays. Nevertheless, there are many useful hints, imparted in a homely style, which serve to render this little work a useful guide to mothers of the less educated classes.

MATERIA MEDICA, PHARMACOLOGY, ETC. (c)

It has been said that of late years the art of prescribing is in danger of becoming lost. That it seems to be so is due to the fact that the action of pharmaceutical remedies is largely taught apart from the bedside and also because a large number of drugs appear never to be used at all. Drugs, like everything else, have their day, no doubt, but the old adage that "the old fashioned medicines are the best" is still held in favour of the newer rivals. In the book before us the author has endeavoured throughout to emphasise the clinical aspect of each remedy described. The first portion deals with the various chemical and mechanical properties, and the second with methods of administration; the third section deals with prescription writing, and it contains many valuable hints for prescribers in general.

However, these are comparatively small points at which to cavil, for Dr. Basted's text-book contains far more practical information that is likely to be of real benefit to the student than the majority of similar works. An unique feature is the inclusion of several photographs of various drug eruptions, cartographic tracings, and X-ray pictures of the intestines. The third section deals with prescription writing, and it contains many valuable hints for prescribers in general. The index, though comprehensive, is far from complete, and it might be amplified. Dr. Basted is to be congratulated on recommending this manual as being a full and accurate guide to the use of remedies in the treatment of the sick.

CHEMISTRY AND ITS BORDERLAND. (a)

This is a good example of a book dealing with scientific facts, popularly written, designed to attract the attention of that reading public glad enough to gather up some pearls of science whose value they can recognise. Its purpose is to give the general reader an introduction to chemistry, and, to chemistry, and the author's aim is to show the relationship which this science bears to the other fields of scientific knowledge. In order to render his pages more comprehensible to non-technical readers, the author has dispensed with chemical jargon, but scientific advancement has taught us that the sciences with which chemistry has become closely allied are astronomy, physics, geology, physiology and pathology. The development of this theme is simple enough, and as the introduction to the subject of chemistry, it is scientific, but so well has the author succeeded in stringing his facts together that even by the scientist, the admission must be made that in the ground covered by the pages of this work, science is presented in a most attractive and lucid light. In the chapter on the relations between chemistry and industry, many facts are disclosed which cannot fail to instruct and interest the ordinary reader, and the same is true in respect to the chapter on immunisation. We have here a kindred voice of our city thorough, a subject to which references frequently occur in the newspaper press, and here we find a concise account of its discovery, its properties and uses, expressed in plain and untechnical language, which will satisfy little the reader of science but will be of use to many of the non-scientific reader.

There is a useful chapter on the Organisation of Chemical Research, describing the various channels open to the student in chemistry, by which his studies can be encouraged and helped as, for example, through a grant from the Research Grants and Research Scholarships. Herein, too, the student may learn the prospects in store for him, by adopting chemical research as a profession. It only remains to be added that the author has produced an interesting and attractive work, thoroughly deserving of a wide popularity.

YOUTH. (b)

This series of National Health Manuals is one of the characteristic features of the popular science harvest of the present generation, with its active and avowed object of bringing up the supply of the mental빈, and perhaps in symbolic writing, to the standard plane of the wave-front of the science and intelligence of his expert contemporaries. The present excellent booklet well represents the best features of this significant literature, which has so much influence on the attainments and outlook and consequent achievements of the rising generation. How widely the popular net is cast, and how reliable the quality of its scientific and moral, and generally educational and social, meshwork is, may be roughly guessed at by reference to the list of headings of the various (twelve) chapters; for the production and standardisation of each of which a distinguished name is found to be responsible. The introductory chapter deals with the general subject covered by the title of the volume, followed by consecutive series respectively devoted to: Growth and Development in Youth, Psychology, Hygiene of the Adolescent Girl, Mental Defects and Disorders, Education, Habits, Ethics, and Citizenship—all of the fruitful, as well as veracious, and often highly troublesome period of youth. How important the younger persons of our twentieth century must feel they are themselves, or that modern parents are being hourly provident for the support and propagation of this opinion! Full investigation of even any one of the series of endlessly labyrinthine questions discussed in this booklet, would be impossible within the limits of an ordinary review.

(c) "Youth." Edited by W. R. K. Kitching. M.D. London: Charles A. Kelly (National Health Manuals).
so we conclude our perfunctory notice by strongly recommending this comprehensive and intensely suggestive subject, and the collective theses thereon, here presented, to the close attention of every one of our readers.

NEW INVENTIONS.

WATTERS' STANDARD CHLOROFORM CATGUT.

MESSRS. ARNOLD AND SONS, surgical instrument manufacturers, have been appointed sole agents for the sale of Watters' standard chloroform catgut.

The principal points and advantages claimed for it are that it is cheap and convenient, and is the only catgut preserved in chloroform, which does not, like alcohol, cause the gut to become hard and brittle. It is easy to work with. The chloroform evaporates instantly, leaving a smooth, dry and pliable material. Another point is its absolute and unquestionable sterility, which eliminates entirely the danger of infection. It is also much stronger than any other, which permits the use of smaller sizes, imposing less burden upon the wound in the process of absorption. Its extensibility permits of its being closed and fastened close and fast with the minimum of strain.

It is antiseptic as well as aseptic, which prevents contamination in handling, and guards against the danger of the gut acting as a culture medium for the propagation of infection already in the wound.

INVESTIGATIONS by Major S. P. James, of the Indian Medical Services, show that of the fifty species of mosquito in Colombo only fifteen are harmful. Of the species observed some were previously unknown to science. Henceforward officers of the I.M.S. are to take a two-months’ course of tropical medicine immediately on arriving in India.—Indianman.

MEDICAL NEWS & PASS LISTS.

The Royal Medical Benevolent Fund Society of Ireland.

At a meeting of the Central Committee held at the Royal College of Surgeons of Ireland, it was stated that a donation of 20 guineas had been received from the President of the Royal College of Surgeons of Ireland. It was unanimously resolved: “That the thanks of the Central Committee be given to Mr. Conway Dwyer, President R.C.S., for his valuable donation of twenty guineas to the funds of the Society, and that he be hereby elected a life member of the Society.” Urgent applications, which were received too late for the annual distribution, were considered, and grants amounting to £24 were made, and bills amounting to £21 were paid for payment.

The Milk and Dairies Bill.

At a meeting of the Parliamentary Committee on Food and Health held at the House of Commons, and presided over by Mr. Charles Bathurst, M.P., on Friday last, the following resolution was moved by the Chairman, seconded by Sir W. Phipson Beale, M.P., and carried unanimously. The Parliamentary Committee on Health cordially supports the Milk and Dairies Bill and Milk and Dairies (Scotland) Bill, as measures designed to secure to the community an unrestricted supply of pure milk, with the minimum amount of danger to the consumer. While recognising them to be capable of improvement in some details, it earnestly depreciates the insincerity on drastic amendments, as calculated gravely to imperil the passage of Bills long overdue and of vital importance to the health of the people and of children. The Committee trusts, however, that a clause, sanctioning the sale of ‘certified milk,’ which is in the United States has played so conspicuous a part in raising the milk standard and in forming public opinion in favor of pure milk, is in the general consent and in the interests alike of producers and consumers, be included in both measures,”

Naval Medical Reserve.

It is announced that, with the view of affording officers of the Naval Medical Reserve opportunities of keeping in touch with the Naval Service in time of peace, the King has been pleased, by an Order in Council published in the London Gazette on June 19th, to approve of the establishment of a two-months’ course of instruction during peace under the following conditions:—[1] To receive full pay at the rate of £175 a day while re-employed or undergoing courses of instruction; (2) to be under the same conditions as regards pension, etc., in case of death or injury as would be applicable in the event of their being called upon to serve in time of war or emergency.

Medical Meeting at Worthing.

The inaugural meeting of the newly-constituted Sussex Branch of the British Medical Association was held at Worthing the other day. Dr. Ayton Goodchild, of Worthing, was elected the first chairman of the Branch. After the transaction of formal business, the members, numbering about 40, were entertained by Dr. and Mrs. Gustling to lunch, and subsequently to a garden party at their residence in Richmond Road.

Royal Hospital for Incurables—Annual General Meeting.

The annual general meeting of the Royal Hospital for Incurables, Donnybrook, was held in the Board-room of the Hospital last Wednesday, William Fry, J.P., Chairman of the Managing Committee, presided.

The annual report stated:—The Hospital at present contains 213 beds, and during the past year there were no less than 283 applications for admission; of the successful candidates ten were affected with consumption, nine with cancer, ten with paralysis and nervous diseases, four with cardiac and vascular diseases, four with rheumatism and arthritis, the remaining 102 were affected with various forms of incurable disease. In addition to filling the beds at each election, and with a view to further extending the benefits conferred by the Hospital on suffering humanity, the Governors elect two patients as pensioners, and who receive a weekly cash allowance from the funds, pending their admission to the Hospital. It is interesting to record that, of the 213 patients remaining in the Hospital on March 31st, 1914, no less than 35, or over 16 per cent., were affected with paralysis or incurable diseases. The time spent in the Hospital by these sufferers amounted in the aggregate to 47 years 6 months, giving an average of 6 years and 7 months for each patient. These particulars are furnished to prove that health and suffering are not restricted to the poorer classes, and that the patient who is incapacitated for work, and is provided with food, clothing, and medical attention, is taken care of as long as he is able to retain his faculties, and is willing to try to support himself. The total cost of maintaining a bed, all charges included, amounted to £17 4s. 6d., which is practically the same as last year. The average attendance of Governors at the eight evenings held during the year was 15, as compared with 148 the previous year. It is interesting to state that at an election for female patients, held on December 10th, 1913, no less than 228 Governors were present in person to vote, a
record attendance at an election of patients. The ordinary expenditure side of the account shows a decrease, £2,817 3s. od., as compared with £5,888 10s. 4d., which, with the increase in the age of the patients, which may be regarded as satisfactory, having regard to the increased cost of living and provisions.

University of Durham Faculty of Medicine.

At the Convocation held on Tuesday, June 23rd, 1914, the following degrees were conferred:


Bachelor of Medicine—James Toseph, John H. J. Toseph, John J. Toseph, Joseph John (Chemistry H. Butterly, Medicine."

The following received the Licence in Dental Surgery (L.D.S.)—John T. Smith, Sidney Wilkinson.

At the second examination for the degree of Bachelor of Medicine the following candidates satisfied the examiners:

Matury and Physiology.—William Andrew Hewitson, honours, first class; Harold M. Leete, honours, second class.


The following candidates passed the third examination for the degree of Bachelor of Medicine—


University College, Dublin.

The examiners have made the following recommendations to the Senate—

First University Examination in Medicine—

Honours: Thomas F. M'Kinney, M.A., first-class honours Parts I. and II.; Nicholas Maher, ditto; Michael H. Murphy, ditto; Michael H. Murphy, second-class honours Parts I. and II.; James H. O'Connell, ditto; Hubert Mcken, second-class honours Part I.; John F. Cunnigham, ditto; Thomas J. Murphy, ditto; James J. Gullick, ditto; James J. Gullick, second-class honours Parts I. and II.; Charles J. Smurthwaite, ditto; James J. Gullick, second-class honours Part I.; John W. Healy, second-class honours Parts I. and II.; Joseph B. M'Arevey, second-class honours Parts I. and II.; William J. O'Connell, ditto.

University College, Galway—Provisional Results.

The following are the recommendations of the examiners for the summer term, 1914:

Medicine.—Second-class honours: Michael Hanly.


University College, Dublin—School of Physic.

The following passed the preliminary scientific medical examination, Trinity term—


Physics.—Lionel Wigoder.

Botany and Zoology.—Richard P. Hemphill, Lindley Albertyn (Jr.), Archie Acheson, Richard G. M'Elwee, equal; James F. O'Sullivan, on high marks; Edward W. Wilson, Gertrude Rice, William B. Briggs; Sidney A. Clark and Wilfrid L. Lloyd, equal; William L. Young; George H. Davis and John W. Scharff, equal; Samuel W. Russell; Ernest B. Edge and Albert H. Thompson, equal; Charles W. Parr, Henry A. Larelle; Robert M. D. Dove, Ernest E. Rollins and William F. M'Connell, equal; John E. McCormick, John H. Coolican, Thomas Madill, and John F. Stewart, equal; Ernest F. W. Smith, Edward R. Birdseye, Eric S. Eack, equal; Ernest E. Rollins and Ivan W. Beatty, equal; Athisus Blagoff, Thomas R. Warren, Richard N. Nunn, Herbert J. Wright; George C. Robb and William W. Shortt, equal; John Ryan, equal; Patrick Casey; Frederick W. Godfrey and William A. Shannon, equal; Samuel J. Laverty, George R. G. Smyth.

Trinity College, Dublin—School of Physic.

The following passed the preliminary scientific medical examination, Trinity term:


Physics.—Lionel Wigoder.

Botany and Zoology.—Richard P. Hemphill, Lindley Albertyn (Jr.), Archie Acheson, Richard G. M'Elwee, equal; James F. O'Sullivan, on high marks; Edward W. Wilson, Gertrude Rice, William B. Briggs; Sidney A. Clark and Wilfrid L. Lloyd, equal; William L. Young; George H. Davis and John W. Scharff, equal; Samuel W. Russell; Ernest B. Edge and Albert H. Thompson, equal; Charles W. Parr, Henry A. Larelle; Robert M. D. Dove, Ernest E. Rollins and William F. M'Connell, equal; John E. McCormick, John H. Coolican, Thomas Madill, and John F. Stewart, equal; Ernest F. W. Smith, Edward R. Birdseye, Eric S. Eack, equal; Ernest E. Rollins and Ivan W. Beatty, equal; Athisus Blagoff, Thomas R. Warren, Richard N. Nunn, Herbert J. Wright; George C. Robb and William W. Shortt, equal; John Ryan, equal; Patrick Casey; Frederick W. Godfrey and William A. Shannon, equal; Samuel J. Laverty, George R. G. Smyth.

John D. Watson.

Botany—James M. Hill.

Intermediate medical examination—

Part I.—Edward D'A. McCrea, William R. Fearon and Bryan A. O'Sweeney, passed on high marks; Alexander R. Barlas and Arthur L. Gregg, equal; Randolph B. Murray, William P. Elford, William H. Flynn and Stanley C. Mitchell, equal; James J. Beasley and Willem P. Lubbe, equal; Frederick J. Smith; Charles P. Chambers and George W. B. Shaw, equal; Philip S. 5nell, William...
NOTICES TO CORRESPONDENTS, 8c.

Dr. Henry Hutchinson Stewart Medical Scholarship (Anatomy and Institutes of Medicine).—Alan F. Grinstead.

The Daniel John Cunningham Memorial Medal and Prize.—Edward D'A. McCrea.

The Fitzpatrick Scholarship.—John D. Oliver.

Licentiate in Medicine, Chirurgia et Arte Obstetricia.—Edwardus Evans, Jacobus Henrikus Fletcher.

Baccalaureus in Scientia Dentaria.—Mary de Sales Magennis.

Baccalaurei in Medicina, in Chirurgia, et in Arte Obstetricia.—Theodoricus Wright, Albertus I. Pope, Banke, Augustinus Linn, Fredericus I. Alix, Alexanus Wood.


Edinburgh University.

The following candidates have passed the final examination for degrees in medicine and Surgery (M.B., Ch.B.)—Edvardus I. Alexander, Christophorus D. H. Dockrill, Samuel E. Elliott, William O. Tobias, Amy F. Nash, John S. Dockrill, James H. Fletcher.


Preliminary scientific dental examination:—Chemistry and Physics.—Henry E. Flavelle, John H. S. Stuart.

Chemistry.—Lionel Wighoder.

Dental Anatomy.—Henry E. Flavelle.

Intermediate Dental Examination:—Maurice L. Connham, Charles H. Herbert.

Final Dental Examination:—Mathias S. Magennis.


Scholarships and Prize Examinations:—Surgical Travelling Prize and Bennett Medal.—Arthur Chance, M.B., Bennett Prize for Surgery.—Georgia Revington.

Medical Scholarships:—Anatomy and Institutes of Medicine.—Robert C. B. Ramsay.

Chemistry, Physics, Botany, and Zoology.—Harry E. Parker.

Dr. Henry Hutchinson Stewart Medical Scholarship (Anatomy and Institutes of Medicine).—Alan F. Grinstead.

The John Mallet Purser Medal.—William R. Fearn.

The Daniel John Cunningham Memorial Medal and Prize.—Edward D'A. McCrea.

The Fitzpatrick Scholarship.—John D. Oliver.

The following degrees and degrees were conferred at the commencements on June 30th:—

NOTICES TO CORRESPONDENTS, The Medical Press. 53.
Conferences are kindly requested to send their communications to the Editorial office, to be handed to the Editor at the London office, 8, Henrietta Street, Strand; if resident in Ireland to the Dublin office, in order to save time in redrafting the same. Wherever sending sub-
scriptions the same rule applies as to office; these should be addressed to the Publisher.

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For One Insertion—Whole Page, £5; Half Page, £2 10d.; Quarter Page, £1 3s.; One-eighth, 6s. 6d.
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Small advertisements of Practices, Assistantships, Vacancies, Books, etc.—Seven lines or under (70 words), 4s. 6d. per insertion, and 2s. 6d. per word beyond.

Original Articles or Letters intended for publication should be written on one side of the paper only and must be authenticated by a certificate of authenticity from the author or writer, not necessarily for publication, but as evidence of identity.

Prints—Reprints of articles appearing in the Journal may be had at the rates prescribed, provided after giving notice to the publisher or printer before the type has been distributed.

This should be done when returning proofs.

M.B., B.Ch. (Kenty).—The red sulphide of mercury is preferable to the ammoniated salts in dealing with skin infections of the scalp. It may be combined with sublimate sulphur with advantage.

Dr. A. R. (London, S.E.).—The case appears to be a peculiarly one suitable for treatment by psychotherapy. There is a physical basis for the mental symptoms. N. R. (Brighton).—There are very few lepers in London at the present time, but the Hospital would doubtless be able to study the general characteristics of the disease in the wards of the Seamen's Hospital, Greenwich.

Vacancies.

West Harptpool:—Cameron House. — House Surgeon. Salary £150 per annum, with board and rooms. Applications to J. G. Taylor, Secretary.

Camberwell Tuberculosis Dispensary, 19 Brunswick Square, S.E.—Assistant Medical Officer. Salary £250 per annum. Application to the Secretary.

University of London, University College.—Lecturer and Demonstrator in Anatomy. Salary £150 per annum. Applications to Walter W. Seton, M.A., Secretary, University College, Gower Street, W.C.

Bradfield General Hospital.—House Surgeon. Salary £100 per annum, with board, residence, and washing. Applications to红色 Conservative, 24 Gower Street, W.C.

Birmingham General Dispensary.—Resident Medical Officer. Salary £250 per annum, with furnished apartments, fire, light, and attendance. Applications to Ernest W. Forrest, Secretary, 32 Union Street.

Hubert Street, Darlington:—Stretford Road, Manchester. — House Surgeon. Salary £150 per annum, with apartments, attendance, coal, and gas. Applications to Honorary Medical Officer, 49 Stretford Road, Manchester.

County Borough of Preston.—School Medical Officer, Salary £250 per annum. Application to the Honorary Medical Officer, Town Clerk.

County Borough of Salford:—Perse Hospital.—Junior Resident Medical Officer, Salary £250 per annum, with apartments, etc. Applications to L. C. Evans, Town Clerk.

Weston-super-Mare Hospital.—House Surgeon. Salary £200 per annum, with residence, board, and hospital in the district. Application to the Honorary Medical Officer, 80 Birkenhead Road, Weston-super-Mare, S.E.—Second Assistant Medical Officer, Salary £253 per annum. Applications to John L. Workshop Acts, Southwell Royal Hospital, New Bridge Street, E.C. (See Advt.)

Appointments.

DEANS.—H. V., M.R.C.S., L.R.C.P.Crow.—House Physician at University College Hospital.

DICKINSON, W. E., M.R.C.S., L.R.C.P.—Registrar in the Department of the Royal Hospital for Diseases of the Chest, City Road, E.C.

GERRARD, J. C., F.R.C.S.—Senior Demonstrator in Surgery under the Workmen's Compensation Act, 1906, for County Court Circuit E.


JOHNS, HOWARD, M.B., B.Ch., M.R.C.S., L.R.C.P., Honorary Physician to St. Mark's Hospital for Diseases of the Skin.


NYE, CHARLES, M.B., B.Ch., M.R.C.S., L.R.C.P.—Medical Officer of Health of Bromley.

RICE, F., M.B., B.Ch., M.R.C.S., L.R.C.P.—Obstetric Assistant at University College Hospital.

STOKES, F. J., M.R.C.S., L.R.C.P.—Assistant Dental Surgeon at the Royal Dental Hospital.

TURNER, E. B., M.B., B.Ch., M.R.C.S.—Surgeon, Westminster Hospital College Hospital.


FINN.—On June 24th, at 15 Elberry Street, Easton Square, S.W., the wife of Allan Finn, M.D., F.R.C.S.—A son.

GREEN.—On June 24th, at 24 Hampshire Road, Earlsfield, the wife of Charles David Green, M.R.C.S., L.R.C.P., Eng., of a daughter.

HOLLAND.—On June 24th, at 13 Berwick Road, Palmer's Green, London, N., a baby girl, 3lbs. 4oz., to Mr. and Mrs. W. Hollis.—Molly—8s.

LYON.—On June 24th, at 53, Acreca Road, N.W., the wife of T. B. Layton, M.S., of a daughter.

MARSHALL.—On July 1st, at 46, West End, Ealing, the wife of Mr. Henry Marshall, of a daughter.

PITKE.—On June 24th, at Richmond House, Langford, Somerset, the wife of Ernest P. Mace, M.R.C.S., L.R.C.P., Eng., of a daughter.

Marriages.

ABBEY.—On July 1st, at the Roman Catholic Church, Richmondworth, William J. Ashley, M.D., B.Ch., B.A., of Arkley, and Miss Kathleen Ann Morley, youngest daughter of Hilda Lamore, second daughter of Mrs. Latimer Sayer, of Lake View, Northwood.

BACON.—On July 2nd, at Highfield Church, Earl's Heath, Lancet at Bromley, M.R.C.S., youngest son of Sir John and Lady Bromley, of Saffron, Sussex, to Doris Bullock, youngest daughter of Mr. and Mrs. Arthur Lee, High Close, Earl's Heath, Yorks.

CANE.—On July 2nd, at Trinity Wesleyan Church, Wealshaw, with the consent of the Minister, Catherine Jane Martin’s-in-the-Fields, Tringal Square, Lionel Charles William Jane, M.R.C.S., L.H.Sc., of London, to Elma, eldest daughter of Mr. and Mrs. Guyot, of Welbeck, Kent.

CRUMP.—On July 2nd, at Trinity Wesleyan Church, Hulme, the late F. S. Crump, to Miss Hedger Elizabeth, only daughter of Mr. and Mrs. Whitfield, of Salford, Manchester.

HOBBS.—On July 2nd, at St. George's Hanover Square, Basil Hughes, F.R.C.S., son of the late T. F. Hobbs, M.R.C.S., of Liverpool, to Jane Ann Sellars, of Swindon; London, of the late George Campbell, Surgeon, of Christ Church, London, of the late George Campbell, Surgeon, of Christ Church, London.

FAWCE.—On July 2nd, at Christ Church, Aughton, Robert Anthony Fawce, M.R.C.S., youngest son of the late Ernest Fawce, of Aughton, Cheshire, and Mr. Howes, of Ego, Sussex, to Doris Anna, daughter of Mr. and Mrs. Howes, of Ego, Sussex.

HUNTS.—On July 2nd, at St. Peter's Church, Birmingham, John Henry Hunt, M.R.C.S., L.L.B., of Coventry, to Miss Bertha Hope, of the late Mr. and Mrs. Smith, of the late Mr. and Mrs. Smith, of Coventry.


O'CONNOR.—On July 2nd, at St. Etheldreda's, the eldest daughter of the late Dr. W. M. O'Connor, of Bromley, Cheshire, and Miss Hall, of Ewell, Epsom.

ODER.—On July 2nd, at All Saints, Walthamstow, to Miss Dorothy Ursula, daughter of Mr. and Mrs. J. W. Oder, of the late Rev. Dr. Osger, of Oxford, to Mabel, youngest daughter of G. Randell Higgins, The Court, Boreham-
thorpe, Essex.


SEQUEIRA.—On July 2nd, at St. Matthias, Richmond, to Miss Grace Sequiera, R.N., Miss Grace Sequiera, R.N., of Engineer Rear-Admiral W. G. Littlejohns, of Stoke, Devonport.

Deaths.

ANDERSON.—On June 29th, at 3, Arundel Terrace, William Christopher Anderson, M.A.St.And., M.B., C.M.Ed., late of Chelsea, aged 49 years.

BETTS.—On June 29th, at Darjeeling, John Hay Burgess, M.R.C.S., L.R.C.P., late of 15, Ballymoney Road, to His Excellency the Governor of Bengal, aged 34 years.

FOSTER.—On June 29th, at Lilacross, as the result of an accident, Henry Richard Foster, M.R.C.S., L.A.S., and Mr. Horsels.—On June 29th, George Herschell, of 36 Harley Street, M.D., late of 37, Mayfair, as the result of a gas accident. John Augustus Hogg, M.R.C.S., L.R.C.P., aged 45, of 37, Mayfair, and 4th Avenue, Narragansett, R.I., Miss Roberts, L.D.S., to Robert Lowth, M.D., F.R.C.S., Eng., in his 73rd year.

MAGS.—On June 30th, at Bury Hatch End, George Maggs, M.D., aged 89 years.


VACHEL.—On July 2nd, at a nursing home at Clifton, Charles Tanfield Vachell, M.D., London, of Cardiff, aged 65 years.

HULME DISPENSARY.

DALE STREET, STRETFORD ROAD, MANCHESTER.

WANTED—a House Surgeon duly registered and fully qualified, Salary £180 per annum in cash; applications, with testimonials, at once, to Honorary Medical Secretary.
NOTES AND COMMENTS.

Officious Sick Visitors.

The advent of the inspecting school and insurance sick visitor has been one of happy omen. At the same time the ultimate and general success of this modern departure must to a great extent depend on the tactfulness of the officials who do the visiting. In cases that have come under our personal knowledge school visitors have taken the responsibility of pronouncing a ringworm cured, and have advised a child's return to school; or they have under-taken to decide whether in a given case ringworm is or is not present. As a matter of fact, it requires long medical training and the assistance of a microscope, and possibly of bacteriological investigation as well to enable one to pronounce with confidence upon the highly technical points in question. In the majority of cases it is absolutely impossible for the sick visitor to give any opinion on the point that is of the slightest value. This fact should be grasped by all local authorities that wish to deal adequately with the scourge of ringworm within their area. With care and experience a lay visitor may, of course, learn a good deal about ringworm, but it may be repeated with emphasis that it requires medical skill of a high order, backed by scientific methods of investigation, to ascertain not only the diagnosis, but also the cure of many cases of ringworm.

Under the National Insurance Act it becomes possible for a rash or over-zealous sick visitor to do a great deal of mischief. The functions of such an official are to see that patients have medical attendance and that they are carrying out treatment properly. It is clear that in this way they discharge an important duty as regards the efficiency of medical administration and prevention of malingering and imposition. An instance of undue interference on the part of a sick visitor was reported last week by Dr. Harry Roberts. The patient was suffering from "housemaid's knee," for which complete rest was ordered. The visitor, according to the patient's statement, ordered her to return to work. The knee naturally got worse and a surgical operation became necessary. Incredible as it may seem, the visitor is said to have ordered the bandages to be removed in order that the wound might be inspected. A step of that kind might induce sepsis, with the possibility of permanent damage or even of fatal results. In view of the importance of the sick visitor to the adequate administration of the Insurance Act it would be well for the Insurance Commissioners to draw up a code of rules for their guidance. Sufficient time has now elapsed since the introduction of the Act for the adoption of common-sense principles in its practical working.

"Certified" Milk.

The importance of pure milk as a factor in public health is being more and more recognised by the legislature. The latest departure is the adoption of Mr. Astor's motion to authorise "certified milk" by the Standing Committee of the House of Commons for the better regulation of the supply of milk and the conduct of dairies. The mover aimed at the authorisation of the term "certified milk" for milk produced under prescribed conditions, and prohibiting the use of such description to milk not protected in that way. This proposal was accepted by Mr. Herbert Samuel, the President of the Local Government Board, on behalf of the Government. He pointed out that while provision might be made by legislation for the sale of dirty milk, difficulty was often experienced in enforcing penalties. Much might be done if the stimulus of a higher rate of profit could be given to those traders who offered milk produced and sold under a system of official regulation and inspection. Unless Parliament dealt with the matter a system of certification by private organisations would probably spring up. The adoption of this public guarantee, so to speak, of the purity of milk thus specified is clearly a departure of great practical importance.

Forcible Feeding.

A petition on the subject of the forcible feeding of prisoners, with special reference to suicide, was presented last week to the Home Secretary by a number of registered medical practitioners. Some considerable divergence of opinion exists, even among medical men, as to the propriety of this procedure. Impartialy considered, it may be said at once that forcible feeding is never resorted to unless it be in the interest of the health of the prisoner herself. Mr. McKenna has forwarded a reply to the petitioners emphasising this view of the treatment. The document proceeds in the following terms:—"The prisoners who are now being forcibly fed include the two women who burned a hotel at Felpham; the woman who burned the pavilion at Kew Gardens; the woman who burned Lady White's house at Englefield Green, and who attacked the Rokeby Venus in the National Gallery; two women who damaged pictures in the Royal Academy; one who attempted to destroy an antiquity in the British Museum; and two who were found in possession of explosives, one of them on the occasion of the King's visit to Nottingham. The Secretary of State assumes that the petitioners do not desire that these women should be allowed to starve themselves to death in prison, and that what they ask for is their release. This would mean that the women would be set at liberty, with the practical certainty that within a week or two they will burn more houses, destroy more
works of art, and commit further outrages. In these circumstances the Secretary of State feels that it would be inconsistent with his duty to the public to grant the immediate release of its offenders, but if the petitioners, on the basis of their medical experience and skill, can attest any practical method other than forcible feeding by which the life and health of prisoners who persistently starve themselves and who ought not to be released may be preserved, Mr. McKenna will be only too happy to consider it. Here is a nice little clinical problem awaiting a satisfactory solution.

Sir Jonathan Hutchinson's columns to the unique educational museum established at Haslemere through the wonderful energy and enterprise of the late Sir Jonathan Hutchinson. A powerful appeal has recently appeared in the Times from the pen of Sir Archibald Geilke for a sum of at least £8,000 to maintain the institution in the same state of efficiency as it was left by its revered founder. It is estimated that the museum is visited by some 10,000 persons annually, many of whom are pupils brought from schools at considerable distances. Unfortunately, the fund, although large, is wholly insufficient to enable this wonderful institution to fulfil its function of instructing the public in biological, geological, and natural history through the aid of carefully selected specimens and illuminating diagrams. The residents of the district have risen nobly to the occasion, and have agreed, it is said, to maintain the museum until the end of the present year, but much more than this is needed. As a permanent memorial to the genius and skill of Sir Jonathan Hutchinson it would be an incalculable loss to the public, as well as to science, were the establishment to languish for want of timely support. There must be many medical men as well as laymen who would willingly contribute towards its preservation and permanent endowment out of personal admiration and gratitude to its founder. The Hon. Secretary and Treasurer of the fund, Miss Rose Jackson, Downcourt, Haslemere, will gladly receive subscriptions for this object.

Elsewhere in our columns will be found the report of an unfortunate occurrence at a London hospital. A girl had four teeth extracted, and upon recovering from the gas she appeared to be in a somewhat distressed condition. The operator, Mr. C. Peyton Baly, the well-known dental surgeon of Harley Street, according to the report, reached down a bottle which he supposed to contain smelling salts and applied it to the patient's nose. Unfortunately he had taken a bottle of corrosive acid, whereby considerable damage was inflicted upon the patient's face and neck. The explanation given was that the bottle of acid ought not to have been in the cupboard at all. A chain since made for damages on account of negligence was sustained by the learned judge. The assessment of damages has been postponed in order to see if the scar could be mitigated by the application of X-rays. The accident is one that might happen in any one of our hospitals, and Mr. Baly will have universal sympathy in his misfortune. As to the moral of the incident—it is clear that all hospitals should keep their poisons in distinctive bottles. Had the acid been in a properly shaped receptacle the gruesome accident above recorded would not have taken place.

LEADING ARTICLES.

UNQUALIFIED MEDICAL PRACTICE.

The scientific care of the public health has of late years advanced by leaps and bounds. The Public Health Acts have placed sanitary administration upon a sound basis, and have reduced the death-rates materially, to say nothing of the improvement that must sooner or later follow in the thaws and sinews, so to speak, of the nation. The medical inspection and treatment, combined with systematic feeding, of school children has been another step in the same direction. Not least of these measures is the National Insurance Act, which, in spite of various defects, cannot fail in the long run to exert a powerful influence in advancing the national health. In sharp contrast with these advances is the survival of the evils of unqualified medical practice. When King Henry VIII. instituted State medical qualifications in the sixteenth century, the change was explicitly inaugurated in order to enable the public to distinguish between properly educated and approved practitioners and those who had not gone through any systematic course of training and satisfied the ordeal of the orthodox examination. That which was necessary four hundred years ago, when the best medical knowledge was crude and empirical, is a hundred times more desirable nowadays, when the practice of medicine has acquired, and is still acquiring, a mastery over the wide and enormously complicated field of practical medicine that constitutes it one of the most fascinating and progressive of all the sciences. It is not a little curious that the modern encroachments on the liberty of the individual subject in the interests of the community should have halted and failed before the foul abuses of unqualified medical practice. This deplorable failure has probably arisen mainly from two causes: First, the extent of the vested interests involved; and, secondly, the fact that the medical profession has not in the General Medical Council a body strong and capable of protecting the conditions of medical practice, as regards both the public and the profession concerned, in a manner analogous to that exercised by the Incorporated Law Society. The outcome, at any rate, is that, whereas the British public is rigorously protected from the unlicensed lawyer, it lies at the mercy of any medically unqualified charlatan, no matter how bottomless the void of his folly, greed, recklessness, and cruelty. A striking instance of the definitiveness of the law in dealing with unqualified practice is the way in which so-called Christian Science healers are permitted to continue their dangerous calling practically without restraint. From time to time deaths occur amongst those who have been misguided enough to trust to their ministrations, but the "healer" escapes with mild judicial censure. It is nothing short of a scandal to our modern civilization that ignorant persons should be permitted to endanger life by claiming the power and usurping the position of a State-qualified practitioner of
medicine. Only last week, in a coroner's court, an inquest was held upon a lady who died in the house, at Isleworth, of Mr. Orlando Miller, described as a "teacher, lecturer and healer." He was without medical qualification, but had received deacons into his house "to see if he could cure her of paralysis," for which services he was paid five guineas a week. Medical evidence was to the effect that a medical man been called in earlier the life of deceased might have been saved. "She was a poor subject for taking drugs," said a doctor who had formerly attended deceased, a remark that derived its significance from the fact that Dr. W. H. Wilcox, of the Home Office, detected scopalamine in the viscera of deceased. The coroner observed that the administration of scopalamine was not a wise or proper treatment for a person in the condition shown to have been that of the deceased during her last illness. The jury asked that the coroner should severely censure Mr. Miller for having administered a dangerous drug that might have accelerated death. The coroner pointed out to Mr. Miller that he was deserving of the greatest blame for treating the woman in a very improper way. Fortunately for him the medical evidence was in his favour, or he might have found himself in difficulties. There the matter ends. Mr. Miller, if we remember aught, has received somewhat similar admonitions from various other coroners. Surely there is something wrong with the law which permits the recurrence of this scandal of unqualified medical practice. Mr. Lloyd George would do well to insert a corner stone, without which his public health edifice will remain rotten and unstable, by legislating against the pernicious practices of the charlatan. Fortunately he is not afraid of fighting vested interests, which apparently have proved too strong for the recent Select Committee of Inquiry upon proprietary medicines and unqualified practice. On the appointment of that committee we had private information of an authoritative nature to the effect that no result of any value would ever come of the inquiry which would be allowed to drop quietly out of existence.

One fatal defect of the committee, if our information is correct, was that the British Medical Association was permitted practically to guide its policy and nominate its witnesses. In view of its untoward experiences in the National Insurance Act, the Government might surely have grasped the elementary fact that the Association does not fully represent the thoughts, wishes, and aspirations of the medical profession. Any Cabinet Minister seeking guidance of the Council of that body is likely to be favoured with the personal views of a knot of wirepullers. The only sense in which the Association is representative is that it is the concrete sign and symbol of organisation. Some day it will doubtless emerge into the open light as an impartial and fearless defender of medical men in their various relations to society. What has the Association achieved during its many years of existence in the actual suppression of unqualified practice?

CURRENT TOPICS.

Insurance.

We have a modern way of reducing everything to a type. There is hardly a person or a thing that we do not classify and generalise about. We talk about "the school child" or "the working-man" as if each member who falls under either title must be in need of physical, mental or moral admomitions and correction, and a counterpart of all his fellows. It is our poor little way of tackling things that are too big for us. We cannot pay attention to each school child and solve its individual problems and difficulties, and so we turn our energies to the alleged troubles of "the school child," and forget that nobody is average. In a like way we are all too ready to lump in the greatest or smallest errors, and forget that we are dealing with individuals, with men of fate. We try to mitigate our lot when fortune is unkind by tempering our pleasures when she smiles. We are moderate, and we insure. It is all very wise and unromantic. At least, most of it is, but there are some kinds of insurance that are almost interesting. Sporting policies will insure one against anything, from twins to bad weather, or pneumonia, but no irrevocably. influenza, bronchitis, or non-suppurative tonsillitis. The taking out of an insurance policy has a certain therapeutic value. It acts like an amulet. The insured person enjoys health above the average, and annuitants are notoriously long-lived. The insurance companies have done a great deal to reduce the frequency of appendicitis. They have encouraged doctors to refuse their services for £100 to £1, and say that the malady has abated substantially. It is this sort of case that makes therapeutics seem easy.

Coloured Thinking.

Ever since the time of John Locke it has been known that certain persons are able to associate sounds, words, or places, with colours. Such people may be either normal or abnormal mentally. They are rather to be classed among those refined thinkers that are akin to geniuses. In the current number of Science Progress, Professor David Fraser Harris, M.D., D.Sc., of Dalhousie University, Halifax, N.S., describes this peculiar mental faculty which has been termed psychochromesthesia, coloured thinking, or chromatic conception. The linking together of colours with names of places, sounds, physical sensations, days of the week, etc., takes place in the mind of the thinker directly the mental concept is visualised, or as soon as it has entered the field of conscious thought. Thus, to some coloured thinkers Sunday may be yellow, Wednesday blue or brown, Friday black and so on. In fact we cannot compare the tone of a singer's voice to a certain colour. The expression "Moonlight Sonata" itself is a true colour-phonism, and this and similar associations frequently appear in the pages of modern novels. As Professor Harris points out, chromatic conception belongs to the physiology, not to the psychology of mind, and perhaps has its origin in the past. Features of psychochromesthesia are very definite. Thus the associations are generally fixed in the mind at a very early age, and when once the colour is thought of it is never dissociated from its own particular mental concept. Again, the coloured thinker is always most careful to define precisely the particular shade of colour he has thought of in connection with any object, though different

CURRENT TOPICS.

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coloured thinkers will not associate the same colour to the same mental concept. No reason can be given for this strange propensity of mind, which is sometimes hereditary, and may be related to symbolism.

**Aerophagy.**

The swallowing of air, followed by eructations, is associated with many disorders of the alimentary canal. At one time it was believed that aerophagy was more or less pathognomonic of a neuritis, but this troublesome symptom undoubtedly occurs in several organic gastro-intestinal diseases. In an interesting paper upon the subject read last month before the American Gastro-Enterological Association at Atlantic City, Dr. Charles D. Aaron, of Insurance Act. This, of course, is a matter that concerns the doctor alone, but a notice was moved bringing the refusals to the notice of the Board. A typical argument—if it can be so called—was introduced: That "a person getting medical relief is as much entitled to get a certificate as to get a copy of the registration when death occurred." Because a dispensary officer is paid to administer medical relief, and to issue copies of certain registration certificates, he is therefore in the position of general guardian angel to the proud possessor of the red ticket, and must do everything else for the latter's convenience. Why not ask the doctor to feed and nurse the sick man, run errands for him, and help to wash his hands? The whole plan be for the public good, and if the doctor is not paid for looking after the sick, what is he paid for? At the meeting it was explained that neither the guardians nor the Local Government Board had anything to say to the Insurance Act, and this wonderful fact ultimately reached through the periphery of the un-dispised omniscience. And if many other public bodies, they had been talking for quite a long time about something they knew nothing about and which did not concern them in the least. Their only justification was that they were trying to get more work out of their doctors with absolutely no extra expense on the funds committed to their charge. They also overlooked the fact that someone else is being paid out of public funds for non-performance of the duty they wished to impose on their medical officers.

**The House in Relation to Tuberculosis.**

One of the greatest problems in the national campaign against tuberculosis is the prevention of the disease in the home. After years of increasing activity and wider recognition on the part of health authorities, resulting in State benefit for the consumptive, public attention is gradually becoming more and more concentrated upon the chief mode of infection—the insanitary dwelling. It was most appropriate, therefore, that the subject should have been among those selected for discussion at the sixth annual conference of the National Association for the Prevention of Consumption and other Forms of Tuberculosis, held at Leeds last week. As a member of the Royal Commission which is at present investigating the whole question of the housing of the people in Scotland, Sir William Younger, Bart., in his opening address, pointed out the remarkable saving in human lives that has been effected in Liverpool as the result of the demolition of one insanitary area and the conclusion thereupon of bright and airy dwellings surrounded by plenty of space. The educative aspect of the question, in so far as it comes within the scope of the tuberculosis dispensary, was dealt with by Sir Robert Philip, M.D., who declared emphatically that it should constitute an offence to offer consumption at a charge for the patient to expose infected milk or meat for human consumption. While much can be done in enforcing the object lesson of the sanatorium in the home, true advance against tuberculosis will be accomplished only in so far as the necessity for an abundant supply of fresh air, especially for the developing child, is accepted as a necessity by all local authorities throughout the country.

**Deramitits in Rose-gatherers in the Riviera.**

The occurrence of an inflammatory form of dermatitis upon the hands of persons engaged in horticultural pursuits is well known. A number of flowers and plants are capable of giving rise to troublesome cutaneous eruptions when handled by susceptible individuals, and the rash is gradually increasing as the result of careful clinical observation and research. Only a short while ago an investigation into a rash affecting the rose-gatherers in the Scilly Isles was undertaken by Dr. David Walsh, who came to the conclusion that in a large number of instances the eruption depended upon some circulatory defect, usually of cardiac origin. In a recent number of the Lyon Médical, Dr. Revillet of Cannes, calls attention to certain affections of the hands among the workers in the rose industry in the Riviera. The lesions are in the main produced by traumatisms, the thorn-punctures being infected with septic microorganisms. Hence, whitlow and boils are frequently observed, while a common type is that of a vesicopustular dermatitis resembling at first sight a scabies, even in its distribution. Carbuncles and inflammatory dermatitis are also observed; while erythema, pruritus vulgaris, and gingivitis contribute their share to a very polymorphic symptom-complex. It appears that some of the lesions in rose-gatherers may...
be produced through the agency of one or other of the germicides—formol, carbolic acid, or sulphate of copper—used to destroy the parasites that threaten the life of the rose-trees. Others may be caused through the manipulation of manure. Careful attention to cleanliness and the prompt treatment of thorn-pricks with antiseptics are among the many small measures employed to protect the hands of the workers in this department of horticultural industry.

/Public Health Administration in Dublin.

Sir Charles Cameron has just published a booklet entitled "A Brief History of Municipal Public Health Administration in Dublin" (Dublin: Hodges, Figgis and Co.), which appears to be intended as a reply to the recent Report of the Departmental Committee on the Housing of the Working Classes in Dublin. Sir Charles gives a great deal of interesting information concerning the various activities of the Dublin Corporation, and shows that, whatever its failings, that body has accomplished much good work in the past half-century. It has brought a public water-supply into the city, it has established an efficient, if expensive, system of electric lighting; it has abolished the old system of storage of filth, and established water carriage of sewage; and it has substituted main drains discharging into the sea for the old sewers opening direct into the Liffey. Sir Charles states that the Corporation has accomplished in work which may be called sanitary, using the term in its widest signification. It is hardly, however, relevant to a charge of failure as regards provision of housing for the working classes and supervision of the existing tenements. A man will charge with stealing a sheep; it may be to his credit, but it is no defence to the charge, to prove that he did not steal the herd of cattle in the next field; nor is it much better to suggest that the sheep was not really full-grown, but only a lamb. Sir Charles attempts to minimise the charges with regard to neglect of proper control of tenements, on the facts referring to them. The facts remain, however, that the Corporation has neglected to enforce not only its own bye-laws, but the statutes, as, e.g., in regard to a register of tenements being kept, and, further, that rebates of taxes have been given, in some cases to members of the Corporation, on houses classed by the health department as " unfit for human habitation."

A Substitute for Antiseptics.

The evolution of scientific wound treatment forms one of the most interesting studies in the realm of therapeutics. In ancient times healing balms composed of various aromatic resinous substances were largely employed for wounds and sores of all descriptions. During the Middle Ages the influence of empiricism made itself strongly felt in this country, and, accordingly, the strange applications of crude animal organic matter, were used for a like purpose. With the advent of Listerism came the strong antiseptics, carbolic acid and bicloride of mercury. These had the desired result of destroying germs, but they frequently damaged the tissues so much that much of the inflammatory reaction in wounds was due to the irritating effect of the chemical disinfectants employed in their healing. The modern aspetic treatment of operation and freshly-incised wounds requires the use of no strong antiseptics to damage the tissues. A little pure tincture of iodine is applied directly to the line of incision, and that is all. Wounds that are septic from the first are on a somewhat different level. They require antiseptic treatment in some degree in the majority of cases. The use of Wright's citrated isotonic solution as a substitute for antiseptic solutions is spoken highly of by Dr. G. K. Dickinson, M.D., of New Jersey, N.J. (a). The liquid is applied to the wound by gauze kept well soaked, and its cleansing and healing properties speedily become manifest. It has been successfully employed as an irrigant in cases of vaginitis, septicaemia, endometritis, and also in infected wounds following operations upon the gall bladder. The use of this physiological solution has obviated the necessity for strong antiseptics during the two years in which it was tried in Christ Hospital. It certainly has the merit of being cheap, non-toxic, and harmless to the tissues.

PERSONAL.

Their Majesties the King and Queen visited the Royal Infirmary, the Western Infirmary, and the Royal Hospital for Sick Children, Glasgow, and the Royal Infirmary, Perth, during their Scotch tour last week.

Sir Watson Cheyne, Bart., Honorary Surgeon to the King, and Surgeon to King's College Hospital, has been elected President of the Royal College of Surgeons of England.

Dr. Herbert Stanley Birkett has been appointed Dean of the Faculty of Medicine in McGill University.

Sir Wilmot Herringham, M.D., F.R.C.P., has been re-appointed Vice-Chancellor of the University of London for the year 1914-15.

Mr. V. Zacharias Cope, M.D., M.S.I.ond., has been appointed Surgeon in Charge of the Orthopaedic Department at St. Mary's Hospital.

Dr. Thomas Chetwood, M.B.Lond., D.P.H.Oxon., has been appointed School Medical Officer and Deputy Medical Officer of Health for Sheffield.

Mr. L. E. Barrington-Ward, Ch.M., F.R.C.S.Eng. and Edin., has been appointed Surgeon to Out-patients at the Great Northern Central Hospital.

Sir Almroth Wright, F.R.S., M.D., D.S.O., will preside at the annual dinner of the older students of St. Mary's Hospital to be held in October next.

Dr. F. W. Craig, M.R.C., Ch.B.Edin., D.P.H., has been appointed Medical Superintendent of Health and Tuberculosis Officer for Londonderry.

Mr. A. H. Bostock, M.R.C.S., L.R.C.P., has been elected Honorary Surgeon of the Royal West Sussex Hospital, Chichester, in place of Mr. F. Skirle, resigned.

Mr. Duncan Matheson Mackay, M.D., C.M.Edin., M.R.C.S., L.R.C.P.Lond., has been appointed Honorary Ophthalmic Surgeon to the Hall Royal Infirmary.

The Honorary Degree of LL.D. has been conferred by the University of Edinburgh upon Dr. Byron Bramwell. Consulting Physician to the Edinburgh Royal Infirmary, and upon Dr. F. W. Mott, Pathologist to the London County Asylums.

Dr. R. Wallace Henry, the Originator, Founder, and First President of the Union of Medical Practitioners and the Leicestershire and Rutland Public Medical Service, has received the recipient last week of a handsome testimonial as a token of love and esteem from his professional colleagues.

(a) Medical Record, June 20th, 1914.
Mr. President and Gentlemen,—I thank you for the honour you have done me in inviting me to make these remarks to you this evening, and I only hope that you will not find what I have to say too trivial or too familiar to be of use. I propose to touch on a number of separate practical points, none of which are original; you must pardon me if you know of them all already, but I have found that even when things are known about they are not always made use of as often as they might be, and that must be my excuse for bringing them before you to-day. The reason for using the word "further" in the title of this address is that I have already discussed a number of similar points elsewhere, and although I should have liked to have mentioned some of those again to-night, I shall refrain from doing so, because they have been published in The Medical Press and Circular for May and December, 1912.

The first point that I should like to bring to your notice is THE VALUE OF HORSE SERUM AND OX BLOOD IN THE TREATMENT OF RESISTANT SIMPLE ANAEMIA.

Of course, the great majority of cases of anaemia are remedied easily by the ordinary simple treatment of rest in bed, the administration of one or other of the many preparations of iron with or without arsenic, steps being taken at the same time to ensure a regular action of the bowels. Six weeks in bed under this treatment will generally cure almost any case of chlorosis, however severe the latter may be to start with, especially if the room in which the patient is being nursed is a sunny one; but now and again one meets with a patient whose anaemia proves so refractory to treatment that none of the ordinary things seem to do any good at all. Rare though these cases may be, all of us meet with them from time to time, and the question arises as to what further kinds of treatment can be adopted. Both horse serum and ox blood may then be used, and sometimes with extraordinary benefit. The patient is generally an unmarried woman of the lower-to-middle classes, and she has been to see all kinds of doctors, and may have visited various spas noted for the treatment of anaemia. In one such case recently, for example, the lady was 33 years of age, and for over ten years she had been so anaemic that she had been unable to take any active part in life or in the doings of her brothers and sisters, and she was more than ever hopeless of ever being cured. Her haemoglobin measured only 35 per cent. of normal, there was no organic disease of any of the viscera, and yet all attempts to cure her anaemia had failed hitherto. Within two months of treatment by horse serum and ox blood her haemoglobin had risen to 65 per cent. of normal, her red corpuscles were over 5,000,000 per cubic millimetre, and she felt perfectly well. She may, of course, relapse, as so many of these patients do, but that does not altogether detract from the value of the treatment. It is carried out as follows: The patient is put to bed in a sunny airy room, with wide-open windows, and upon a full diet, including particularly the natural gravies from roasted meats. For each of eight successive days she is given a subcutaneous injection of 10 c.c. normal horse serum—preferably into the deep subcutaneous tissues of the abdominal wall; the serum is obtainable sterile and ready for injection in glass phials like those in which ordinary antitoxin is supplied, and sometimes possible to give a ninth or even a tenth injection, but the phenomena of anaphylaxis and severe serum reaction generally prevent more than eight doses being given, and one is in any case obliged to stop by the tenth day, because beyond this point the giving of more serum is actually dangerous on account of the anaphylaxis. The treatments should be warned previous to the beginning of the treatment that she will have considerable reaction, with pyrexia up to perhaps 102° F. or even higher, starting, as a rule, about the eighth or ninth day, and persisting or more or less, but not getting continuously worse, up to the seventeenth or eighteenth day if eight to ten injections are given. Three to nine or twelve injections are given; until this is past the patient should remain entirely in bed. During this pyrexic period she will feel more or less ill in herself, and will very probably suffer from urticaria, which is sometimes mainly local to the site of injection, but more often occurs all over the body. It has been recommended that calcium lactate should be given in 10 grain doses three times a day with the idea of minimising these serum phenomena, but in practice this drug is disappointing in this connection; 10 grain doses of aspirin given once, twice, or three times a day often alleviate the itching of the skin and the headache; locally one may duff on a lotion consisting of one part of carbolic acid and nine parts of water to each pint of which are added 2 tablespoonfuls of glycerine and a teaspoonful of bicarbonate of soda or some weak caustic soda. When the reaction is over, that is to say about the twentieth day from the beginning of the treatment, one can begin giving fresh delibrinated ox blood per rectum. If one could continue indefinitely with the horse serum one would so, but on account of the anaphylaxis a considerable interval must elapse before further doses of it can be given with any safety. The delibrinated ox blood, on the other hand, can be given without any danger, and continued indefinitely. It is obtainable by arrangement with any butcher who kills his own animals; he whirls the blood to delibrinate it, and pours it into bottles that have been sterilised by boiling, and places these on ice; the blood should be kept on ice until it is used. If fresh blood can be obtained each day this is best of all, but as a rule the butcher does not kill every day, and it may be necessary to arrange for a three days' supply at a time. A suitable dose is 8 ounces, and it is given like an ordinary nutrient enema with a rubber tube and glass funnel. The bowels having been well opened in the morning, the nurse inserts the small rubber rectal tube about six inches into the rectum, and the blood is allowed to run in through a suitable funnel held from two
percha tissue or jaconet of sufficient size to cover over the whole of the flannel when it is in position, also with two armholes cut in suitable positions. One mixes half a pint of brandy with a pint and a half of cold water in a washhand basin, and steep the large flannel in this until it is thoroughly wet all through; one just squeezes it enough to leave it quite wet but not actually dripping. When the chest is stripped, the flannel hot. If it is too wet, the base of the chest is applied over the flannel in the same way, the whole being kept on by quickly wringing a broad bandage loosely all round the chest and over the shoulders. Some patients to use the brandy and water hot. If lost, relief is obtained by using it tepid or cold, and doing so is no danger to the child, for very quickly the heat of the body, especially as the result of the increased amount of blood which the brandy pack brings to the surface of the chest, makes the application steaming hot, and in half an hour or less the child very often falls asleep peacefully. This, which may last for several hours, can have any coughing at all. Precisely similar treatment may be employed in some cases, but the most striking benefit is obtained in children, especially between the years of five and ten. Again and again one has seen a refreshing sleep ensue when up to the time of using the brandy pack all other remedies have failed.

The next point I should like to bring before your notice is the Value of Bicarbonate of Soda in the Treatment of Resistant Cases of Epilepsy (Grand Mal)....
to take any remedy that will help them to lose their fits, and most of them take the crude drug just as it is without any difficulty at all. It is less nasty when given as the plain powder than it is when an attempt is made to prepare it in mixture form. Two recent hospital out-patients have improved so much under the liborate treatment that they are given to one, whereas upon bromides they could get no employment at all, they are now back at permanent work.

The next point that I wish to draw attention to is the value of venesection in certain chronic conditions, especially arterio-sclerosis and polycthemia.

A period in the early part of last century when venesection was performed indiscriminately for six weeks to two months, is sometimes remarkable, and to this therapeutic measure fell into disrepute, so that it was seldom resorted to at all. There has, however, been a reaction in favour of it under certain circumstances, and most physicians do not hesitate to bleed patients suffering from certain acute maladies, especially uraemia, lobar pneumonia in its pleuritic, and acute heart failure from valvular disease or myocardial degeneration. It is, however, by no means only in acute conditions of this kind that venesection can do good, and the relief afforded to many persons suffering from arterio-sclerosis with greatly raised blood pressure by periodic venesection, say at intervals of a month or six weeks, has been found so beneficial that it is sometimes practised among those who are not suffering from acute disease. One of the objections to venesection in the past has been that it then meant incising the skin, and thus producing a wound which might become septic, and in any case amount to a dressing. Now, however, by means of short hollow needles, which are made for me by Messrs. Down Bros., it is quite a simple matter to puncture a large vein, say 15 or 20 ounces or even in one's consulting-room, the patient being able to go straight away to his ordinary duties after the little operation without a dressing upon the arm at all. The broad rubber bag that one uses in connection with a phymognomoneter is of great assistance in this connection, and it is not uncommon to have a patient get into it until one just obliterates the radial pulse. Having found the maximum sphygmometric in this way, one now lets a little of the air out of the bag until the pulse has returned, and in this way one has a very simple tourniquet in which one can regulate the pressure to a nicety, and one does not have to use one of the elastic tourniquets that rubber tourniquet so often used to be. Moreover, the broad band of pressure round the upper arm seems to impede the transmission of painful impulses from the nerves of the forearm to the brain, so that the patient feels less than one might expect when one inserts even a big needle into the distended vein of the elbow. Of course, to have a wide, short needle, for otherwise, if one uses a longer, narrower needle, such as one through which one gives a dose of antitoxic serum, after the first two or three ounces of blood have run out the flow gets gradually slower, and finally ceases from clotting in the narrow tube. It is an additional advantage to have a rubber attachable, so by means of it one can direct the blood into the measuring glass or other receiver more conveniently than one can straight from the metal needle itself. It takes from five to ten minutes to let out 20 ounces of blood from the vein in this way in an ordinary case of arterio-sclerosis. On releasing the air from the pressure bag the bleeding stops at once; after removing the needle a few drops may escape, but if the arm is now held vertical for a minute or two it is found that no further bleeding occurs, and the puncture hole needs no dressing whatever, though it may be wise to powder it a little boric acid. The patient goes to his ordinary work directly afterwards without feeling any ill effects; indeed, many ask to have the venesection repeated periodically because they feel so much better for some time after it. How the venesection acts it is not easy to say. I certainly do not do so by reducing the blood pressure, for the latter is affected by it in every little if at all; one imagines, however, that when a bulk of blood is thus removed from the vessels it is made good by absorption of other fluid in the tissue spaces; the latter in their turn require a fresh supply from wherever they ordinarily get it and thus there is an increased removal as it were for the time being. At any rate, there can be no doubt as to the beneficial results in actual practice it cases are properly selected. One sees the same benefits come about spontaneously from a severe epistaxis sometimes. Venesection with a hollow needle, with a phymognomonet bag for tourniquet, is so easy that I should like to see it used more widely, not in acute conditions only, but also in selected chronic cases of arterio-sclerosis, polycthemia, plethora, and high blood pressure.

To be concluded in our next.

Note.—A Clinical Lecture by a well-known teacher appears in each number of this Journal. The lecture next week will be by Mr. E. M. D. Oxon., F.R.C.P., Physician to Guy's Hospital. Subject : Some Further Therapeutic Points.

ON THE VALUE OF THE BACTERIOLOGICAL EXAMINATION OF THE URINE. (a)

By T. S. KIRK, M.B.,
Surgeon to the Royal Victoria Hospital, Belfast.

I wish to call your attention to the value of the bacteriological examination of the urine. I do not pretend to be a bacteriologist, and though I am a clinician, and I will take the liberty of speaking of it from a medical as well as from a surgical point of view. The bacteriological work in connection with my cases has nearly all been done by Prof. Symmers and his staff.

Five years ago, when this work was commenced, the only cases so examined were cases of acute infections, especially those with multiple lesions. To-day I examine bacteriologically the urines of all my cases as a matter of routine. The reason I made this change was on account of the valuable results obtained in some of the early cases and on account of a disaster which might have been avoided by such an examination.

I will mention two of my recent cases as examples.

(a) Male, 61 years. When two years old he had a lumbar abscess, diagnosed as due to spinal caries. This abscess was opened, and it eventually dried up. When 25 years old he developed an abscess beneath his rectum and bladder; this was opened and drained and an external urethrotomy was done at the same time to drain his bladder. Later he had many small perineal abscesses. He had palmar psoriasis all his life. He had many patches of chronic eczema on his limbs and body; several times every year he had crops of boils on his face and neck. His hair came out, and he had much eczema of his scalp. He was unhealthy-looking and very thin. When I saw him he had chronic cystitis and a stricture of his urethra at the site of
his old urethrotomy wound and a peri-urethral fistula, as well as his skin affections.

From his urine many colonies of streptococci grew and a very few colonies of B. coli. He had altogether four injections of a streptococcal vaccine in the course of fourteen months, and his stricture was dilated. All his troubles were cured and he has had no relapse and no treatment since the spring of 1910.

(2) Male, aged 25 years. I saw him on account of an abscess of his left hip joint. Twelve years previously he had an attack of acute pneumonia. I found he had a small abscess in the lower lobe of his right lung. This abscess was opened, and from it a pure culture of pneumococci was obtained. The same micro-organism was found in his urine. When I saw him last he had been ill in a military hospital and was very much emaciated. He got an autogenous pneumococcal vaccine, and in a short time all his general and local signs and symptoms disappeared, and he is now in excellent health and able to get about with an ankleless hip joint.

These two cases, I think, showed accurately in the best cases of the infections from which the patients were suffering, and the results seem to show that the vaccines made from the urines were of undoubted benefit.

The next class of cases in which I found this method of examination of value was in cases of skin-grafting of large ulcers. For many years I have been much interested in the skin-grafting of burns, and have tried many ways of preparing the grafts for the grafts and many ways of treating the grafts after the operation, and I have always had much uncertainty as to whether the grafts would take or not.

Now I have found that some patients with large ulcers have micro-organisms in their urine and other urines. The patients with sterile urines can be grafted, and if a careful technique in cleaning the ulcer and getting rid of all granulation tissue, etc., is carried out, the grafts will take in every case; but if the urine contains infective micro-organisms, a good result can only be hoped for if the vaccine treatment is carried out before and after the graft and even then some suppuration nearly always occurs.

This relation between the character of the urine and the result of skin-grafting has been quite constant during the last eighteen months. A similar relation exists in cases of varicos veins and the operation for varicos veins, and explains, I believe, why operations for varicose veins in patients with varicose ulcers frequently suppurate. The same relation is present in patients suffering from boils or acne. Some of these patients have staphylococci in their urine and others are sterile, and this explains why plastic operations in such patients sometimes suppurate.

This case also made me decide to examine all urines bacteriologically was the case of a child with a fractured femur, in whom the urine was not plant out before operation.

This child had an oblique simple fracture with two inches of shortening. He was an anaemic, sickly-looking child, with a history of digestive disturbances before the fracture. It had no definite focus of inflammation anywhere. I operated on the femur and closed the wound with continuous layered sutures without any drainage. Four days after the operation the child was very ill and feverish. The wound in the thigh looked all right, but I opened it and got some serum with flakes of lymph in it, and from this serum there grew many colonies of the B. coli, and the same bacillus also grew from his urine. Happily he made a good recovery. I feel certain that in this case the child's previous ill-health was due to an infection of B. coli which had become chronic, and would probably have been detected by a urinary examination.

Since this occurrence I have planted out all urines as a matter of routine, and the value of the procedure from a general medical point of view has been demonstrated.

In the beginning of last December I saw a patient who was supposed to have malignant disease of his spleen. The spleen was hard and enlarged to a couple of fingers' breadth from the umbilicus. He had a small amount of fluid in his peritoneum. Two years before I saw him he had commenced to feel weak and lose flesh. At that time he noticed small boils on his legs and a few on his back and neck. Three weeks before I saw him he had a mild attack of left-sided pleurisy. A blood count showed a moderate degree of secondary anaemia. His urine was planted on blood agar and a copious growth of Staphylococcus citreus appeared inside twelve hours. Dr. Wilson had made a vaccine from this growth, and about six weeks ago was told that he was at his work again and feeling quite well and that his spleen had gone down in size. This patient had no other treatment, except the vaccine, and his improvement was so rapid and marked that it is hard to think that the vaccine was not the cause of his improvement.

Last year I had a number of cases of empyema under my care. There were two due to a pneumococcus, one due to the B. coli, three due to a staphylococcus; in two of the latter there were staphylococci in the urine, all the others had sterile urine. Those with sterile urine got better much quicker than the others. In fact, one of those with staphylococci in the urine has not been improved at all in spite of vaccine and other treatment.

The bacteriological examination of the urine may, therefore, be of use, not only as regards diagnosis, but also as regards prognosis. In January last year a young man was in my ward who had a simple fracture of his ulna, and I was in charge of the dressing of his ulna, and the removal of the plaster a month later. The patient was well, and I was to remove the plaster the following week. I thought the wound would suppurate and asked the medical officer to remove the plaster. Unfortunately, I am going to blush at the memory, because when I went to remove the plaster I found there wasn't any wound to remove. The patient had a scarred condition of his skin, and his urine contained many staphylococci, and these were not affected by the dressings and by the application of the plaster. I should have removed the plaster, but the wound was already under an anaesthetic, although I tried to do so twice. The question of reduction by operation had then to be considered. This patient had a scaly condition of his skin, and his urine contained many staphylococci, and these were not affected by the dressings and by the application of the plaster. Consequently, I refused to operate on him, as I felt sure his wound would suppurate. While I was ill last year, a colleague, whose aseptic technique is above suspicion, operated on him, and was disgusted to find that the wound suppurated. Thus the result anticipated from the condition of his ulcer actually occurred.

I think I have tried enough cases to prove that examination of the urine is of undoubted value in many cases, although it is still only on trial. I do not say that it is an infallible guide to the nature of an infection. Unfortunately, I have come across cases of infection with many suppurating foci, in which nothing has grown from pus, blood, or other body excretions bacteriologically. Now, to make this generally possible, some simple method, which any medical man could practise, must be...
devised, and cultures from the urine are at present the easiest and quickest to make, and, therefore, we must try to get a reliable method of examining the urine.

Such bacteriological examinations of the urine are of especial importance in cases of injuries and operations, and I hope we may soon have some simpler and sure way of detecting the presence and nature of infective micro-organisms in our patients, and thus providing the complement to Listerism. In Listerism, as practised to-day, every precaution is taken to prevent the entrance of micro-organisms into wounds, but no cognisance is taken of those in the patient's system, and it is for this reason that we find so many unaccountable cases of infection following aseptic surgery, and why they all every now and again break down. It is a well known fact that blood infections cause suppuration in haematoma and other injuries unaccompanied by any external wounds, and there is no reason why a similar infection should not play havoc with operation wounds.

THE TREATMENT OF LARYNGEAL TUBERCLE.

By W. PERNWELL. M.D., LONDON, F.R.C.S. ENGL.,

Laryngologist and Otologist to the Royal Southern Hospital and the Southport Infirmary, Lecturer on Laryngology, University of Liverpool.

I question if the profession is aware generally of the extreme frequency of tubercular disease in the larynx. Except in the rarest instances, it is now settled that it is always secondary to pulmonary tuberculosis; large series of post-mortem examinations show that in fatal cases of pulmonary phthisis 50 per cent. are complicated by deposit in the larynx. As to its frequency in living patients, it may be said that in the first stage of phthisis about 10 per cent. have laryngeal complications, while in the third stage that figure rises to 72 per cent. What is this frequency not more generally recognised?

First, because the larynx is seldom examined. Secondly, because disease there may exist for a considerable time with no noticeable symptoms. Thirdly, because the pulmonary disease is much more insistent, and gives rise to more marked effects. But, as it is frequent, the question becomes important: Can anything be done, apart from sanatorium treatment, to cure or relieve it? (a) In 1880 Morell Mackenzie said: "The prognosis of laryngeal phthisis is always extremely unfavourable, and it is not certain that any cases ever recover." To-day there is no longer any doubt that cases do recover. I myself have seen them recover, and remain well for many years, in one case for eighteen years. Records show the same thing, and Heryng has published post-mortem records which establish clearly the cure of cases as the result of operative treatment. Given an early diagnosis, I should say that the prospects of cure depend on three factors: (1) local treatment; (2) the degree of pulmonary disease, and its general effects on the organism; and (3) the possibility of sanatorium and other hygienic measures. The prognosis must depend, of course, on the degree of local involvement, but it is not always the slight cases which do best; marked thickening from tubercular deposit and extensive ulceration will clear up in a striking manner. The real factor of prognosis is, and must remain, the course of the pulmonary lesion and its adequate treatment.

Conversely, the prognosis of pulmonary phthisis depends to some extent on the coexistence or not of laryngeal complications. It is well known that sanatorium superintendents are very shy of taking in laryngeal cases. The irritable cough of laryngeal tubercle interferes with rest; all laryngeal cases are easily depressed; and the local disease has dangers of its own. All this ought not, however, to exclude laryngeal tubercle from sanatorium treatment. A wise and constant effort should be made to take them into those sanatoria only where in the first place there is a trained laryngologist to deal with them, and where in the bulk of cases laryngeal symptoms are the most prominent. Also, by a trained laryngologist I do not mean a man who is only just able to examine a larynx, but one who is thoroughly familiar with the whole of laryngeal surgery. This digression will perhaps be pardoned, if only because it accentuates the almost constant association of tubercle of the larynx with pulmonary tubercle.

Speaking generally, therefore, I would say that if the case is one which is favourable from the point of view of the lung, it is also favourable from the point of view of the secondary laryngeal disease, if only that disease receives appropriate local as well as general treatment.

What, then, is the local treatment?

Special opinion has gone through many phases in my time on this as on every other subject. When I began practice, the routine treatment in tubercular ulceration was painting with lactic acid. This caustic was supposed, rightly or wrongly, to have a selective effect on the tubercular deposit, and to spare the healthy parts of the larynx. Accordingly, after anaesthetising the larynx by cocaine, we used to rub in the pure lactic acid, and we were especially told to rub it in with force. This was not a pleasant process for the patient, but in some cases it undoubtedly had marked effect in promoting healing of tubercular ulcers. The after pain, however, was considerable; and therefore some weak-minded practitioners thought that as much good might be done by the repeated spraying of the larynx with a dilute solution of the drug. My experience, and I think that of all others, showed that it was useless—and worse than useless, even irritating. Just as painting a granular pharynx with nitrate of silver in 50 grammes solution only irritates, while the galvano-cautery cures, so was it with a solution of lactic acid in laryngeal tubercle. The pure acid, however, was, and is, extremely valuable. I can recall one case of ulceration of the vocal cord which healed up under lactic acid and remained healed for twenty years.

For cases which were not ulcerated, but where there was marked pseudo-cord, mental and other like aromatic sedatives dissolved in paraffin were slowly trickled into the larynx from a laryngeal syringe. I cannot say that I have ever seen any good effect except the relief of cough and irritation. But lactic acid and menthol were then our main remedies.

The next stage was the advent of severe surgical measures. Krause, and Heryng of Warsaw, introduced into practice the laryngeal curette. Sets of instruments came into our hands, biting instruments, scraping instruments, and cutting instruments like cutting bone forceps. The interior of the larynx was vigorously attacked with these. Ulcers were scraped, just as on the ulcer of the leg is scraped, elastic tissues were ablated, diseased cartilaginous cartilages were cut out bodily, and the larynx was treated generally as if it were a tuberculous knee-joint. There is no doubt that wonderful results were obtained, in tolerant patients. But I doubt whether our English patients were tolerant enough for this process. It had to be repeated; it
produced sometimes—though not always—marked local and general reaction, and not uncommonly severe haemorrhage; and, of course, in spite of local anaesthesia, much pain. Still, it was a rational treatment, and in good hands and in good cases cured the disease. Like every other surgical treatment, if only feebly applied, it, on the contrary, did much harm and hastened death.

Of course, the one trouble always was, that when you had got your ulcers cleaned up, they were always liable to re-infection from the pulmonary discharges; and the huge open wounds resulting from the treatment were particularly liable, unless they healed up quickly, and their cure, at any rate for the time, resulted. Speaking generally, the method was not largely used in England, but it was very extensively used in Russia and Northern Germany, where apparently there is no limit either to the enthusiasm of operators or the tolerance of patients.

The same development of sanatorium treatment of consumption; and laryngeal tubercle shared this movement with pulmonary tubercle. The great principle in the treatment then became the proper regulation of food and exercise, combined with fresh air, and, above all, absolute rest of the voice. It is, of course, impossible to secure complete rest in these days of noise and muscle, which is, of course, forbidden, and by prolonged general reposed violent respiratory movements were prevented. Cough also received special sedative treatment to secure immobility of the larynx.

There can be no doubt that this method often secures brilliant results. There is at least one well-known laryngologist who has had many ulcers completely cured of laryngeal tubercle by this means: and it offers today in sligh cases the best chance of success.

But in the last few years, there has been introduced a means of treatment which gives most valuable results. That is the use of galvano-puncture.

The rationale of it is not so much the actual burning away of diseased tissues, as the fact that the hot platinum point has a local destructive effect on the bacilli, and that by promoting fibrosis it tends to limit the spread of the disease. That at any rate is the theory. In practice it is performed by puncturing diseased areas by a fine heated point which is thrust down to it is among the healthy tissue. The point must be almost at a white-heat: several punctures are made at the same sitting, and an interval of three weeks or less secured between the applications. Two things are surprising: one, the small amount of inflammatory reaction or subsequent pain; the other, the rapid shrivelling-up of inflations under its use. Whether it is applied under the guidance of the laryngoscope, or through a direct laryngoscopic tube, matters nothing. Each operator will use the method he is most at home with. Of the result, however, in many cases there can be no doubt.

There is one special part of the larynx which, when alone affected, can be easily removed. That is the epiglottis. It is not a very common seat of the early deposit of tubercle; but it is not seldom affected. When it or a part of it is affected there can be no question that it, or the diseased part of it, should be amputated with a powerful cutting forceps. Considerable portions of it can be removed with no effect on swallowing except a good effect, and the operation furnished a rapid and easy way of getting rid of the stroke, of a large amount of diseased tissue.

It would seem that when once the desirability of free surgical attack on the tuberculous larynx is admitted, the question of thyrotomy and radical treatment after naked-eye inspection would be the next step. Unfortunately, the results of thyrotomy are, or have been, on the whole bad. A few cases have been recorded in which the disease has been cured; but factors against success are (1) the co-existing lung disease, which renders the patient peculiarly unfit for external operations, (2) the fact that infection is apt to attack the wound. Cases suitable for thyrotomy may be a few (1) those with localised tuberculomata, (2) those where there has been perichondritis and necrosis of cartilage requiring removal of the dead cartilage and drainage. On the whole, it seems that as much good, with less risk, can be done by suitable intra-laryngeal surgical treatment as by thyrotomy.

Tuberculin has of course been tried. It might be thought that the larynx offered a good field for testing tuberculin, as the effects could be observed accurately; and that is true. Unfortunately, the results are not by any means always beneficial. Dr. C. Mac Wilkinson was able to describe, three years ago, several cases which had been completely cured, and he concluded that all other methods of treatment were obsolete. That has not been the experience of many other observers. It may be that Dr. Wilkinson—who of course discards the opossum index, and uses methods of his own—may have some special knack or acumen which enables him to get results others cannot get. I should be inclined to say that on the whole the effects of tuberculin are disappointing, and certainly not so uniformly good as to render other treatment unnecessary.

To sum up, in conclusion: What are the proper lines of treatment of tubercle of the larynx?

(1) The treatment of the lung disease by sanatorium methods.

(2) The prescription of absolute rest of the voice, and as much rest of the respiratory movements of the larynx as is consistent with proper treatment of the lung.

(3) The provision in sanatoria of properly trained laryngeal surgeons.

(4) Possibly the establishment of sanatoria devoted exclusively to the treatment of tuberculous cases complicated by laryngeal disease.

(5) If there is thickening by deposit, or by the pseudo-exudative condition of the various folds of membrane in the larynx, the repeated application of galvano-puncture.

(6) In cases of slight ulceration the vigorous application of lactic acid, possibly combined with formalin.

(7) In cases of extensive disease removal by intra-laryngeal methods of the diseased structures, but only in cases not suffering too severely from the general effects of the pulmonary trouble. In particular, the removal of diseased parts of the epiglottis can be undertaken with ease and safety.

(8) A trial of tuberculin by skilled and experienced hands.

All these methods will often fail; but it is none the less true that in early cases, and in particular in cases which have a fair amount of resistance to tuberculosis at any rate either natural or acquired, the results of treatment will be found strikingly favourable, and not seldom permanent.

Mr. Thomas John Hitchens, M.R.C.S., L.R.C.P., D.P.H., late of 42, St. Aubyns, Hove, formerly of Broadfield, Crawley, Sussex, and Surgeon to St. John's Hospital for Diseases of the Skin, London, left estate of the gross value of £6,531.
PREHISTORIC MAN AND HIS EARLY EFFORTS TO COMBAT DISEASE. (a)

By T. Wilson PARRY, M.A., M.D.CANTAB.

Part II.

It must have been but a short step for the first man who, firmly believing in demontical possession, and at the same time suffering either from frequent fits, severe pain in the head of a periodic or paroxysmal nature, chronic hemi- or unbearable Ménière's disease, made an effort to free himself from his fetters. Life had become an intolerable burden to him, and he believed that there was a devil inside his cranium that was petitioning somewhat persistently for liberty. Was there not the Medicine-man who always attended to members of his tribe when accidents befell them, who stopped their bleeding and dressed their wounds? He would go to him and ask him to make a hole in his skull to let out this wicked and restless spirit. The first operation must have been troublesome and tedious, not to mention its extreme danger. The scalp had to be cut through with a sharp point of flint or obsidian, the bleeding stopped, and the scraping of the bone commenced. This would take the first operator many hours to perform, but the patient was helped and anxious to get rid of his devil and possessed that unshackling stoicism to pain that is characteristic of the savage and the operation would be at length completed. If the patient recovered, whether he obtained relief from his symptoms or not, he was henceforth revered as a sacred person. We can thus see why, in some districts, trephining was so prevalent, for prestige seems to have been purchased by undergoing this operation. After death the skull was eagerly sought after. The trephined portion was removed by flint saws, and pieces of bone, edged by part of the healed cicatrix, were removed. A hole was bored through the centre of this trophy, and it was henceforth regarded as a talisman that it worn would insure the wearer from getting the disease from which the opiatee had suffered. So great a demand appears to have been made for these amulets, at one time, that we actually find spurious imitations were made from untrephined pieces of bones, so that a portion of the healed cicatrix became an essential to prove its authenticity. The year 1868 was a memorable one, for it was in this year that M. Prunières discovered in a dolmen near Aliguières the first trephined neolithic skull to which the attention of scientists was drawn. A large piece of bone had been removed, and the smoothness of the edges made the discoverer think that this had been purposely polished for the lips, in the converting of the skull into a drinking-cup, a practice well recognised among savage tribes. The finding of five other skull fragments, in the same dolmen, all partly removed in the same way, made the finder think that these also were parts of converted drinking-cups. The interpretation of this mystery was left to Professor Broca, who showed indubitably that the holes in the skulls had been made during life, had been done by scraping, and that, after the death of the individual, portions of such skulls had been evidently eagerly sought after. He came to the conclusion that the operation was usually performed on children and from what he says: (b) "it could be effected on the skull of a child less than five minutes, whilst on an adult it would take an hour,"—it will show he had probably made some careful experiments. Broca believed that the operation was performed for the cure of epilepsy and convulsions, and he argues from the supernatious practices found in connection with it that at that period, as well as long subsequently, these diseases were regarded as peculiarly the work of spirits.

He quotes from a treatise upon epilepsy (c) by Jehan Taisil published in 1603 not only to show that infantile convulsions were confounded with true epilepsy, but that, at that time, epilepsy and kindred diseases were looked upon as spiritual diseases, the works of gods or demons, while the remedies recommended in the treatise were highly in accord with the suppositious ailments. He says: "The skull, for example, applied to the crown of the head, sometimes the same administered in potions or pilules, and sometimes as nodules to be worn round the neck; while sometimes also scraping the skull was recommended. Broca goes on to show that (d) "all through the middle ages, and even after the Renaissance, the substance of the skull was used in the treatment of epilepsy, the skulls of Egyptian mummies being regarded as the most efficacious whilst in the last century all the pharmacists contained a bottle labelled Ossa Vermiliana for the treatment of epilepsy, the peculiar efficacy of the triangular lambdoid bone consisting in its form, which resembles that of the amulet cut from the human skull, thus showing the step between prophylactic and mystic medicine." Broca thought that the trephining was in accordance with the entire Neolithic Period on account of the fact that trephined skulls had been found in the cavern of the "Homme Mort" (Lozère) which dates from the commencement of the Neolithic Period.

It might have been thought, considering the number of trephined skulls that have been excavated in France, that the custom would have spread to the British Isles, as only the Channel separated the two countries, and we have evidence that there was no inconsiderable traffic between them in Neolithic times. I have only been able to hear of three such skulls that have been unearthed in this country, and I should be most happy if any of any other specimens would kindly inform me. The three specimens of which I know are: (a) A skull that was
dredged from the bottom of the docks at Port Talbot, South Wales, in or about 1870-2. I have a photograph of this skull to show you this evening, kindly lent me by Mr. Thomas Gray of the above-mentioned place. This skull shows a frontal excavation over the right supra-orbital region. Not having seen the specimen I am unable to give any opinion. (b) An interesting specimen showing a ring-trephine as if an effort had been made to remove a rondel of bone. This skull, which I have also here for your inspection this evening. It will be seen from the above that it is probable that two out of these three trephined specimens are of prehistoric age. I am able to describe them in this paper. In three of these specimens a complete perforation has been made in the cranial bones, and in the remaining three either part of the outer table alone, or the outer table and diploe have been removed by scraping. One, a male, from New Britain (presented to the Museum by Dr. C. G. Seligman), has a large hole measuring 28 mm. by 34 mm. in the right occipito-parietal region. The outer edge of this hole is thin, bevelled and smooth and shows a healed surface, demonstrating a successful operation. Of the five other skulls, all of which come from New Ireland and were presented by Dr. W. E. Redman, of Pictou, New Zealand, one specimen shows a rondel, on the left side the outer table has been completely rubbed through, and on the right is a circular scraping through the outer table leaving a boss of bone in the centre, which looks as if an attempt had been made to remove a small rondel of bone. Why these two operations should have been made on the same skull and both in the frontal region is difficult to imagine, unless the symptoms for which the operation was performed, having still persisted, a second operation was demanded. In the third skull there is a beautifully rounded hole measuring 14 mm. by 15 mm. in the left frontal region. The edges of this hole are smooth and rounded and show an excellent healed surface. The reason for the operation having been performed in this case is obvious, as there is a diseased patch of bone with considerable erosion in the mid and right frontal region. The devil had need of being released in this instance as the disease is undoubtedly of syphilitic origin. In the fourth skull there is a large patch of osteitis.
skull. It is not surprising, therefore, to find that the surgeon advised, or the patient solicited, the trephining of a patch 17 mm. by 28 mm. in front of this diseased surface, as probably a direct counter-irritation to relieve severe and continuous headache. The skull has not been perforated, but the outer table has been scratched through and the surface is smooth and shows every sign of healing. In the fifth skull there is a large elliptical scraping, measuring 48 mm. by 35 mm. in the right parietal region. There is inflammable material, such as touchwood or dried leaves being in the near vicinity for catching the spark. With a sharp point of some hard material it was used for drilling holes. In a clever prehistoric romance, entitled "The Master Girl," the bow-drill is shown most reasonably to have been invented previously to, and to have given the first idea of the ordinary bow, from which arrows are shot. Obsidian I also used in two ways. First, as obsidian flake scrapers, and secondly, as hafted implements in the form of an Admiralty Island knife. I used two kinds of sharks' teeth, both being hafted in wooden handles. A small variety, which I only employed in the case of an infant's skull, I obtained from a socketed club made by natives of King's Mill Islands; this specimen has been identified by Mr. C. Tate Regan, of the Natural History Museum, as belonging to "Carcharias glauces or a related species," while the larger specimen, which I used for two adult skulls, as Galeocerdo arcticus. The shells I employed were beach-worn specimens of a species of the oyster (ostrea edulis) picked up on the north coast of Brittany. For slate I used an ordinary piece of slate, shaped like a scraper.

For scraping a hole in bone, metal not being considered, there can be no better natural implement than a well-flaked piece of flint. Where flint cannot be obtained, as in volcanic regions, such as the South Pacific Islands, obsidian makes a good substitute. Obsidian is a natural volcanic glass, and can be flaked, in the same way as flint, by a sharp well-directed blow. The obsidian I used came from the Lipari Islands, north of Sicily. Contrasting these two substances I would give flint the first place. A hard, sharp edge can be obtained in flint which is more resistant to counter-pressure than is obsidian. Obsidian, like glass, can give an even sharper edge than flint, but it is much more brittle, and if care be not taken minute particles may swiftly penetrate into the eyes of the operator. I may remind you that while flint is a silicious sedimentary deposit, obsidian is of igneous formation. Both flint and obsidian when freshly flaked are excellent substances for surgical purposes. Both by virtue of their smooth surfaces, and here obsidian would take the pre-eminence, are aseptic, and this is a point of infinite importance when coming in contact with the dura mater. It

![Fig. 11.]

Dry specimen (female) trephined by hafted obsidian knife (Admiralty Islands) (Fig. 11). Rondel removed and can be seen below specimen. Time taken 78 minutes.

A deep furrow in the centre of this scraping which shows one the method by which it was done. It is all but perforated. In the sixth and last specimen there is a large perforation, 23 mm. by 40 mm., over the left frontal region and part of this hole is filled up with fresh callus that has evidently given a very successful result. All these cases, I have not the slightest doubt, were done by scraping the bone with obsidian flakes. The usual custom in Melanesia after the operation has been performed is to replace the scalp, which was incised in the first instance by an obsidian knife, and simply bind it in position by a bandage made of banana-fibre.

Being anxious to ascertain how Neolithic man trephined living subjects with the crude materials at his disposal, I made a series of some 19 experiments both upon recent and dry skulls. When showing the results of some of these experiments to Professor Keith, he informed me of a (7) pamphlet by Dr. Lucas-Championniere, in which I would find that several of my experiments had already been done by him. I was quite unaware of this brochure when making my tests. Referring to this pamphlet, it appeared to me that Dr. Lucas-Championniere had only experimented with flint. I experimented, in addition, with obsidian, sharks' teeth, shell and slate. I used flint in two ways, first in the form of neolithic scrapers, and secondly, as a hafted sharp point to a bow-drill. The bow-drill, I may mention, is one of the oldest forms of mechanical contrivances. Without any hard material affixed to its end it has been used from time immemorial by the Sioux and Canadian Indians to make fire by the friction caused when used against another piece of wood, some easily
surprised me at first, in no small measure, to find how cleanly and easily a flint knife can cut through the scalp, and obisidian, of course, is even better, for, in the Andaman Islands, in the present day, the natives shave their heads with obisidian knives. The method I employed for scraping the trephine-hole in both flint and obsidian was the following:—Having selected a site on the skull and also a suitable flake, I scraped as nearly as possible along a single line. This line I gradually converted into a groove, which soon showed two more or less prominent edges. The outer table of the skull is by no means as easy to remove in this manner as might be expected. As the groove progressed to the inner table the groove with a curved movement of the scraper till a depression was produced in the bone which gradually assumed an elliptical shape. It is only now a question of time and manipulation to convert this elliptical depression into a circular one, and then, having penetrated the inner table of the skull, to expose the dura mater and insert between them with the bone to the size and shape required. In only one case can I remember slightly bruising the dura mater, and the reason of this was that my supply of neolithic implements was limited and I had not to hand, at the moment, the particular shape I required. It must be remembered that when Neolithic man was operating by the hand he bountifully supplied with probably hundreds of sharp, newly-cut flakes, and immediately one became blunted or was not to his fancy in any other way, he would naturally fling it aside and choose another. As regards the bow-drill, I got my carpenter to affix a neolithic flint-point into a wooden shaft, and then worked a hole of the size fifteen in number, in a circular manner on the place chosen. These I enlarged till they touched one another. At this point there is a great risk of shattering the flint-point or of unhafting it altogether, as it strikes with force the broken edge of an adjoining hole. Having completed the circle with as deep holes as is expedient, I next fitted the edge of the flakes to them with the sharp and strong flint-flake, and then, by means of scraping and scraping, eventually removed a complete ronde of bone. This is an extremely tedious and clumsy operation and not in any way calculated to bear comparison with the simpler method of scraping. As regards sharks' teeth as scrapers, I could not compare the sharpening of a bone by them with the scraping of a flint and obisidian. It is no more excellent natural implement for boring holes in bone than a hafted shark's tooth. Its keenly serrated edges and its strong, sharp point make it an instrument invaluable to the primitive surgeon. It, moreover, possessses a natural flange which converts it into a trephine of undeniable utility, for the flange is so placed as to prevent the prying out of the trephine by the dura mater, or the bone to the wounding of the dura mater. A ring of holes (as in the case of the bow-drill) packed as closely together as possible, followed by the breaking down of the bridges between them by a scraping and saw-like action of the implement makes a hole, after removal of the rodel and obisidian, not unlike a new trephine the user could wish. Trephining by shell was probably never attempted by Neolithic man in Europe, though primitive man most certainly used shell-knives for ordinary use and shell-langets for opening abscesses in the South Pacific Islands. It took me about 25 minutes to trephine the skull of a 15 months old child, which took a quarter of an hour. During the scraping process the shell, of course, wears badly, and there is much more detritus than in the case of flint or obsidian. One specimen I experimented upon with slate. Slate has been found in many neolithic tombs, and it was doubtless used for domestic purposes, as the patting of butter or the making of cheese. I am quite convinced it was never employed as a trephine, for it is too soft and friable; but I made this experiment in order to test the value of slate as a boring implement as regards bone. It took me nearly 50 minutes to make the small hole I was able in the skull of a man 41 years of age. Subjoined is a list of my experiments. The originals are exhibited in the Historical Medical Museum, and I have to thank the curator, Mr. C. J. S. Thompson, for the loan of the trephined aboriginal skulls I am able to show you this evening.

(A) FLINT

<table>
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<th>Time Taken (minutes)</th>
</tr>
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<tbody>
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<td>11 months</td>
<td>12</td>
</tr>
<tr>
<td>2</td>
<td>Female</td>
<td>16 months</td>
<td>12</td>
</tr>
<tr>
<td>3</td>
<td>Female</td>
<td>5 years</td>
<td>14</td>
</tr>
<tr>
<td>4</td>
<td>Female</td>
<td>23 years</td>
<td>14</td>
</tr>
<tr>
<td>5</td>
<td>Dry Specimen</td>
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<td>24</td>
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(B) OBISIDIAN

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<td>7</td>
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(C) SHARK'S TEETH

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<td>18</td>
</tr>
<tr>
<td>9</td>
<td>Male</td>
<td>3 months</td>
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</tr>
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<td>10</td>
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<td></td>
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</tr>
<tr>
<td>11</td>
<td>Male</td>
<td>4 years</td>
<td>24</td>
</tr>
<tr>
<td>12</td>
<td>Dry Specimen</td>
<td></td>
<td>40</td>
</tr>
<tr>
<td>13</td>
<td>Male</td>
<td>41 years</td>
<td>24</td>
</tr>
</tbody>
</table>

(D) SHELL (Ostrea Edulis)

<table>
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<th>Time Taken (minutes)</th>
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<td>14</td>
<td>Female</td>
<td>9 months</td>
<td>25</td>
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<tr>
<td>15</td>
<td>Male</td>
<td>41 years</td>
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We have been looking back to-night into the far-away past and have been endeavouring to piece together the history of prehistoric man from specimens of his handiwork that have been heirloomed to us by the sheltering hand of Nature, who has protected them for us, either by covering them over with the debris of rock or hiding them in the crevices of many a stony cavern. To this has been added a passing glimpse at the methods of present-day primitive tribes. Tylor says (19) "The uniformity which so largely pervades civilisation may be ascribed, in large measure, to the uniform action of uniform causes." Thus it is that the combination of these two parallel studies enables us to get a true insight into the life of prehistoric man, a century and a half away from us. We have been looking back upon these days as we now look back upon the opening years of the last century, will state that radium had only just been discovered, electricity was only used in a limited manner, and that scientists of that day were only then wresting hypodermism from the hands of the shrewd and clever charlatan. They will possibly look back upon these days as we now look back upon the opening years of the last century, and say that men of that day were shrewd and clever charlatans. They will possibly look back upon these days as we now look back upon the opening years of the last century, and say that men of that day were shrewd and clever charlatans.
TRANSACTIONS OF SOCIETIES.

ROYAL SOCIETY OF MEDICINE.

SECTION OF OBSTETRICS AND GYNAECOLOGY.

MEETING HELD THURSDAY, JULY 2ND, 1914.

DR. W. S. A. GRIFFITH in the Chair.

SPECIMENS.

Dr. H. R. Andrews showed a uterus which he had removed after performing Cesarean section. Labour was obstructed by a carcinoma of the cervix which had extended into the body of the uterus, but had caused no symptoms. The patient was 37 years old, and was admitted to the London Hospital on March 1st, 1914, having been in labour about 24 hours. On admission the pains were strong and frequent. The cervix was rigid and only two fingers dilated. More careful examination of the cervix found it to be extremely hard and firm feeling, as if a portion of a thick rubber ring pessary had been left in the tissues of the cervix on previous section. The posterior one-third was normal. There was no ulceration, but in front and to the left a raised, elevated edge could be made out. On examination with a speculum it was impossible to diagnose that it was by its appearance, but a sound sank into the tissues about half an inch with only gentle pressure. Cesarean section was performed and the uterus then removed. The anterior wall of the cervix above the growth was so thin that it tore in separating it from the bladder. On examination after the operation a hard, white growth was found to occupy all the lower portion of the cervix except a little more than an inch posteriorly. Sections showed squamous-celled carcinoma. The cervical canal was so diffusely involved that it was impossible to determine the area of the growth by its appearance. Sections showed a growth consisting of squamous epithelium. It was impossible to determine whether the glands were malignant or not. The incision into the area of the growth was made at the upper part of the cervix. There was no ulceration of the cervix itself. A diagnosis was made that the patient was suffering from a cancer of the cervix extending into the uterine cavity. Fortunately the patient did well for a time, the growth recurred, and the patient died within the year. Sections of the growth proved it to be a carcinoma, partly squamous and partly cylindrical-celled in type. It apparently arose from the interior of the cervical canal.

Dr. Macnaughton Jones showed a specimen of adenocarcinoma limited to the stump of the uterine cavity. The uterus had been removed from a patient, aged 44, a widow. She had had four children. For some years she had a vaginal discharge which was coloured but not offensive. The uterus was curetted, and the material removed was reported to be adenocarcinoma. Ten days later the uterus was removed, and at the operation the fundus of the uterus was found projecting into the uterine cavity and involving the myometrium. The growth was an inch and three-quarters in length. It exhibited the ordinary features of an adenocarcinoma.

The Practical Surgery (18) W. S. A. Griffith showed a case of utero-rectal adenomyoma with extensive decidual metaplasia complicating pregnancy. The patient was at 37 years old, married 15 years, one child, born December, 1890. Pregnant again at about the sixth month. On regular period of labour had been seen on September 22nd, and on the 26th the patient was admitted to the Maternity Hospital. On admission was in active labour, and the pains were increased. The patient was then examined by Dr. Andrews, who found the cervix extended above the myometrium, and on its anterior surface was a flat sessile fibroid. There was some hydranromia. The mass in the recto-vaginal septum was ill-defined and soft and spongy in character, not bleeding on digital examination, but on exposing it with a Sims' speculum and touching it with dressing forceps free arterial hemorrhage followed. The mucosa of the rectum was not invaded. A fragment of the growth was removed through the posterior fornix for examination. Adenocarcinoma was diagnosed. The test for decidual metaplasia was faintly positive. The optical test was not done owing to insufficient material. During the following month the case was carefully watched, and it was finally decided to perform a Cesarean section. In performing the operation the recto-vaginal septum was considerably, compressing the rectum and extending on the right side as far as the sacrococcygeal synchondrosis. It was decided to try the effects of radium, and this was done, 100 mg. of radium bromide being inserted into the middle of the growth, and two other tubes containing 37 mg. of radium carbonate and 50 mg. of radium bromide, for 20 hours. In June the patient was in good health and the pregnancy apparently was complete. Locally the utero-rectal mass had diminished considerably. Nothing further was done, as it appeared that there was a good prospect of spontaneous delivery. Sections of the growth stained by Van Giessen's method show large masses of typical decidual cells in a stroma of muscle and connective tissue. Within each mass is a cleft, lined by a thin lamina composed of flattened epithelial cells. In one part is a dilated gland tubule lined by low cubical epithelium and completely surrounded by large decidual cell groups. The growth was advancing slowly, and the section showed evidence of recurrence. It was thought that the decidual change supported the view that extravesical uterine adenomyomata were of Müllerian origin.

This paper was discussed together with that of Dr. Archibald Leitch on migratory adenomyomata.

Dr. Archibald Leitch communicated a paper on migratory adenomyomata with epilobiascopic demonstration. It was not uncommon to find parametrical tubes and stroma penetrating for some considerable distance into chinks in the musculature of the uterus where the organ was approximately normal, and in this way adenomyoma started. In the adenomyoma the glandular and connective tissue of the endometrium and the characteristic parts of the tumour was easy to establish; but sometimes the point of entry of the endometrium was restricted and the connection was difficult to find. Further, extravasinal adenomyoma there was no association between the two, but their histological identity with the former group left little room for doubt that they had migrated from the endometrium. They might be found as subserous pedunculated tumours, or, better established within the layers of the broad ligament. Finally, they might be quite separate from the uterus. A case was recounted of an adenomyoma in the base of the broad ligament still adhering to the uterus, but attached by a very fine, long pedicle. The stage further would have been complete separation, and to explain the presence
of a tumour containing glandular epithelium in such a situation the favourite theory was an origin from hypothetical Müllerian or Wolffian duct remains or a metaplasia of peritoneal inclusions. These hypotheses were rejected in favour of the migratory theory. He instance two cases of adenomyomatous of the recto-vaginal septum that had come under his notice. In one of these the gland tubules had actually penetrated the rectal wall as far as the submucosal layer. In both he could trace the tumour to the cervical portion of the uterus, and in both the cervical endometrium had penetrated far into the musculature, both approaching and, he thought, being continuous with each other. He reported in full a case in which a small tumor formed on the anterior wall of the uterus opposite to a tumour in the sigmoid loop of the pelvic colon. Both were typical adenomyomata, and the sections showed that the separation between the was quite recent. He thought that the original tumour had migrated through the uterine wall, had adhered to the dependent colon, and that the tubules had infiltrated the wall of the latter. Adenomyomatous were infiltrating benign tumours of a migratory character, always associated with a definite condition, in which locality they were finally found they had the markedly typical characters that separated them from all other conditions. He had two cases which had taken on malignant change.

The views expressed on these two papers were adopted by Dr. Cuthbert Locke, followed by Dr. Herbert Spencer, who said he did not think that the cases of retro-uterine and sigmoid adenomyomata shown by the President and Dr. Locke were of endometriosis, but that it was well known that the peritoneum formed decidua during pregnancy, and its presence in the President’s case was no proof of Müllerian origin. He looked forward to the future history of that interesting case. One of the most important is the probable incidence of the peri-rectal fibrosis it set up. Wolff had found X-rays of little benefit in adenomyomata. Dr. Spencer had pointed out a year and a half ago, in discussing Dr. Locke’s case of excision of the uterus and rectum and vagina, that the researches of R. Meyer, Amann and Regisch showed that the growth arose in the peritoneal endometrium. The researches of Pick, Orloff, Ivanoff, Optiz and others, and examination of the speaker’s own three cases confirmed the interest in which he was interested to see Dr. Locke now adopted. Migration of endometrium and the Müllerian and Wolffian theories did not explain some of the remote adenomyomata, which had been observed in the small endometriosis, as in the pedicle of a ventro-tixed uterus. Dr. Spencer had in his last case performed hysterectomy and dissected the growth from the rectum with the gall-valvomacutery. The patient, recovered, with no evidence of a local reaction. He agreed with Dr. Locke that adenomyosis was not a tumour except in the clinical sense. He thought also that the ordinary diffuse uterine “adenomyomatous” was not a “tumour,” but a hypertrophy and hyperplasia.

Dr. Walter Tate and Dr. Williamson also spoke. The President and Dr. Archibald Leitch replied. Dr. W. S. A. Griffith then delivered his Presidential Address, a full report of which will appear in the Medical Press. Votes of thanks were given to the retiring Officers of the Section for 1913-1914.

SPECIAL REPORTS.

ROYAL COMMISSION ON VENEREAL DISEASES.

At the forty-fourth meeting of the Royal Commission, evidence was given by Mr. J. E. R. Macdonagh, one of the Surgeons at the Lock Hospital, and by Dr. Parker, Military Surgeon, Medical Administration. Mr. Macdonagh said that at the present time the education of medical students in regard to venereal disease was quite inadequate, and it was very important in his opinion that compulsory clinical

education of students in venereal disease should be adopted. He considered that widespread clinical experience would render public laboratories for carrying out bacteriological and other methods of diagnosing syphilis superfluous. The important thing in dealing with syphilis was to treat cases at the earliest possible moment, and these early cases could be diagnosed with greater certainty by clinical than by pathological methods. A negative Wassermann reaction in any form did not necessarily refer to a cure; and if treatment were deferred until the reaction became positive, the golden opportunity of cure was lost, however energetic the treatment might be. Syphilitic sores, moreover, frequently escaped in which syphilitic nerves, injected and infiltrating, would be on the increase, and he considered that the spasmocytic administration of salvarsan commonly practised in this country was likely to lead to disastrous results. This spasmocytic pruritus of the drug, moreover, gave a false sense of security, and therefore rendered patients a greater danger to the community. He advocated that the Lock Hospital should be enlarged. The number of patients attending the hospital was steadily increasing.

Dr. Parker maintained that by the establishment of a State medical service many difficulties now connected with the treatment of venereal diseases could be overcome. The essential features of such a service should be efficient and confidential, and in the last resort compulsory, and that the Medical Officers of Health should be in touch with all cases of venereal disease. Efficient treatment would be procurable for the whole State service and would be open to the patient. The treatment of venereal disease would be both a part of the preventive and curative treatment offered to all sufferers alike under a State Medical Service. No action whatever would be taken on the part of any public authority as long as a patient attended regularly and carried out the instructions of his medical attendant; but should he fail to do so he would be proceeded against as a public danger in the same way as is done in the case of ordinary infectious diseases. Dr. Parker considered the difficult question of notification would be under a State Medical Service, or in the sense of a notice sent by a private practitioner to the Medical Officer of Health would become unnecessary for all patients attending a State doctor would be registered with the history and nature of their case, and the Medical Officer of Health, who would represent but another part of the same Service, would have daily access.

At the forty-fifth meeting the headmasters of Eton and Rugby appeared before the Commission. The considered method of the ideal was that boys should be instructed in matters relating to sex by their parents, but their experience showed that that method was not likely at the present moment to be successful to the extent that it is desirable; that the school should be given with much caution, and it should be the special responsibility of the headmaster to give it or to see that it was given. A propaganda based solely on hygienic principles would not find a public appeal which was necessary and was not likely to succeed. At the same time hard exercise, hard work, wholesome society and moderation in diet and drinking were of great use as safeguards against indulgence.

Dr. Bonner Harris Muxby, M.D., C.M., M.R.C.S., of Portsmouth, for 18 years Medical Superintendent of the Portsmouth Lunatic Asylum, and prior to that Medical Officer of Health for the Borough, left estate of the cross value of £13,200.
OPERATING THEATRES.

ROYAL FREE HOSPITAL.

Carcinomatus Stricture of Rectum.—Mr. Berry operated on a woman, aged 41, who had been admitted for constipation and haemorrhage. She had been ill for nearly two years. Nearly a year ago she began to be very constipated. She passed urine and blood, and the patient thought this was due to the formation of the tumour of a healthy child. For a fortnight previous to admission the pain grew worse and she had no normal motion. A ring carcinoma could be felt about two inches from the internal sphincter. At the operation Mr. Berry opened the abdomen, making an incision in the middle line. On examination of the viscera a secondary node of carcinoma as large as a walnut was found in the mesentery. It was, therefore, evidently useless to attempt removal of the rest of the rectum, so a simple colotomy was done. A colotomy was carried out, a Paul's tube being tied in. Mr. Berry said he knew no operation with such a variety of methods of being performed as colotomy. A great point to consider was whether the colotomy was only to be utilised as a temporary exit for the contents of the bowel or if the artificial anus was to be permanent. He pointed out that it was most important for the patient to be washed off before being fixed in position. There are many ways of forming a spur in the operation for cases of temporary colotomy; there is the slipping of a glass rod underneath the loop of intestine through a small hole in the mesentery, resting the ends of the rod on the abdominal wall, the rod is left in position three or four days before the bowel is opened. In cases where a permanent colotomy is desired, one of the best methods is to unite the posterior part of the rectus sheath and leave a small hole in the mesentery, then to tie very stout or thick silk ligatures round the bowel outside the abdomen, leaving a portion of bowel to slough away subsequently; this provides two separate colotomy openings, the upper one permitting fascial matter to escape, the lower permitting irrigation of the lower part of the bowel, should that be necessary. It should be necessary to open the bowel at the time of operation, a Paul's tube can be tied into the upper end of the bowel, whilst a stout silk ligature is left tied round the lower end; generally this separates in the course of a few days, but by this time the peritoneal cavity is well shut off from all risk of infection.

CORRESPONDENCE.

FROM OUR SPECIAL CORRESPONDENTS ABROAD.

FRANCE.

Paris, July 11th, 1914.

Nocturnal Incontinence of Urine.

The treatment of nocturnal incontinence in males consists in practising injections of artificial serum into one of the parts of the bladder as high up as the view of distending the terminal nerve filaments of the region, and so provoking a stimulating effect on the neck of the bladder and the striated muscles of the urethra. The method employed of these injections is simple: the patient being placed on his back and in the position for lithotomy, and the skin disinfected with iodine, the injection is made with a Roux syringe half an inch on either side of the raphé and midway between the scrotum and the anus (a) the needle should not be pushed beyond the cellular tissue and the liquid injected as rapidly as possible, so as to form on each side a tumour containing from two to four ounces of serum; four or five syringes are necessary. The operations almost painless, and do not prevent the patient from resuming immediately his occupations. In general from three to four ounces of liquid on each side are sufficient, but the dose may be increased if required. The author, Dr. Galibert, has utilised this method in twenty cases; the results were excellent in twenty-four patients—eighteen were cured after the first injection, six required two or three sittings, while the remaining six patients experienced no benefit.

Delamare applied the method to two patients and obtained four cures with only one injection, two after two injections, while three required four or five sittings, but all were cured. Bergasse had twenty-two cures out of twenty-two patients treated, and Gray five out of seven cases. The treatment may also be employed in children, but the quantity of serum should not exceed one or two ounces, so as not to distend the teguments beyond measure.

Hydrocele.

The classical medical treatment of hydrocele consists in evacuation of the liquid, injection of two drachms of a solution of cocain (1:50) left in for five minutes and followed by tincture of iodide for the same time. The method is good, but rather painful.

Dr. Sattre prefers, after tapping the liquid, injecting 50 drops of a solution of adrenalin—half a grain of adrenaline for four ounces of water (0.02-100). This method has the advantage of being entirely painless, while relapse is rare.

Supra-renal Virilism.

Prof. Tuffier, present at the meeting of the Académie de Médecine, a woman, aged 62, who entered the hospital six months before for abundant metrorrhagia indicating a voluminous fibroma. As the urine was found to contain a large quantity of sugar, all operation was deterred. While this was the case, it was extraordinary to have an extraordinary development of hair on the face and more or less over the body; the beard and moustache were well furnished, the voice was masculine, while the muscles were well developed and outlined. Examination of the genital organs showed a clitoris an inch long and covered with a large prepuce. All these phenomena began to appear after the menopause, and at the same time the habits of the woman underwent a change; she showed a preference for hard manual labour. Through medical treatment the sugar diminished more or less rapidly, so that at the end of six weeks laparotomy was possible. No fibroma was discovered, but on the other hand the uterus was abnormally hypertrophied and removed. In exploring the abdominal cavity, M. Tuffier came on a lipomatous mass covering each kidney. In his concluding remarks, M. Tuffier thought, with Gilbert Ballot and Galliés, that signs of virilism in the female should attract attention to a possible supra-renal tumour which, recognised at an early date, could be treated with some chance of success.

Varicose Veins.

The usual treatment of varicose veins is the wearing of an elastic stocking or bandage and iodide of potassium or haminamol given internally. However, something more might be done to the satisfaction of the patient. Prof. Robin advises washing the legs each morning with a solution of silicate of soda (1-100), leaving the sandy matter, and powdering them with

- Starch powder, 2 oz.
- Oxide of zinc, 3 dr.
- Camphor, 1 dr.
- Essence of geranium, 6 drops.

Internally, six drops at each meal and continued for months of

- Tincture of haminamol, 1 dr.
- Tincture of viburnum, 1 dr.
- Balm of pleurisy 3 dr.

If scoliosis of the walls of the veins exists, iodide of potassium and bicarbonate of soda must be given and the following ointment passed over the veins:

- Iodide of potassium, 1 dr.
- Vaseline, 1 dr.
- Tincture of nux vomica, 15 drops.
- Axxane, 1 oz.

Raths of Bagnols salt, followed by gentle massage, are also to be recommended, or better still, the patient might be sent to the baths of Bagnols-de-l'Orcet.
At the Gesellschaft der Chirurgen in December last. Three years before she had suffered from symptoms of gastric ulcer. She was admitted into the Charité in December last. Three years before she had suffered from symptoms of gastric ulcer; she had vomited blood and was then free from trouble. In November she began to have repeated vomiting of blood. The patient was admitted, as after two days the haematemesis never ceased, and the patient's death was certain if nothing was done. He was taken to operate, and, bearing in mind the desperate nature of the case, proceeded to do so. He was able to show the patient alive; she was not strong, but she had never been so. (Patient shown.) They saw the oblique incision. It healed per primam; she eaten her food and, as regards the stomach, was quite free from trouble. Under such circumstances the surgeon was placed in a precarious position. Of the four chief complications of gastric ulcer—haemorrhage, perforation, stenosis and malignant degeneration—the last named bore small; the first and second seemed a clear distinction, and would not be likely to do so. The surgeon only came into the question in haemorrhage in rare cases. Here there was first abundant haemorrhage, secondly, this had recurred after only a short interval, and also the patient was much wasted. The haemoglobin content was reduced 30 per cent., the number of erythrocytes was two millions. Much could have been said against active treatment, the bad condition of the patient, who could not stand any operation. For this reason a strictly vital indication could not be operated. Secondly, there was the difficulty of finding the ulcer. Whilst ulcers perforating into the free abdominal cavity were mostly seen on the anterior wall of the stomach, the haemorrhage was mostly behind, above the cardiac end and difficult to find. Bearing in mind the difficulty of the operation, the decision had to be made whether the ulcer was chronic or recent. The deep ulcers which had eaten through the wall of the stomach and entered the vessels of the pancreas were especially difficult to treat; they were easier to find, but arrest of haemorrhage from the operation was not at all easy. The more recent, which closely resembled haemorrhaging oesomorions, were often less difficult to find and easier to repair and normal to surgical treatment. From all that could be learned the ulcer was seated on the pylorus. He made a wide incision in such cases, as small ones were of no use; the whole thing was a question of moments; the body of the stomach was opened slowly, the incision to the left, and the field of operation was before his eyes. On the pylorus was an imperceptible thickening. They opened the pylorus nothing was to be seen of an ulcer. The incision was then closed by suture. His assistants believed the operation would have to be abandoned. He could not resist having another try, so he prolonged the incision towards the cardia, over the stomach until it was only a matter of minutes, with careful wiping nothing could be seen of the ulcer. Then the speaker was reminded of his pathological days, when bodies were sometimes met with in which the stomach was filled with blood clot, but nothing could be found for it until the stomach came out, and showed him the ulcer very small, only a pin's head in size. He passed his gloved hand into the stomach, and between the folds just above the lesser curvature he touched the pin's head. That must be the bleeding spot. A spatula was placed under, and he then saw a clot of blood on the projection. He had a Paquelin with him, and applied it when the clot was washed away and the artery was exposed, thus the ulcer was exposed, and the fresh blood he then applied the cautery and closed up the stomach. Recovery was quite uneventful. Naturally it would be a long time before the normal condition of her blood would be restored. It was only very rarely that haemorrhages from the stomach could be treated in that way. The cases in which such treatment was demanded seldom were fortunate enough for that reason that the ulcer could not be found. The lucky result gave him the opportunity of exhibiting the case, otherwise it would only have been seen on the post-mortem table. He would likewise remark that the cases of the Charité were not composed of selected cases. He had that day made a search through their preparations, but he had not been able to find a similar case in their pathological museum.

AUSTRIA.

TENTH CONGRESS OF THE DEUTSCHER RÖNTGEN-GESELLSCHAFT.—(Continued.)

II.—DIAGNOSTIC APPLICATION (TORAX, ABDOMEN).

Dr. Alban Köhler (Wiesbaden) read a paper on "The Röntgen-ray Diagnosis of the Parasites of Man." He illustrated his subject by photographs of calcified cysticerci in various parts of the body. The calculated rays varying in length from 7 to 9 millimeters, and from 2 to 4 millimeters in width, had been obtained and were now reproduced. These had been met with in the legs, thigh and lumbar region, and the longitudinal axis was that of the parasites. The calcified scolices in which it happened to be imbedded. Röntgenographs of a lung were also shown by Dr. Köhler, in which calcified ova of the distomum pulmonale were freely disseminated throughout. The shadows were circular, often variable in outline, from about 2 to 5 millimeters, in diameter. The diagnosis was also confirmed clinically by examination of the evacuations. A specimen was also presented the round shadows of which had at first been taken for that of an echinococcus, which had proved to be that of metastatic carcinoma.

Dr. Hessel (Bad Kreuznach) made a communication on "A method by which the normal Oesophagus could be illustrated with the help of the stomach. The piece of pith or the capsule which had been filled with a contrast test meal was swallowed, and by its presence he was able to demonstrate the process of swallowing, after which he observed its passage during its passage through the body. In the course of the subsequent discussion, Dr. Holzgeheben (Vienna) stated that the outlines of the oesophagus could be demonstrated during the passage of a mouthful of ordinary solid food. He had observed that more ascending movements were made during the first part of the act of deglutition, some of these being functionally effective.

Dr. Grünemann (Berlin) discussed the subject of the "Diagnosis and Therapeutic Treatment of Gastric Spasmus," and exhibited a number of examples, adopted as a contrast test meal and the effect of the stomach. With regard to this point, Dr. Haudek (Vienna) remarked that we should be cautious in making a diagnosis of gastric spasmus. Dr. Schwarz (Vienna) then stated that in making a diagnosis of gastropusmus there were three varieties, characteristic of this condition which require to be differentiated: the first is that which accompanies the presence of ulcers; it is characterised by retraction of the great curve of the viscous. The second is the spasm occurring in the cardiac part of the stomach, and the third is the spasm occurring in the pyloric end of the stomach. In the first variety the muscular force is greater, and the second variety is characterised by the fact that in the pyloric portion of the stomach it is the pyloric end which is constricted. In the third variety there is a muscular spasm of the pylorus; and the contraction recurs periodically. When the test meal is introduced into the right side of the pyloric end of the stomach the pyloric end is constricted, and the pyloric end of the stomach is constricted. The third type of spasm is the muscular spasm of the pylorus, which may be constricted or in a state of marked constriction.
The sedimentary deposit after the test meal, which he had himself observed, and its presence in the duodenum after flushing would form items of evidence. The clinical part of the case, the causation of retention, appeared to Dr. Hauck to be a resultant of two factors—a high degree of hypersecretion and high elevation of the viscus. In a case of long, hooked stomach, the retained residue of the test meal very soon took place in the presence of hypersecretion, and a marked retention of the diurnal meal sank to the bottom of the gastric cavity, while, in the upper parts of the same, as well as in the antrum pylori, a bismuth-free fluid collected. The presence of the stomach and a new collection formed, the visible amount of gastric contents being thus but little diminished, while a gradually diminishing sedimentary deposit remained for a number of hours. Thus a high-grade bismuth retention in a sharply-curved stomach is an excellent evidence of high-grade hypersecretion; and as this is in turn elicited by the presence of gastric tumours the presence of a gastric sediment is indirectly symptomatic of the presence of a neoplastic growth in that cavity. In the case of a duodenal tumour, on the other hand, hypersecretion also exists; but the hypertonic condition of the muscular wall of the stomach which is produced by its presence, and the fact that such growths usually occur in persons with slanting stomachs have the combined effect of bringing down considerably a deposit of a case of ulcus duodeni after the lapse of six hours—except a very slight one in the vicinity of the caudal pole of the cavity of the stomach. In the case of a long, hooked stomach, however, it may be found to remain in moderate quantity, an interval, even when the initial evacuation had begun early and proceeded quickly. The author had confirmed these observations by experimental researches with canine and human subjects.

Dr. Hainsch asked whether in such cases—with hypersecretion—the peristalsis was diminished, while it was increased in the presence of pylorospasms.

This fact by itself forms a diagnostic landmark. Dr. Grodberg had observed that in the absence of a persistence of the duodenum co-exists with a Holzknecht stomach, it is indicative of functional insufficiency, while in the case of a hooked stomach the chyme is held back.

Dr. Hauck, in reply, stated that in a distended stomach deep peristaltic waves were typical of pylorostenosis. But they first appear after a considerable interval.

Dr. G. Schwarz (Vienna) made communications which discussed the use of acid test capsules. Gelatine capsules were filled with test powder and tied with thread dyed with Congo-red. They were then swallowed, while the free ends of the threads were held in the mouth. The presence of the capsules was indicated by a red staining observed by Rontgen-ray illumination; they were withdrawn after ten minutes, when the capsule was seen to be dissolved. The colour reaction then gave the proportional acidity.

Dr. Lehmann (Rostock) demonstrated a "sopor" hair mass in the stomach of a girl, aged 15. The foreign body was seen to form a complete cast of the stomach, the Röntgen picture of which showed a spotty outline, which moved with the stomach. The mass on removal was found to weigh 496 grammes.

Dr. Hauck then demonstrated a similar case.

Dr. Ley-Dorn and Ziegler made a communication, "On the Characteristic of Röntgen-ray Gastric Symptoms as revealed in numerous Autopsies." They had tabulated the results of 46 cases in which the clinical and Röntgen-ray examination had been controlled by operation or post-mortem dissection—sometimes by both. The revelations of surgical procedure could not be regarded as final, and a plea was made for a comparison with those of post-mortem examination in no less than five instances. Further observation had led them to raise the question: how far the revelation afforded by a graphic-ray picture could be relied on as a demonstrative of the condition of the stomach. Scarcely a single sign or symptom was conclusive, so that repeated observation should be carried out and controlled by clinical evidence. Among other sources of confusion was the presence of gastric adhesions—a very important one. The same could be said of gastric tumours. The outline of the sedimentary deposit is often segmented by the presence of tumours. Adhesions may draw the stomach in various directions; those of the pylorus may have displaced it as much as 4 centimetres to the right. The stomach, when adherent to the gall-bladder, can give positive only in the presence of ptosis and a high-placed and transverse pyloric end.

Dr. P. H. Gracdel (Budapest) made a communication on the "Evidence given by the Röntgen-rays in Cases of Ulcus Ventriculi and Ulcus Duodeni." Of the presence of these lesions he presented two examples, in which the evidence had been confirmed by a direct observation of each lesion. They were insufficient, and it was by the radiological evidence obtained before the operation that the multiplicity and unusual position of the lesions had been ascertained.

Dr. Hauck (Vienna) stated during the discussion that hundreds of microscopic ulcers had been demonstrated by the Röntgen-rays which could not be found by the surgeon. He also referred to the sources of failure which were referable to periduodenitis and to alterations of pancreatic function.

Dr. F. M. Graedel demonstrated the presence of tuberculous tumours in the ileo-cecal region with the Röntgen-rays. He also showed how insufficient the evidence of Bauhin's valve by itself of this lesion.

Dr. F. M. Graedel demonstrated the presence of abnormal foldings of the duodenum and of the jejunum. He had also succeeded in influencing the course of the contents of the last coil of the small intestine, and depressing the tone of Bauhin's valve by those of the ileum.

Dr. F. M. Graedel demonstrated the presence of chronic appendicitis with ileo-cecal invagination.

Dr. Hainsch (Hamburg) and Dr. Schwarz (Vienna) made communications on the Röntgen-ray diagnosis of lesions of the large intestine. The former demonstrated a shadow of carcinoma of the sigmoid flexure, and in another in the ileo-cecal region, pronounced stenosis of ascending colon, peristomalitis, syphilitic lesions, ulcerative colitis with hepatico-ptosis, Hirschprung's disease, megacolon, and the invagination of the cecum which had passed into the descending colon, in a baby of seven months. The latter also demonstrated a number of tumours, syphilitic alterations, and polypi of the large intestine.

Dr. Dr. Ziegler made a communication on "The Diagnosis of Commencing Dilatation of the Aorta, especially of the Arch and Descending Portion."

UNITED STATES OF AMERICA.

New York June 30th, 1914.

ANNUAL MEETING OF THE AMERICAN MEDICAL ASSOCIATION.

The sixty-fifth meeting of this Association, which began in Atlantic City on June 22nd and lasted up to June 27th, was the largest in the history of the Association. The work was opened on June 22nd.

The opening session held in the Apollo Theatre on the Broad Walk.

Dr. Witherspoon, the retiring president, as a last official duty, presented, on behalf of the Association, a gold medal to Dr. Willing. The former president, whose genius made possible the construction of the Panama Canal.

The President-elect (Dr. Victor C. Vaughan) was introduced, and delivered his presidential address. He took as his subject, "The Service of Medicine to Civilisation.

and said in part that the history of medicine was that of mankind. Born in naked ignorance, bound in the swaddling clothes of credulity, and nursed on superstition, medicine has had its savants and its takers, its triumphs and its failures, its honours and
an alkaline solution every five minutes after the injection until a pink colour is observed, and every hour afterwards until the colour is no longer present. Several bottles are numbered for the reception of the specimens in the order passed, and their contents must be made alkaline if not already so. In no case should the dye appear in the urine in from five to ten minutes, and its excretion should be completed about the end of the third hour. The fourth bottle of urine would therefore be uncoloured, those preceding it showing the different stages in which the appearance of the dye in the urine is delayed and the time of elimination prolonged, the result will be apparent in the bottles accordingly. Cases of valvular disease and of toxemia of pregnancy having indicated the necessity of casual cases, were discharged from five to eight hours for complete elimination, and a cardio-renal case which died four weeks later had appearance delayed more than fifteen minutes, and excretion required sixteen hours.

FROM OUR SPECIAL CORRESPONDENTS AT HOME.

SCOTLAND.

Panel Doctors' Incomes in Glasgow.

It appears from the minutes of Glasgow Insurance Committee that at January 11th last 374 medical men were on the panel. This represents about three-fourths of the profession in Glasgow. For the year that ended on the above date one doctor received 3,162 8s. id. for having 4,468 persons on his list, and another received £1,453 8s. 8d. for 3,983 persons. Four with an average of 3,275 patients received an average £1,188 8s. id. each, and seven with an average of 1,895 patients an average £66 15s. 8d. each. Again, 17 with an average of 2,223 received on an average £57 17s. 6d., while 46 for an average of 1,715 persons received an average £61 18s. 2d. Further, 65 for an average of 1,236, received an average payment of £47 13s. 6d. for an average of 725 received an average payment of £26 2s. 6d.; and lastly 158 doctors for an average list of 101 persons received an average payment of £6 12s. 4d. During the same year, £1,097 was paid to 10 practitioners whose names were withdrawn from the panel list owing to resignation or death. The total of payments to chemists, etc., was £2,522 10s. 11d., while £1,177 10s. 10d. was paid in respect of insured persons permitted to make their own arrangements for medical attendance at the special expense.

The Royal Visit to Glasgow.

The King and Queen opened the reconstructed Royal Infirmary and the new Royal Hospital for Sick Children on 7th inst. At the Royal Infirmary, their Majesties saw an electro-cardiograph taken of the pulsations of a patient's heart, under the superintendence of Dr. Macintyre, consulting medical electrician to the hospital. In the cinematograph X-ray room the King and Queen saw X-ray photographs being taken in the three-hundredth part of a second, and also a series of photographs taken pictorially in rapid succession. Shortly afterwards by means of an apparatus which fills the photographs were shown on the screen. The next apparatus inspected by their Majesties enabled them to see, clearly defined, the movements of the stomach in digestion, and also the operation of the electrician. The latest appliances for directly examining the throat and windpipe also aroused much interest, the apparatus being attached to an imitation bullet into which a coin had been inserted. The method of extracting it was later shown to the officials entrusted to their Majesties, who next saw the means by which tumours in the throat and lower down in the respiratory track can be removed by the deep-seated X-ray therapy without morbidity in cases unsuitable for operation. The first photograph of the new ward was made at the latest arrangements for testing the muscles and nerves, and afterwards an apparatus for the removal of superfuous fat from the body. The patient rests
on a couch and electrodes are placed on any part of the body where it is desired to remove deleterious products. By a simple arrangement faradic currents are sent to any part and the muscles are made to contract. Weights made of sandbags are put on the body, up to 10 lb., and upon them are made a few times more than the number of the beats of the heart per minute. It is possible, when a person with a weak heart cannot take exercise, to remove as much as 1 lb., or more per day without any exertion whatever on the part of the patient.

At the Sick Children's Hospital.

His Majesty was especially interested in the excellently equipped theatre, which is lighted on the search-light principle, and listened to a description of it by Dr. T. Kennedy Dalziel, senior consulting surgeon of the hospital. After the operation performed by George S. Middleton, senior consulting physician, was also presented to their Majesties. After leaving the hospital the King and Queen visited the grounds of the Western Infirmary and of the University, and received an address from each. Lord and Lady Newlands have made a donation of £25,000 to the Western Infirmary, the endowment of the Lady Hozier Convalescent Home at Lanark and to commemorate their Majesties' visit to Glasgow and Lanarkshire.

BELFAST.

Belfast Local Medical Committee.

A meeting of this committee was held in Belfast on the 7th inst. by J. Johnston, president, presiding. The following papers were sent forward to the Insurance Commissioners at their request as being suitable for election as members of the Belfast Insurance Committee:—Dr. J. R. Davidson and Dr. T. A. Davidson. The latter has acted as Secretary of the Local Medical Committee since its formation with much acceptance to the members and the profession generally, and the former seeks re-election. If the Insurance Commissioners are satisfied by this selection, the profession in Belfast will be perfectly satisfied.

Queen's University of Belfast.

There was a large number of candidates for the degrees in medicine at the midsummer examinations, no fewer than 46 presenting themselves for the M.B. degree examinations. Of these 37 were successful, 14 being referred. The honours list was the largest in the history of the University. One candidate, Mr. R. M. Beath, obtained first-class honours with a scholarship of £30. Mr. G. R. B. Purie and Mr. W. S. B. Hay obtained second-class honours and scholarships of £50 each. Mr. Sinclair Miller obtained second-class honours with a scholarship of £20, and Messrs. A. Fullerton, E. B. C. Mayes and E. C. T. Young obtained second-class honours. At the M.D. degree examination Mr. D. McKay obtained a gold medal. The Magrath Scholarship of £105 was won by Mr. Sinclair Miller. At the M.Ch. examination Mr. T. S. S. Holmes obtained a gold medal.

LETTERS TO THE EDITOR.

[We do not hold ourselves responsible for the opinions expressed by our Correspondents.]

IMPERIAL ASPECTS OF THE POPULATION QUESTION: THE DECAY OF FRANCE.

To the Editor of The Medical Press and Circular.

Sir,—The much more than remarkable correspondence dealing under different headings with the question suggested in the title of this letter is still going on in the Times. The correspondents are men of real distinction. It is curious that not one of them alludes even distantly to the population phenomena displayed in France; not one of them refers to France as a voluntary birth-rate. In the birth-rate in France has made her population stationary when compared with her mighty neighbour Germany: that she has not enough men for her home requirements; that she has for ever lost her place as co-equal among the Great Powers; and by cutting off the supply derived from abroad a people has made it impossible that she can ever become a great imperial state. She has no surplus to export to her vast territories across the sea well fitted for European settlers. There are, for example, practically no Frenchmen in the West African colonies. The Niger, long, is traversed by a chain of mountains whose slopes accommodate one of the finest climates in the world, whilst the lower lying lands, thanks to medical science, could in great part be freed from tropical disease. It is a publishing fact that experience is beginning to hold that art and literature, in the field of intellect, but she lacks mea. She is enormously wealthy. She recently brought out a loan of £40,000,000, which was at once offered for forty times over almost entirely by her own people. It is a people among whom wealth accumulates and men decay, and it is absurd to suggest that amidst this wealth it can be in any large proportion of cases economic pressure which leads to the limitation of the family to two or three children.

B. Tt. Prof. S. J. Furum.

The modern fashion in medicine is to seek in the colon for the explanation of the majority of diseases to which our flesh is heir. Since Elie Metchnikoff some seven years ago published his fascinating book of optimistic studies on the Prolongation of Life, one can trace the rapid rise of this organ to a place of importance as a causative agent in pathological conditions. The medical church is quite content and would appear that some would advocate that every sick person, and many apparently healthy ones, should submit to be deprived of their colons at the

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earliest opportunity. Some, on the other hand, recommend that the colon should be preserved, and in its rich content of flora and fauna should be sought not only for its therapeutic agents for administration to the patient. The latter idea is no new one, for though nowadays only selected parts of the fecal content are used as medicines, yet formerly the entire mass was frequently recommended. The authors of the book before us have not adopted either of these extreme views, but have contented themselves with describing with minute detail one form of disease of the colon, and in giving most elaborate directions for its treatment. It is not proved that the disease has a real existence we have no doubt, and that when present its recognition and cure will be of great benefit to the patient is also certain, but we doubt very much if it was necessary to devote a book of 370 pages to this work. However, our authors believe that their book is the first English manual that has appeared on the subject, and we may be permitted to hope that it will be some time before its pre-eminence is disputed.

STEWLAW ON SKIN DISEASES. (a)

The appearance of a seventh edition of a standard American treatise on diseases of the skin is a matter of interest to all concerned in that special branch of medicine. It contains some 1,100 pages in octavo of 330 illustrations, many of the latter possessing considerable technical excellence. In common with many American reference books, it shows a striking breadth of comprehensiveness as regards comparatively rare and out of the ordinary cases, that account lessen the grip of individual experience, which is, of all things, important to the serious student of a special subject. It is impossible to do justice to a book of this quality within the limits of a short review, but a few random notes may be made. Turning to "warts," we find a full discussion of this interesting condition. The credit of observing micro-organisms in connection with these growths is ascribed to Kühne, though the growths as a matter of fact, his work was, we believe, based on that of Majorchi, who described the bacterium pox in connection with warts. The article on syphilis is able and interesting, and is illuminated by some illustrations of striking clearness. There is a beautiful coloured plate of an acroform pustular syphilomad of general distribution. In dealing with drug rash the theory of irritation in the process of elimination is mentioned; but in spite of abundant bibliographical references the possibility of this theory is not made of the English author by whom this suggestion was originally advanced. The book may be recommended as an excellent work for all dermatologists.

SCROFULOSIS. (b)

Progress in medicine has not infrequently been checked by the tyranny of a name, which, though apparently definite and precise, is merely a mask of ignorance. Groups of symptoms, or disease pictures, in perfectly undefined, and the more copious the description, and when that name has become sufficiently familiar there is a tendency to consider the picture explained as soon as it can be classed under its official nomenclature. In olden days the term scrofula was used to describe the condition of certain persons with swollen necks from their supposed resemblance to a pig. Such swollen neck was often found to be due to enlargement of the lymph glands. Where the condition was due to the enlargement of lymph glands the term is used, but the distinction was soon lost, and stramous and scrofulous came to be used almost as synonyms, and extended vaguely to that condition of the patient which so frequently accompanies certain forms of lymphatic disease. Out of this arose the use of the term scrofula, but it is not made that many forms of glandular enlargement were due to infection by the tubercle bacillus it seemed as if some definiteness was to be introduced into the meaning of the term scrofula, and for some time, in these countries at least, the term became synonymous with tuberculosis. More recently an effort has been made to differentiate between the two terms and to restrict the meaning of scrofula to include those conditions of young people which form a suitable breach for the tubercle bacillus, but which have not yet been infected by it. That there is such a condition of children is probable, but whether it is wise to designate that condition as scrofulous we doubt very much if it is. When such a disease should disappear altogether from medical nomenclature. While we differ from Professor Corree in his use of the term, we are in full agreement with him in the importance of the conditions which he describes, and we are indebted to him for the admirable description of them which he gives. Not only are these conditions well described, but the treatment, both from the point of view of prevention and cure, is given in a wealth of detail which makes a valuable and interesting contribution to medicine. A full biography is a notable addition to the work and greatly increases its usefulness.

MEDICINAL TREATMENT. (c)

It is not necessary to do more than draw attention to the second edition of the English translation of Professor Oertel's work, which is already in its fifth edition in the original German. The translation is primarily intended for the use of American practitioners, and the references to climatology have been adapted for their use. This, however, does not make it any way detract from the usefulness of the book for students in Great Britain, as both English and Continental watering places are mentioned. The translation appears to be well and carefully done, and Dr. Bartlett has succeeded in giving us the author's meaning in idiomatic English.

MINOR MEDICINE. (d)

Since Dr. Wynter's little book was first published in 1907 it has been reprinted four times and now a second edition is called for. We congratulate the author on the success which such a history indicates, and feel sure that a similar warm reception will be extended to this second edition as was given to the first. Minor ailments are just those conditions which the young practitioner is first called upon to treat. When his patients are taken ill in the hospitals has given him little or no help in knowing what treatment to employ. It is a mortifying position to find oneself in, yet we fancy it is not uncommon. It is no easy matter to supply this want efficiently, but our author appears to have succeeded admirably. Trivial symptoms often indicate serious disease, and one must guard against the danger of mistaking the beginning of a serious illness for a minor ailment. If, however, we use the book for the function it must treat of minor ailments, and not become a complete system of medicine. Dr. Wynter appears to have admirably avoided the pitfalls that beset his path and to have given us a book which is fully as practicable and useful.

The appendix of "Formulae" at the end will be found of great use by many.

(a) "Treatise of Diseases of the Skin." By Henry W. Stewlawn, M.D., Professor of Dermatology, Jefferson Medical College, etc. Philadelphia: J. B. Lippincott Co. 1914. 8vo. pp. xvii. and 516. Price 1.50.


LITERARY NOTES.

MESSRS. BAILLIRE, TIMDALE AND COX announce the following new books and new editions—

"Intensive Treatment of Syphilis and Locomotor Ataxia by Aachen Methods." (Price 3s. 6d.) In this look the author, Dr. Reginald H. Hayes, maintains that inunction methods are still the best in many forms of syphilitic infection.

Dr. Langdon Brown's "Physiological Principles in Treatment" (price 3s.), has rapidly reached a third edition. From the first this has been a successful book and in the revised edition much new material has been added, dealing with the latest methods of treatment.

The eighth edition of the late Dr. Murrell's "Aids to Forensic Medicine" (price 2s. 6d.), makes its appearance after revision by Dr. W. G. Atchison Robertson, of Edinburgh. Additions to meet present day requirements have been made and some of the material has been rearranged with the object of rendering the various sections more consecutive than they were. "Insanity in Everyday Practice," by Dr. E. G. Younger, third edition (price 3s. 6d.), is another little book which has met with ready acceptance. The previous edition has even been translated into Chinese, and is being translated into Spanish. A thorough revision has been made throughout, and the section on General Paralysis has been entirely rewritten.

MEDICAL NEWS & PASS LISTS.

Memorial to the Late Dr. Wilson.

A statue in honour of Dr. Edward Adrian Wilson, one of Captain Scott's companions at the South Pole, was last week unveiled in the Cheltenham Promenade by Sir Clements Markham. Dr. Wilson was educated at Cheltenham College. The statue, in bronze, which is the work of Lady Scott, and rests on a pedestal of Portland stone, depicts Dr. Wilson in Antarctic sleighing kit. The pedestal bears the following inscription:—He died as he lived, a brave and a true man, the best of comrades and staunchest of friends.

Damages Claimed against a Dentist.

In Bloomsbury County Court, last week, a claim for damages for disfigurement of her face was brought against Dr. MC. Peyton Balny, of Harley Street, Dental Surgeon at the Great Northern Hospital, Holloway Road, by Ethel Brown, a domestic servant, of Lordship Park.

The girl said that on recovering from the gas, after having four teeth extracted at the Hospital, she felt "pins and needles" in her neck. She was about to put her hand to her face when the defendant stopped her, and said, "Good gracious, I have burned this woman." He admitted that some corrosive acid had been used, and the girl now had a disfigurement which plaintiff's counsel, Mr. R. L. Willis, stated would be permanent.

Dr. Baly said that the girl was in a state of collapse, and while watching her he put his hand up to a bottle-cupboard for the smelling salts. After applying the bottle to the girl he found there was some fluid in it. He afterwards found it was the wrong bottle and used in the skin department—should not to have been in this cupboard. The bottle was the same size and colour as the smelling salts.

Medical evidence was given that with proper treatment the scar would probably be considerably improved.

Judge Bray said that in his opinion the doctor was negligent in not looking at the bottle. He gave judgment for the plaintiff, and postponed for three months the assessment of damages so as to ascertain the effect of further treatment.

A Faith-Healer Censured.

The adjourned request on the habeas of Miss Kate Addison Scott, aged 17, was concluded last week at Henchman by Mr. Reginald Kemp. Miss Scott died after staying four days at the Miller Institute, Islington, off Mr. Orlando Miller, who described himself as a lecturer and teacher on Biblical and religious subjects, and a healer and student of psychotherapy. He said he had no medical qualifications, but had studied medicine in America. He healed by mental, chemical and mechanical means, and sought prayer as well. He had no medical man at his home. Miss Scott attended his lectures, and having suffered for 14 years from paralysis, she asked him to help her to get well. He agreed, and she paid him 5s. a week, to which fee was added 15s. in her diet for 36 hours, give her doses of salts and injections of cascara, alcohol, and scopolamine. She vomited considerably, and died before her own private medical man could reach her.

Dr. R. Wilson, of Gordon Square, said he had attended Miss Scott for some time for dyspepsia. Her condition was such that scopolamine would be a dangerous drug to use. He considered that a medical man should have been called in earlier, and then her life would probably have been saved.

Dr. Christian, who made a post-mortem examination, said that he found on the legs marks of the use of the needle of a syringe. Scopolamine would increase the distention of the stomach. In answer to the jury the witness said that scopolamine might assist in causing death by acting on the heart.

Dr. W. H. Willcox, analyst to the Home Office, said he made a careful test for poison in the stomach, and found no, trace of a hallucinoid. It would have the same action as scopolamine or hyoscine, but he could not say if it was either.

The Coroner: What conclusion can you come to? The medical man could not say that it was a case in which scopolamine caused or accelerated death. There was not a poisonous dose in the body. The treatment was most unsuitable. The jury returned a verdict of "Death from natural causes," and asked the Coroner to censure Mr. Miller, and, with regard to the nurse, the expression that her conduct be reported to the hospital which granted her diploma.

The Coroner said he quite agreed with the rider. Addressing Mr. Miller, he said:—"You are deserving of the graver censure for treating this woman in a very improper way. Fortunately the medical evidence is in your favour, or you might have found yourself in difficulties. It was clearly your duty to send for a medical man, and not do what he did on his own opinion, rather than you did. The only extraordinary part of this case is the evidence which affords the easy way in which the public are taken in by these quasi-religious faith healers.

The Royal College of Surgeons of England.

At a quarterly meeting of the Council of the Royal College of Surgeons of England, held last week, Sir W. Watson Cheyne, Bart., C.B., was elected President, and Sir Frederic Eve and Sir Anthony Bowley Vice-Presidents of the College.

Miss Refna Mallett, Royal Free Hospital, and Mr. J. R. M. Collie, University College Hospital, were admitted members of the College. The following Hunterian Professors: Professor Arthur Keith, Messrs. Rupert Farrant, W. Sampson Handley, J. Howell Evans, Frederick C. Pyms (Newcastle-on-Tyne), and Harry Bowley. Battersea: Messrs. F. W. J. Odes and David Waterston. Erasmus Wilson Lecturer: Mr. S. G. Shattock. Artomt Demonstrator: Professor Keith. Odontological Demonstrator: Mr. J. F. Coyle.

University of Oxford.

In a Congregation held on July 11th, the following degrees were conferred:


Belfal University.

The following degrees were conferred on the 6th July:

M.D. Degree (by Thesis).—David Finnegan, Philip
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J. Gaffin, David Mc' Cay (gold medal), Samuel Mc'Clure, William S. J. Shaw, John M. G. Williams. M.D. Degree (by Examination).—Bruce Alexander West.

M.Ch. Degree (by Thesis).—Frederick Crooks. M.Ch. Degree (by Examination).—Thomas S. S. Holmes (gold medal).


Examination Result: Faculty of Medicine:—


Practical Chemistry.—Margaret M. Merrick, W. J. Lytle, F. C. S. Bradbury, Amy C. McCallum, K. Marsh, Elizabeth E. Young, R. W. Hanna.


Senior Anatomy.—J. Lascelles, Annie E. Beattie, C. J. A. Woodside.

Practical Anatomy (Senior).—W. Napier, F. Ewart, C. J. A. Woodside, Annie E. Beattie, J. C. Longridge.


Practical Physiology (Seniors).—A. J. Miller (special prize).

Practical Anatomy (Junior).—G. D. F. McFadden, T. G. Campbell, Amy C. McCallum, T. Montgomery, A. E. Keown.

Materia Medica.—Grace English, J. C. Millan, F. H. Waterfield, Margaret Purse, A. C. Dickey.


Organic Chemistry (Practical).—Kenneth D. Mullen.

Histology.—Dorothy I. Dobbin, R. G. Meyer.


Ophthalmology.—R. L. Rea, G. B. S. Calvert, Mary A. Gallagher.

Pathology.—Elizabeth C. Kirker, William Blyars.

Grace M. English.

Hygiene.—Grace M. English, D. Mitchell, W. Blyars.

Faculties of Science and Medicine:—


Chemistry.—First year, F. W. J. Mc'Clure, William S. B. Hay.

Mathematical Physics.—Third year, Janet S. Nicholls; second year, J. P. Martin; first year, James Martin.


Faculty of Medicine Examination.—

Frederick C. S. Bradbury, Frederick Campbell, William Hoey, Albert Y. Morrison.


Third Medical Examination.—Recommended for Scholarships.—Margaret Sloan Purce, Frederick Hamilton Whyte, William Bryars, (Third Scholarship), James Clark, C. M. Millan (Fourth Scholarship).

Final Medical Examination.—R. M. Beath, £30; G. R. B. Purce, £30; W. S. B. Hay, £30; Sinclair Miller, £20.

Magdazh Scholarship.—Sinclair Miller.

Gold Medals.—M. Ch., T. S. S. Holmes, M. D., David Mc' Cay.

University of Aberdeen.

At the annual graduation ceremony last week, the following Degrees in Medicine and Surgery, and the Diploma in Public Health were granted:

Degree of Doctor of Medicine (M.D.).—Alexander G. Anderson, M.A., M.B., Ch.B., Aberdeen***; William J. Reid, M.A., B.B., F.R.C.S., Royal Faculty, Manchester***; James R. Murray, M.B., Ch.B., 437 Great Western Road, Aberdeen***; Alexander Wilson, M.B., Ch.B.; Douglas Craig, M.B., Ch.B.; William B. Keith, M.B.; Andrew R. Sinclair, M.B., B.Ch., 21 Great King's Road; Francis W. Stuart, Ch.B., Ch.M.


Degrees of Bachelor of Medicine (M.B.) and Bachelor of Surgery (Ch.B.), with Second Class Honours.—Neil Cantlie, "George R. Lipp.


The Straths Settlements Gold Medal (for best Thesis for M.D., on a subject dealing with Tropical Medicine submitted 1012, 1013 or 1014) was awarded to Alexander Frank Wallace, M.D. (1913).

The John Murray Medal and Scholarship awarded to the most Distinguished Graduate (M.B. of 1914) was awarded to Alexander Eluslie Campbell, M.A., M.B., Ch.B., Inverness.

NOTICES TO CORRESPONDENTS, &c.

CORRESPONDENTS requiring a reply in this column are particularly requested to make use of the "Ice Letter" or "Old Subscriber," to avoid the practice of signing themselves "Reader," "Subscriber," "Old Subscriber," etc. Much confusion will be spared by attention to this rule.

SUBSCRIPTIONS.

Subscriptions may commence at any date, but the two volumes each year begin on January 1st and July 1st respectively. To avoid the practice of signing themselves "Reader," "Subscriber," "Old Subscriber," etc. Much confusion will be spared by attention to this rule.
Dawson and Sons are our special agents for Canada. For South African and Colonial Mun- mings, Geo. Robertson and Co., of Sydney and Melbourne, are our special agents for Australia.

ADVERTISEMENTS.

For One Insertion—Whole Page, £1; Half Page, 82s. 6d.; Quarter Page, £1 5s.; One-eighth, 12s. 6d. The following insertions are at Half Price—Whole Page, 12 insertions at £1 10s.; 25 at £3; 32 insertions at £1, and progressive rates for smaller spaces.

Small announcements of Practice, Assurances, Vacancies, Books, etc.—Seven lines or under (70 words), 4s. 6d. per line, or less.

Contributions are freely invited to send their communications, if resident in England or the Colonies, to the Editor, The London Mail, A. Hurrietta Street, Strand; if resident in Ireland to the Dublin office, in order to save time in retarding from office to office. When sending sub- scriptions for the Journal, or articles to us for publication, it need not be authenticated with the name and address of the writer, not necessary for publication, but as evidence of identity.

Retains—Reprints of articles appearing in this Journal can be had at a reduced rate, providing authors give notice to the publisher or printer before the type has been distributed. This should be done when returning proofs.

Dr. J. A. (Battersea) is thanked for his note; the delay will cause no inconvenience.

A MISPRINT.

A CORRESPONDENT has called attention to a misprint on page 30 of our last issue in the paragraph headed "Germ Carriers." The paragraph in question reads: "The germ of diphtheria is found on the faces of persons with the disease; the germ of the correspondent points out that the word "faces" should obviously have been written "face," and added: "The germ of the disease is a small, split-ended, purplish object, and is not authenticated with the name and address of the writer, not necessary for publication, but as evidence of identity."

The printer's error indicated in this instance presents a more than usually complicated tangle.

H. A. FELLOWS (Liverpool)—The drug referred to has no special characteristic feature over similar preparations. It is merely a cut way of advertising it in the newspapers as if it were an Editorial pronouncement.

Dr. J. B. MEYRIN (London) informs us that the title of his paper to be read at the forthcoming Congress of Nephrologists of the British Medical Association is "Urethral Transplantation: Its Limitations and Techniques," not "Archlrologists' readings," as given in a recent issue of this journal.

MEDICAL MEN AND LIGHT CARS.

A large number of medical men are under the impression that only a large and high-powered motor-car is any practical good for their daily rounds. In a special "Doctors' Issue" of the Light Car actual experiences are given of many medical practitioners of the working of small and light cars, from a period of which it will be seen that it is by no means necessary to invest in a 30 h.p. limousine in order to enjoy to the full the pleasures and profits of motoring. We can recommend this special Light Car issue to everyone.

Dr. W. S. T. (London, S.W.)—Such notices in the Iris Press, which are becoming increasingly common, are so to be deprecated, but it is hard to shake the address of the medical men is not given. The attention of the Ethical Committee of the British Medical Journal is well called for, for it is not easy to see the authoritative writing on the points on the subject to be urgently called for. P. R. (Hastings)—We do not think there is sufficient evidence in the case of the man referred to to warrant a charge of culpable negligence. So long as a medical man can show that he has honestly done the best for his patient he can hardly be convicted of culpable negligence.

Vacancies.

Holme Dispensary, Dale Street, Stockport Road, Manchester.—House Surgeon. Salary £120 per annum, with apartments, attendance, coal, and gas. Applications to Honorary Medical Secretary, Holme Dispensary.

Royal Albert Hospital, Devonport.—House Surgeon. Salary £15 per year. Applications to Honorary Medical Secretary, Royal Albert Hospital, Devonport.

Kee Hospital, Asylum, Midstow.—Fourth Assistant Medical Officer, Salary £250 per annum, with furnished quarters, laundry, attendance, coal, gas, and washing. Applications to the Medical Superintendent, Asylum, Midstow.

West Middlesex General Hospital, Harrow.—Resident Medical Officer, Salary £120 per annum, with board, lodging, and his wife at the Hospital. Applications to the Chairman of the Selection Committee, Royal Albert Hospital, Devonport.

City Fever Hospital, Little Bournmouth, Branshfield.—Male Assistant Medical Officer, Salary £250 per annum, with board, lodging, and his wife at the Hospital. Applications to Honorary Medical Superintendent, Bournemouth.

Birmingham General Dispensary.—Resident Medical Officer, Salary £250 per annum, with furnished apartments, free heat, and attendance. Applications to Ernest W. Forrest, 40 West Street, West Hartlepool.

Hospital, Crompton.—House Surgeon, Salary £200 per annum, with board and rooms. Applications to J. C. Tiley, Secretary.

Lancashire and Cheshire Dispensary, Burslem.—Assistant Medical Officer, Salary £125 per annum, with board, lodging, and his wife at the Dispensary. Applications to the Medical Superintendent, Burslem.

HULME DISPENSARY, Dale Street, Stretford Road, Manchester.

WANTED a HOUSE SURGEON duly registered and fully qualified, Salary £150 per annum. Annual increase £10 to £200. Applications to J. C. Tiley, Secretary.

WANTED a HOUSE SURGEON duly registered and fully qualified, Salary £150 per annum, with board, resident, and laundry. Applications to Mr. Jones, Secretary, St. Vincent's Hospital, near Pimlico, London, S.W.

CERTIFYING FACTORY SURGEONS.—The Chief Inspector of Factories announces the vacancies for the following Certifying Factory Surgeons:—Malton (York), Romans (Chester), Shrewsbury (Derby).

Appointments.

BLOUNDON, A. J., M.D., F.P.C.P., Lond., Physician to Guy's Hospital.

DOWELL, J. C., M.D., F.R.C.S., L.R.C.P., Lond., Surgeon in Charge of the Orthopaedic Department, University Hospital, Birmingham.

HORLIV, J. E., M.D., F.R.C.S.Eng., L.R.C.P., Lond., Medical Officer to the Royal Hospital for Children, Nottingham.

JOHNS, W., M.D., F.R.C.S., L.R.C.P., Lond., Honorary Surgeon to the Blackburn and East Lancashire Royal Infirmary.


SANDERSON, J. B., M.D., F.R.C.S., Physician to the Homestead General and North-West London Hospital.

Kinnear.—On July 7th, at Battersea, in his 50th year, Captain John Kinnear, R.A., only son of Mr. and Mrs. Kinnear, of Battersea, and of St. Mary's, Battersea, of which church he was a communicant, and of which he was a member of the vestry.

Williams.—On July 7th, at 102,nedwood Road, Clapham, the wife of Cyril Williams, M.D., L.R.C.P., of a daughter.

Marriages.

Bramhall.—Free.—On July 11th, at St. Stephen's, Altrincham, John Lapwood, of St. Stephen's, Altrincham, Surgeon, and a daughter of the late Captain Bramhall, to Betty Marjory, daughter of Colonel and Mrs. Free, of 44 Queen's Gate, Terrace, S.W. De Burscough.—On July 8th, at Askwith, near Halifax, Yorkshire, Harold John De Burscough, M.R.C.S., L.R.C.P., to Edith, youngest daughter of J. B. E. Bos, Esq., of Burscough.

Hicks.—James, 5, New Street, Holy Trinity, South Hampstead, John Athelstan Braxton Hicks, M.D., M.R.C.S., only son of the late A. Braxton Hicks, Barrister-at-Law, H. M. Court, and of Mrs. A. Braxton Hicks, of 32, Perth Road, W., to Alice Editha, daughter of the late William Lamplugh, Esq., of Esher, and of Mrs. Hall, of Westcliff-on-Sea.

Mellane.—Twelve.—On July 7th, at Frobgs Presbyterian Church, Edward Mellane, Esquire, late of the Bank, to Mary Mlassian, to-day Tweddy.

Waterston.—On July 4th, at 10 Clarendon Crescent, Edinburgh, Robert Wilson Waterston, B.A., M.B., Ch.B., of 28, Eakinde Road, Sheffield, only son of Mr. and Mrs. Waterston, at the request of the Rev. Mr. Waterston, to Dorothy, daughter of Mr. and Mrs. George Waterston, 10 Clarendon Crescent.


Longstaff.—On July 7th, at Crowthorne, Bucks, Roger Wright, M.B., B.S., son of the late William Wright, of Clifton, to Margaret, daughter of Thomas Lee, of Meanwood, Linx.

Deaths.

Bell.—On July 11th, at Upham, Thomas Bell, M.R.C.S., L.R.C.P., J.P. for the County of Rutland, aged 77.

Mackenson.—On July 11th, at his residence, 14 Grassington Road, Hampstead, Charles Mackenson, Surgeon A.M.D.


Thompson.—On July 4th, at 99, Lindsey Mansions, N.W., Margaret Eleanor, the beloved wife of J. W. Wugh, M.D., late of Brighton.

HULME DISPENSARY, Dale Street, Stretford Road, Manchester.
**NOTES AND COMMENTS.**

**Suggested Hospital Equerry for the King.** The kindly interest taken by the King and Queen in the hospitals of the United Kingdom is a matter of general satisfaction. The fact that their Majesties visit a great many institutions of the kind has been followed by the grotesque suggestion that an extra equerry should be added to their staff for the purpose of conveying information upon all special and collateral details of interest. If this suggestion is to be seriously considered, it will be well at the same time to discuss the rival claims of a hundred and one other organisations. If the medical charities are to have their special official mouthpiece and interpreter why should not a similar honour be bestowed upon the Royal Academy, the medical schools, the golf clubs, the Sunday League, the Horse Show and other amusements, the Ascot and other races, the cricketers, the tennis players and a great many other social activities. One fatal objection is that an enormous power of praise or blame would be placed in the hands of the equerry—who, however able, could hardly hope to probe the inner truths of the innumerable charities of the United Kingdom. But perhaps it is not proposed that any but the favoured few hospitals should ever be brought to Royal notice—according to the precedent of the Metropolitan Sunday and King Edward Funds. Were ever so fantastic a Jack-in-office brought into being, he would straightway become an engrossing centre of attraction to the scores of thousands of persons whose interests are more or less vitally connected with this or that particular medical charity.

It is notorious that the clique which practically controls the policy of the Metropolitan Hospital and King Edward Funds deliberately excludes the bulk of the special hospitals from participating in the money subscribed by a generous public for the benefit of the medical charities. It is hardly surprising, therefore, to find the suggestion of a special hospital inquiry coming from a quarter that has always sustained the unjust withholding of grants from the small and the special hospital. It has always been a matter of surprise that the King, who has the courage of his opinions in such matters, should lend the sanction of his name to a system which penalises and starves the small medical charities of London. Why should not the small hospitals have adequate representation on the King Edward’s Fund? Why should they not have a representative of recognised ability and fairness upon the Distribution Committee of the King Edward’s Fund? Is there any adequate reason why a matter of public importance, affecting so closely the well-being of the public and the progress of medical education, should not be the subject of a formal inquiry by the King’s Fund?

**Forcible Feeding Protests.**

A deputation of medical men last week waited upon the Home Secretary to present their views upon forcible feeding of prisoners. As they insisted that Press reporters should be present at the interview, and Mr. McKenna refused to admit them, the matter fell through. Every step of punitive administration throws the onus of application upon someone or other. Unless someone is willing to undertake unpleasant duties of the kind, the whole system of criminal law administration must be abandoned. Perhaps that is what the deputation had in mind. If the Suffragettes are permitted to starve themselves to death in prison, why should not all prisoners of all sorts be allowed to make a bid for liberty on similar terms? Not one of the deputation have suggested an alternative to forcible feeding that fits in with the imprisonment which society has so far found necessary for the preservation of sound law and order.

**Why call it “torture”?** Sir Victor Horsley says it is not medical treatment to preserve life and health. **“Torture”?** If there be not some quibble in that assertion, we fail to see how life is not preserved by forcible feeding of women, who otherwise would starve to death by abstention from food. This sort of loose statement simply confuses the issue. In another sentence Sir Victor says: “It is clear that the statement made from time to time, chiefly by anonymous medical men, that prison forcible feeding is the same as that of hospitals and asylums is untrue.” In what respect does it differ? Similar food, similar apparatus, similar procedures by medical officers and attendants are surely followed in both cases, whether the patients are assenting or refractory! If asylum patients refuse food they are fed perforce, in order to keep them alive. If prisoners refuse to the endangering of their lives, a death at once awaits them. Is the governor of the prison to do with sullen criminals of this kind? Is he to let them die? Is the State to acquiesce in their suicide? Members of the deputation must again be asked to suggest an alterna-
Are all prisoners who refrain from food to be released? Is suicide to be explicitly sanctioned by the State, as it is in certain Eastern countries? Instead of pelting the officers of justice, lay and medical, with volleys of opprobrious epithets, would it not be well for these gentlemen to discuss calmly and philosophically all sides of the tangled social problem that has been raised by a band of women whose bravery one admires while one cannot help lamenting their folly? The suggestion of granting a request demanded under such threats is absolutely repugnant to the instincts of our countrymen. Full female enfranchisement must follow sooner or later, but the question of the forcible feeding of prisoners will not be solved by its attainment. Let the deputation try again.

A National Council and Venerable Disease. Public opinion with regard to the need for instituting an organised campaign against venereal diseases appears to be growing apace. As a direct outcome of the resolutions of the International Congress of Medicine held in London last year, was the appointment of the present Royal Commission. This body has already held a great number of sittings, and the expert evidence given thereat has been published from time to time in abstract in our columns. We learn that it has now been decided to form a National Council for Combating Venereal Diseases as the result of a number of private conferences presided over by Sir Thomas Barlow, K.C.V.O., and which may be regarded as the outcome of the efforts spread over two years by a committee appointed by the Royal Society of Medicine and the Eugenics Education Society. It is understood that the medical profession and of the general public will compose the personnel of the new Council, and that the names of those so serving will be announced later. The suggestion that popular education is probably the most effective method for combating the rates of venereal disease will be received with favour in many quarters, though it must be admitted that the particular mode of imparting instruction will require very careful deliberation. Further details respecting the composition and aims of the new Council will be awaited with much interest by the medical profession.

The Scientific Scavenger. One of the obvious needs of present-day sanitation is the need for more scientific scavenging. The highest achievements in that direction consist in the limited use of dust-tight ash-bins, of covered dust-carts, and of flushing down the streets of certain towns at night. The ordinary practice of brushing the roadway on a dry day sends up clouds of bacteria-laden dust which enters our houses and poisons our food. Why should not the road be sprinkled with some antiseptic fluid, or even with plain water, before the brush is applied? The sagacious housewife has long ago recognised the virtues of spent tea-leaves or damp sawdust in preventing the cloud of dust that would otherwise register the activities of her busy broom. So far as the scavenging of districts is concerned, the chief rock ahead lies in the parsimony of our public health authorities, whose main object is to keep down expenses. Otherwise it would not require a Michael Faraday or a Huxley amongst medical officers of health to devise a sound and practical scheme for scavenging in all its branches upon a scientific basis. Will sanitary authorities kindly note that from an economic point of view money expended in antisepic and generally improved refuse removal would be

saved many times over in diminished sickness, especially as venereal sick persons have to be maintained at the direct expense of the public. The application of the vacuum principle, now employed so successfully upon the domestic scale, might, perhaps, be found practicable in removing dust and refuse in a dry state from our public highways.

We are glad to learn that the appeal

Sir Jonathan Hutchinson's

Museum. (page 56), has been so far successful that among the subscriptions which it has called forth there has been one of £500 from a well-wisher who does not wish his name to appear, and who expresses the hope that his example may be promptly followed by other sympathisers. We remarked in our note of the 15th inst. that "there must be many medical men who would willingly contribute to the preservation and permanent endowment of the Museum out of personal admiration and gratitude to its founder." It appears, however, that the contributions from medical men have been very few. It is surely not too much to hope that some of Sir Jonathan's contemporaries and disciples may yet come forward to aid in the preservation of the Museum which he created, and which would be so fitting a memorial of his genius and philanthropy.

LEADING ARTICLES.

DISABLEMENT BENEFIT UNDER THE INSURANCE ACT.

On the 20th of the present month the last great branch of the National Insurance Act came into operation. It forms an important pillar—if not the corner-stone—in Mr. Lloyd George's essay in public health legislation. Before Monday last the insured worker was entitled to free medical attendance, drugs, and medical appliances; to ten shillings a week for twenty-six weeks when ill; to sanatorium benefit when judged advisable, and to maternity benefit. Henceforth five shillings a week can be claimed up to the age of seventy in the event of permanent incapacity. Those who are fond of quoting the practice of Germany in national insurance will doubtless remark that there the worker becomes entitled to the permanent pension provided he is unable to earn more than one-third of the usual wages. At first sight the German qualification appears far more advantageous to the insured than our own. As a matter of fact, however, the five shillings, when granted to the British pensioner, is not affected by any future income that may accrue, and it is expressly provided that it must not be taken into account by the guardians if an application be made by the recipient for Poor Law relief. The German basis, anyway, was not found to be actuarially possible in the case of the population of the United Kingdom. The latter this week became entitled to disability benefit, temporary and permanent, provided they have paid 104 contributions, corresponding with the number of weeks that the Act has been in operation. There appears to be some amount of confusion in the popular mind as to the scope of disablement relief. For ordinary sickness
benefit the insured sick or disabled person is entitled to ten shillings a week for a period of twenty-six weeks, and at the end of that time, if still incapacitated, that person, provided 104 contributions have been made, receives five shillings a week so long as disablement continues up to the age of seventy, when the old-age pension supervenes. The aggregate indirect bearing of this State provision for the sick poor of the United Kingdom is clearly of great value. It is useless to give medical advice and physic to persons who are physically and mentally handicapped by lack of the ordinary means of subsistence. Good environment is obviously essential to the attainment of a reasonable standard of national health, but the lapse of time alone can demonstrate the success of legislative measures for its attainment. To take a single instance of the value of disablement benefit, let us turn to the case of the domestic servant. There has been no greater outcry against the Act than that by the critics who asserted that good employers provided for their sick servants. Apart from the fact that all masters and mistresses do not satisfy the qualification of goodness, it may be safely assumed that few of them would be willing or able to pension off permanently disabled servants for life. Now that the Act is come fully into operation, it is to be hoped that Mr. Lloyd George will give his serious attention to the hardships inflicted upon certain classes of the medical profession. There can be little question that a large amount of the medical benefit that should be paid for under the Act is obtained free from the special hospitals, whose practice and whose incomes have nevertheless been depleted by the operations of the Insurance Act. The specialist class of the United Kingdom have for many years worked conscientiously and advanced medical science to an extent that is in inverse proportion to their material prosperity. Here is the opportunity of the Chancellor of the Exchequer, who will further the interests of the insured by providing them with special skill that is not available under the panel system. At the same time, by subsidising the special hospitals of the United Kingdom and granting paid official appointments to all legitimate specialists, he will at one stroke take a long step towards the endowment of medical science, the lack of which is a standing reproach to a nation which prides itself upon its commonsense and businesslike methods.

RECURRENT ENTERITIS IN A LONDON POOR-LAW INFIRMARY.

The news that five cases of enteritis have occurred amongst the children at the Southwark Infirmary calls attention to a state of matters that is nothing short of a scandal. Some of our readers will doubtless recall the fact that on a previous fatal outbreak of a similar nature it was found that a number of railway trucks containing refuse from the neighbouring district of Camberwell were habitually shunted and left standing for a long time not far from the infirmary. The inevitable conclusion was that the enteritis was connected with infection conveyed by flies from the trucks to the infirmary. On representation being made to the Camberwell Borough Council that body scouted the suggestion, and actually produced a medical officer’s report to the effect that he had inspected the siding and had seen no dust blowing from the refuse. As well might one expect to see the bacteria of small-pox or of diphtheria being blown about the street. The fact that it would tax the resources of a skilled microscopist armed with a powerful microscope to demonstrate on the body of a fly even the common identifiable pathogenic bacteria formed no part of the report. It was good enough for Camberwell as it stood to use against the innuendoes of Southwark. Later the Local Government Board intervened, and by means of inspectors and correspondence endeavoured to reduce Camberwell to reason. The Local Government Board, however, has failed in its object, for the Camberwell rubbish is still lodged near the Southwark Infirmary, in which enteritis is a recurrent malady. This state of affairs constitutes a grim satire upon our vaunted sanitary administration. The governing body of a crowded London district is unable to protect its Poor-law Infirmary from a dangerous nuisance inflicted by the selfish recklessness of a neighbouring Council. The Local Government Board, the central authority appealed to for protection, has been simply ignored by the offending authority. As Southwark cannot secure Government protection it may be well for them to try what redress may be obtainable through the law courts, although naturally its Council would be unwilling to saddle its ratepayers with the burden of costly litigation until other means of abating so gross a public danger had been exhausted.
autopsy showed that the hydronephrotic sac had ruptured, and that the contents had escaped through the foramen of Winslow. Such cases illustrate the danger of pumping fluid into a diseased kidney when we have no means of knowing either the amount of pressure the tissues will stand. Some of our alleged scientific methods are really contemptible in their rule of thumb regulation, and the sooner they are given up the better. When we have made an accurate diagnosis and know exactly what we have to deal with, a calculated exposure of risk may be justified; but to use dangerous means, whose only raison d'être is our ignorance, is a thing we had better leave strictly alone.

A New Treatment of Pemphigus.
The treatment of chronic pemphigus still constitutes a clinical problem for which a satisfactory solution yet remains to be found. The bacteriology of this affection is still uncertain, for several different organisms have been found, mostly of a coecal nature. Hence the preparation of a vaccine has not been attended with much success. A new method of treatment, recorded in the Dermatologische Wochenschrift, has been outlined by Drs. T. Holobut and J. T. Lenartowicz, of Lemberg, which consists of the spontaneous injection of the contents of the bullae themselves, duly sterilised by heating to 80° C. for half an hour in a water bath. After this period plate cultures are taken, and if no colonies of coecal organisms are found the serous fluid is stored in sterilised flasks, with the addition of 0.5 per cent. of carbolic acid, when it is ready for use as a sort of vaccine. The authors account of two patients, boys of eight and twelve respectively, who had been treated for chronic pemphigus for long periods by various remedies without success. Injections of 1 c.c. of the contents of their own bullae were made once or twice a week, the younger patient receiving six, and the older one twelve injections hypodermically. In both cases the results were excellent, no further outbreak of blisters being observed, while the general health was benefited at the same time. Cases of pemphigus have been recorded which have been benefited by auto-sero-therapy, but the method described above appears to be so simple that it is worthy of trial by dermatologists and practitioners generally.

The Abuse of Accuracy.
Sensationalism governs science no less than anything else. True we have many good men who work in secret, and whose virtue is its own reward. They are appreciated by the few and their work remains caviare to the general. But the man who wants to achieve results—who wants at least to have the credit he deserves—has to exaggerate. Our omnipotent transport union, our only means of communication with the mass of our fellow men, is the Press, and the Press takes no notice of anything beyond incidents, unless it is hit on the head by a metaphorical meteoro-missile of publication. The only hope for publicity. If we want the world to know that we have discovered that two and two make four, we have to announce with two-column headlines and leaded "English" that they make five—or, better still, seventeen. Then we attract attention, and the subtraction of four leaves us left with a residue of too many—perhaps in dignity, but, at any rate, soon. The announcement that the Sanitary Institute Congress has met at Blackpool does not suggest romance. But one of the speakers has stirred the consciousness of Fleet Street. He has banned earthenware and china cups and saucers and glass tumblers and even pewter pots. Towels and napkins of gleaming napery are anathema to him. Paper is the only ware. Cade's condemnation "thou hast built a paper-mill" stands no more. We are to have cups and towels that can be used. Mouse and waistcoat must not be infected. They are perfect theoretically; practically they are hopeless. The fantastic frailty of paper pots and the flabby disintegration of tissue towels will never catch on. They are too uncomfortable, and that is the man in the street who may stand; and the specialist means lost perspective. If we want to persuade the people we must see with the people's eye. They see nothing but fantastic faddism in such proposals, and in these days of democratic divinity we dare not say that the people are wrong.

Manners.
We have all seen small books that tell us the technique of good behaviour. If we have an appreciation for unconscious humour we can extract a good deal of amusement from them. To read them for the humorous passages, the extreme of esoteric enjoyment, probably due to a feeling of supreme superiority that it should be possible for people to be told not to do such un-dreamable things as those which "Lady Camilla" warns us against. Yet etiquette is as old as humanity itself. Since the time of the Pharaohs it seems that a man has to leave the sphere of life that he was born in there must have been new ways for him to learn. Manners may not make man, but man assuredly makes manners. Behaviour ebbs and flows like a tide. The jokes of one generation are the obscenities of the next, and ultra-refinement sends its successors back to a fashionable rudeness. The Canadian Journal of Medicine and Surgery for this month prints some extracts from an eighteen century work on table manners that are not a little enlightening. A certain amount of fortitude tempered with discretion was apparently necessary. "If, unfortunately, you should burn yourself when taking soup, you must bear it patiently and show it: but if, as occasionally happens, the pain is unbearable, you should, before the company perceive what you are about to do, take your plate in one hand, lift it to your mouth, and then, while covering yourself with the other hand, replace what is in your mouth on the plate, and hand it quickly to the lackey behind your chair. Civility demands that you should act politely; but you are not required to commit suicide." Nothing could be better put, and the wisdom is obvious. Again, "After a meal do not pick your teeth with the knife or fork; do not rinse your mouth with water. To see a gentleman expectorating water might give some delicate people a touch of the qualms." We never knew before what "the qualms" were, but we quite understand anyone's feelings on observing such a lapse as our author mentions. We may exclaim with Stace, "O temporal! O mores! O cui bono, cui?"

Sanitary Authorities and Epidemic Diarrhoea.
A circular letter has recently been addressed to local sanitary authorities by the Local Government Board calling attention to the importance of taking all practical measures for the prevention of epidemic diarrhoea and other infectious diseases of infants, and of promoting hygienic conditions in the feeding of infants. The Board desires to emphasise the value of sanitary visits of the homes of children under the direction of the Medical Officer of Health with a view to the removal of conditions in and about their dwellings which facilitate the spread of infectious and other
diseases. It is pointed out that the records of notification of births during the previous months will enable several visits to be made to the homes where they are most likely to be useful, especially in the case of infants from three to twelve months old. The assistance of voluntary visitors might be enlisted in this work, so that co-ordination with any existing institution for the welfare of infants in the district might be secured. The importance of domestic cleanliness is rightly insisted upon, particularly in regard to the preparation and storage of food. At the same time, insanitary conditions outside the house, especially any accumulation of refuse in the neighbourhood of dwellings, should receive prompt attention. The Health and Council. Fresh clothes and bedsheets with flushing cisterns should be substituted for existing closets on the conservancy system, and provided in all new buildings. The distribution of suitable leaflets dealing with domestic cleanliness and the destruction of refuse and flies is a valuable adjunct to house-to-house visitation, while simple instruction on these matters should never be omitted in baby clinics, schools for mothers, infant consultations, and similar agencies.

The Prevention of Hydatid Disease.

In countries where hydatid infection is widespread, the question of prophylaxis becomes one of great importance, especially when sheep-raising is one of the chief industries concerned. A strong movement was put forward at the last Intercolonial Medical Congress of Australasia, held at Auckland, by Professor L. E. Barnett, F.R.C.S. (a), for a more vigorous attack against hydatid disease in New Zealand, for although the Government, through their Departments of Public Health and Agriculture, have done something to combat the evil, much yet remains to be accomplished. So far, it appears that the public in New Zealand have been enlightened as to the nature and prevention of hydatid disease entirely through the individual efforts of medical practitioners. Professor Barnett has been most energetic in his attempts to enlist the interest of the public and also of health authorities in the subject, and he has outlined a scheme of prophylaxis commencing with a brief account of the life history of the Echinococcus and ending with four precise "do's", with regard to the feeding of dogs on raw offal, the drinking of uncleared or unfiltered water that has been exposed to contamination by dogs, the eating of watercress, celery, lettuce, or other uncooked vegetables, unless special care be taken to ensure their cleanliness, and the allowing of dogs to lick hands, faces, plates or dishes. Furthermore, it is suggested that authorities should adopt means to prevent the feeding of dogs on raw offal, to kill off useless dogs, and to provide the owner of every registered dog with printed information respecting hydatid disease as well as for its cure. Additional publicity for these facts might also be furnished through the agency of posters and through the medium of the weekly newspapers. Considering the ravages of echinococcal disease when once it has obtained a foothold in the human body, every possible step should be taken towards the prevention of infection.

PERSONAL.

Dr. Thomas John Jehu, M.A., M.D., F.R.S.E., F.G.S., of the University of St. Andrews, has been appointed Regius Professor of Geology and Mineralogy in the University of Edinburgh, in the place of Professor James Geikie, who has resigned.

Staff-Surgeon Frederick Francis Mahon has been promoted to the rank of Fleet-Surgeon in His Majesty's Fleet.

DR. WILFRED HARRIS, M.D., B.C., Cantab., F.R.C.P., Lond., has been appointed Physician to the Royal Westminster Ophthalmic Hospital.

MR. GEORGE E. STANLEY, M.S., F.R.C.S., has been appointed Assistant Surgeon at the Dreadnought Hospital (Seamen's Hospital Society).

DR. JOHN PARLANCE KINLOCH, M.D., Glas., D.H. Cantab., has been appointed to the new Lectureship in Public Health in the University of Aberdeen.

DR. FREDERICK TAYLOR, M.D., F.R.C.P., Consulting Physician to Guy's Hospital, has been elected President of the Royal Society of Medicine for the ensuing year.

DR. WILLIAM LOUIS RODMAN, Professor of Surgery in the Medico-Chirurgical College, Philadelphia, has been elected President of the American Medical Association.

Sir John Tweedy, F.R.C.S., late President Royal College of Surgeons of England, has been elected President of the Medical Defence Union, vice Dr. Edgar Barnes, retired.

Dr. J. T. Mauclunch will preside at the annual meeting of the Caledonian Medical Society to be held on Friday, July 24th, at 3 p.m., in the Hall of the Royal Faculty of Physicians and Surgeons, Glasgow.

Mr. LyNN Thomas, C.B., on giving up private practice as a Surgeon at Cardiff, has presented to the King Edward VII, Hospital in that city his local private hospital for paying patients, valued at £4,000.

Mr. T. B. Johnston, M.B., Ch.B., Edin., Lecturer on Anatomy in the University of Edinburgh, has been appointed to the newly-created post of Lecturer and Demonstrator in Anatomy at University College, London.

A Portrait of the late Dr. William Berry, for many years Medical Officer of Health for Wigan, has been presented by public subscription to the Wigan Infirmary, of which institution he was for some time Chairman.

Mr. Hugh Scott, M.R.C.S., L.R.C.P., of Lewes, Medical Officer of Health to the East Sussex combined districts, has been placed on the Commission of the Peace for the county of Sussex.

A Presentation was made the other day to Dr. J. Finlay Macdonald, from the Health Department of the Auckland Rural District Council, upon his taking up the medical officership for the South-East Essex Combined Sanitary District.

Mr. E. Fitzgerald Frazer, F.R.C.S.I., of Brighton, was the recipient the other day of a suitable presentation from the local division of the Sons of Temperance in commemoration of his marriage and in recognition of his many years' service as Medical Officer.

Sir James Porter, K.C.B., late Medical Director-General, Royal Navy, will preside at the luncheon to be given in honour of Sir Alexander Ogston, K.C.V.O., late former House Surgeons and Dressers on Thursday, July 30th, at 1.30 p.m., at the Grand Hotel, Aberdeen.

A Presentation of a silver rosebowl was made the other day to Mr. Frederick Gordon Brown, M.R.C.S., on behalf of his fellow officers of the City of London Union as a mark of their affection and esteem on his retirement from the post of District Medical Officer, after serving the citizens of London for a period approaching fifty-two years.
CLINICAL LECTURE ON

SOME FURTHER THERAPEUTIC POINTS.—III.

By HERBERT FRENCH, M.A., M.D.Oxon., F.R.C.P.Lond.,
Physician to Guy's Hospital.

(Concluded from page 62.)

Next let me refer to

The Value of Emetine Hydrobromide in the Treatment of Amebic Dysentery and of Amebic Abscess of the Liver.

It is to Major Rogers, of the Indian Medical Service, that we owe the discovery of the fact that the most important ingredient of ipecacuanha in the treatment of dysentery is precisely that which in the purified form of the drug is thrown away because it produces vomiting. It is this emetine of ipecacuanha which is the essential factor in the cure of dysentery by this drug, and Rogers made the still more important discovery that the hydrobromide and the hydrochloride salts of emetine can be given hypodermically with rapidly curative results, both as regards the dysentery itself and its complications; whilst, when so given, it does not suffer the nausea, vomiting, etc., which crude ipecacuanha is so apt to produce. The drug is now obtainable in the form of little glass balls each containing 1/2-grain of emetine hydrobromide in sterile solution ready for injection, whilst the hydrobromide is supplied in the form of tablets, which can be dissolved in sterile water and thus injected. One does not, of course, meet with amoebic dysentery or any of its complications every day in this country, but in almost every practice a case of the kind turns up, the disease contracted in the tropics, either having persisted until the patient returns home, or else recurring in this country after an interval of apparent cure. In several hospitals, and in one or other of the cases in consultation the curative effects of emetine hydrobromide have been little short of marvellous. In one such patient there had been continuous pyrexia for over two months, the bowels were moved four or five times a day, sometimes with blood, sometimes without; there was pain and tenderness over the liver, and there was the dome-shaped dulness at the right base, together with a friction rub here and other signs pointing to the existence of hepatic abscesses. Quinine, and other remedies, had been tried without any benefit at all, emetine hydrobromide was given hypodermically by Dr. Lacey, of Woolwich, and within a fortnight the temperature had come down to normal, the hepatic signs had almost disappeared, the diarrhoea had ceased, and the patient made a rapid and complete recovery without any operation being done. One can give 1/2-grain of the emetine hydrobromide three times a day, but, in many cases, a single dose per diem is sufficient; at any rate, it is wise to start with one dose a day, increasing this if circumstances indicate the need to do so; it does not seem to produce any untoward effects. It is particularly in the amoebic form of dysentery and in association with the amoebic abscesses in the liver that may follow such dysentery that the emetine hydrobromide does most good, but it has also been tried in the bacillary form of the disease, and one would like to test its effects in those very difficult cases which occur in this country—allied to dysentery, but due to an organism as yet unidentified—namely, English ulcerative colitis. I have not yet had an opportunity of trying it in the latter to any great extent, but perhaps some of you may be able to do so.

The Value of External Heat to Babies Who Are Ill can hardly be exaggerated. In these days of open-windows and open-air treatment, so very important to adults, there is a considerable tendency to think that babies need identical treatment in this respect. This may be true of healthy babies, infants and young children, but certainly does not apply to infants who are sick. Let me try and emphasise this by pointing out that if one were to cool down the external tissues of an elephant, so that they were chilled to a depth of two inches all round the animal it would be some time before this external cold would have any direct influence upon the underlying tissues of the animal, so great is the capacity of the animal is so great. If, however, one were to cool down the external tissues of a baby to a similar extent the viscera must necessarily become affected by the cold almost at once; the only way to prevent their becoming affected thus is for additional calls to be made upon heat production in the child's body, and this entails a repeated draught upon what one may call the fuel of the engine. Sick children take food badly as a rule, and, broadly speaking, anything which can conserve their fuel is good for them. It is probably in this way that oiling the surface of the child's body does good; the oil is a bad conductor of heat and many a case of fever in the middle of a feverish child with an application of oil, not so much by reason of any of the oil itself being absorbed, as by reason of the resultant saving of heat loss and thus of fuel consumption. A greater proportion of the food taken becomes available for the intrinsic service of the body organs. One can do a good deal more towards saving the infant's draught by a similar way by taking care not to expose the body to external cold; if an examination of the chest has to be made it should be done in a very warm room or near a fire and not at what may be called the ordinary temperature of a ward. Infants and young children who are ill often do best in rooms which to healthy adults seem oppressively hot. This is by no means incompatible with proper renewal of the air in the room if the ventilation is seen to properly; it may sound heresy nowadays to say so, but I would rather nurse most sick infants in a hot room even if it were stuffy than in a cold one that was well ventilated. A simple expedient for maintaining the external warmth of a baby, without at the same time, allowing it fresh, cool air to breathe is now used extensively in Guy's Hospital, and this is by means of a cradle over the child, two or three electric lamps being suspended within the cradle. A blanket covers the infant up to the neck; the face is exposed to the ordinary fresh air of the ward, a small cradle-covered by a toy outside the blanket covering the child's body, within the cradle are hung three or four ordinary electric
ights; the cradle is covered with one or more blankets, which are well tucked in round the bed; the electric wire of the lamps passes beneath the covers; the electric switch is turned on and off by the temperature within the cradle watched by means of a thermometer.

I am, of course, speaking of this treatment in a broad general way; one would not use it in conditions of high fever for example, but it is most beneficial in the treatment of marasmus, diarrhoea and vomiting; in cases to collapse, ordinary bronchitis without high fever, and in some cases of fever, similar circumstances; and the heat loss prevented by it does a great deal towards accelerating the child's recovery.

Radium Emanations in Rheumatoid Arthritis and in Diabetes.

A great deal is being written nowadays in connection with cures effected by radium and its emanations, either daily or as a prolonged period. It is difficult to make sure what is real amongst the statements made and what is mere commercial advertisement. I do not propose to enter upon the great value of radium in the treatment of rodent ulcer and malignant disease, but I should like to tell you that I believe radium emanations are of very real value in the relief of certain cases of rheumatoid arthritis, deforming rheumatic arthritis and in some cases of diabetes mellitus. Precisely how the emanations act is quite unknown; it may be that they behave in some way merely as intestinal antiseptics do, or it may be that, like radium itself, they have the power of causing cells and tissues which have taken an erroneous mode of growth and metabolism to return to normal ways. As Consulting Physician to King Edward VII.'s London Radium Institute, I have had the opportunity of watching several cases in which, after other forms of treatment had failed, both chronic joint lesions and diabetes mellitus have been greatly alleviated, if not absolutely cured, by drinking water containing the radium emanations for periods of time. It is some time since it has been generally known that a boy of 15, suffering from ordinary active life with freedom from acidosis and comparative freedom from sugar when previous treatment by diet and by drugs had failed to bring about any particular improvement at all. The difficulty in all these cases is to give statistical proof of the value of the treatment. In many instances where it has been tried to be done, the results have been raised too high beforehand; if, however, the patient is prepared for the possibility of there being no improvement at all one can at least say that there will be no detrimental effect, and now and then a case will be benefited to an extent which, so far as one is able to judge in a broad way, would not have been brought about by other means that we now possess.

The Intensive Iodine Treatment for Phthisis, Peripheral Tuberculosis and Other Chronic Microbial Infections.

The treatment I am about to refer to is very probably familiar to some of you already, but in case it is not I should like to draw attention to it, for it has proved of very material service to a number of cases in which I have tried it, both in Guy's Hospital and elsewhere. Who originated it I do not know; some tell me that it was first devised in Scotland, others that it came originally from Switzerland, but it was Dr. Reeve who first brought it to my notice and who has written about it recently in The Practitioner for September, 1913, p. 391. I was already trying the treatment before that paper was published, and, although it is too early to boast much of the results, there can be no doubt that almost all the cases who have tried it have been benefited by it, and, notwithstanding the comparative naivety of the treatment itself, many of the patients have asked to continue with it after it has been omitted temporarily. Patients, for instance, who have had the treatment in the wards and have afterwards gone home have voluntarily asked to be allowed to go on with the treatment under outpatient supervision. Iodine is now well-known as a very potent germicide, for which purpose surgeons use it locally in preference to almost any other application in preparing the skin surfaces for operations. One cannot, however, administer any large quantity of free iodine by the mouth without
irritating the gastro-intestinal tract and producing vomiting and diarrhoea. One can, however, give large doses of iodide of potassium by mouth, and, after this has been absorbed, one can give chloride water which is also absorbed, the chlorine breaking up the potassium iodide to form potassium chloride and free iodine. The idea of the treatment is to liberate free iodine in this way in the blood and in the tissue juices, so that, wherever the free iodine is present, its inhibiting action on bacteria will be, at least, temporarily increased; even if they cannot be directly killed by the small quantities of iodine present at any one time.

The method of carrying out the treatment is as follows. - The patient takes a single dose of potassium iodide in the morning; say, about 8 a.m., the amount given to start with being generally about 30 grains at a time, though if the patient can take it readily there is no reason why double this quantity or even more should not be used. Sufficient time is allowed to elapse to allow all the iodide of potassium to be absorbed; unless the patient's digestive processes are very slow, generally within about three hours. The potassium iodide will have left the alimentary canal at any rate within six hours, and it has been found by investigation that it does not become eliminated from the system by the urine or elsewhere within twenty-four hours. At 2 p.m., therefore, one can give the first dose of chlorine water, i.e., the chlorine water earlier than this one finds sometimes that the patient is almost immediately sick, bringing up vomit which is blue as the result of the liberation of free iodine in the stomach, the iodine in its turn giving the typical blue colour with the starch in the food. One can repeat it at 4 p.m. and at 6 p.m. Next day potassium iodide is again given at 8 a.m., and the chlorine water repeated at 2 p.m., 4 p.m., and 6 p.m.; and so on for many days or weeks. It is found best to give the chlorine water an hour or a-half more after the last meal; if it is given immediately after food it is apt to produce vomiting, but some milk may be drunk after each dose of chlorine water without detriment. The chlorine water itself is prepared according to the following formula:

\[ R \text{ Potassii chloratis, } 60 \text{ gr. } \]
\[ \text{Acidi hydrochlorici concentrati, } 120 \text{ m.} \]

Place these ingredients in a dry bottle, allow the reaction to proceed for fifteen minutes; and add water gradually to 24 ounces. Dose: one ounce to be taken in plenty of freshly made lemonade.

Certain precautions are needed in connection with it, however, for when newly made there is often far too much free chlorine gas in the bottle to allow of the patient's swallowing the liquid without at the same time inhaling chlorine gas, which irritates the larynx and bronchial tubes and produces oppression in the chest and much coughing and spluttering. It is a good plan to leave the stopper out of the bottle for twenty-four hours or more after the chlorine water has been made, and then for the patient to start at the first attempt with a very small dose such as a teaspoonful or less, diluting it well with lemonade to begin with. The patient will soon learn how little he has to dilute the chlorine water to make it possible for him to drink it, and, after the first day or two, he will also learn how to tell when the chlorine water is, as it were, ripe for ingestion. It is true that a certain amount of the chlorine is lost in this way, but sufficient remains in solution to effect the purpose desired provided the bottle is not left longer than is just sufficient to make it possible for the patient to drink its contents when diluted with lemonade. The dose to be aimed at is about two ounces at 8 o'clock, one ounce at 4 o'clock, and one ounce at 10 o'clock; the object is to give even more than this, but upon the whole doses of one ounce are the most satisfactory. The patient should be prepared, for two separate kinds of temporary ill-effects: the first depends upon the iodism which ensues; in some cases, symptoms of iodism are absent or very slight, but frequently there is running of the eyes and nose, spotting of the skin and some depression which, if the patient were not prepared for them beforehand, would make him certain that the treatment was making him worse. As a rule, however, without any change in the treatment the symptoms of iodism pass off by themselves in ten days or a fortnight, and, although cough and expectoration may be temporarily increased, these presently diminish, the patient's weight increases, the temperature gets less and the patient himself feels that he is very decidedly getting better. The other type of ill-effect that may ensue is frequent action of the bowels, with a tendency to vomiting; if these occur the treatment may be continued for a day or two and then begun again. There will, of course, be cases in which it is found impossible to go on and, as with any form of treatment, there will be cases in whom no improvement results. There are, however, a sufficient number of others in whom the benefit is so marked that I am sure that some of you may wish to try this intensive iodine treatment, and it is on this account that I bring it to your notice.

**Note.** — A Clinical Lecture by a well-known teacher appears in each number of this Journal. The lecture for May is contributed by Robert Saurby, M.D., M.Sc., L.I.D., F.R.C.P.L and J., Professor of Medicine in the University of Birmingham, Consulting Physician to the General Hospital, Birmingham. Subject: "The Treatment of Obesity."

**ORIGINAL PAPERS.**

**DIAGNOSIS IN EVERYDAY GYNÆCOLOGY. (a)**

By H. MacNaughton-Jones, M.D., M.Ch., M.A.O., R.U.I., F.R.C.S.I. and Ed.

In preparing this address I kept carefully in mind the injunction of your President that it should be of an essentially simple and practical nature.

It is the readiness to grapple with the early beginnings of disease that renders the functions discharged by the practitioner of such vital importance to the public health. Throughout all medicine and surgery the maxim "Know thy patient" or "Know thy patient's history" takes first place. The general practitioner is the keystone of the arch of the general health, all the more so now that the "panel system" has come into operation. The hard-and-fast line drawn between the consultant and practitioner has its disadvantages. The unfortunate term "specialist" has come to be interpreted in the eyes of many as implying a degree of ignorance on the part of the one person in whom of all others they should have confidence. They have even come to draw a hypothetical distinction between the "specialist" and the general practitioner.
and "consultant," placing the latter in an inferior position, should he not exhaust his whole mental resources in dealing with one small portion of the human mechanism.

Unfortunately for the application of this idea, that machinery is not constructed on the plan of the motor car. Though in common speech we use terms that would imply there is some analogy, this is incomplete at every point. Many years since Lethaby said that the heart was a more economical force than the steam engine in the foot pounds it raised in proportion to the fuel supplied. But you can remove the motor engine, and clean or repair it: you cannot do this with the heart. When your car is "overhauled," it can be taken to pieces, and each part can be studied separately; not so with the human machine when it comes to you for its overhauling.

Gynaecologists, fortunately, have to deal largely with parts that are not actually essential in the running of the human motor. Uterus, appendages, and appendix may all be sacrificed either at the same or different times, and yet, though not a "complete" woman, your patient may be a healthy one. I know some such in perfect health to-day from whom all these parts have been taken years ago. On the other hand, every part of your motor machinery is essential to the running of your car.

This explains why early indications of disease in the pelvic viscera are often trivial with. Pain, the usual warning of coming breakdown, is often absent, or, if present, is counteracted by sedative or hypnotic remedies, or some palliative means are adopted to stay the unpleasant discharge, the frequency of micturition, the sense of dragging, the loss of apprehension of the possibility of quantity, some reflex neurosis in an organ of sense or digestion, or through the circulatory current in the heart. Besides, in different women the capacity to bear pain varies greatly. A trivial degree will cause one to complain, whereas in another the power of endurance and the dislike to attract attention or to cause trouble leads to concealment up to the breaking point of health. Meantime, the early evidences of malignant changes in some part of the genitalia are overlooked, the leper is watching, the vaginal ulcer is spreading, the cervical erosion is deepening, the endometritis is becoming supplicative, the degeneration of the myoma uteri is setting in, tube and ovary are becoming involved. A little later on, and hydro-salpinx or pyo-salpinx is forming, the ovary is becoming cystic, and infection is spreading either from appendix to ovary or in the reverse direction from ovary to appendix.

Surgical assistance is the next court of appeal. There is no highly coloured description. It is what every practical gynaecologist knows to be constantly happening. The detection of the earliest signs and symptoms which indicate departure from the normal processes and interchanges in cells, tissues, structures and parts, is in the hands of the practitioner. Is it not safe to say that if they were recognised, and curative means adopted at this stage, a very large percentage of mutilating and life-risking operations would cease to be necessary. Their detection by careful first examination in a great majority of cases is not difficult. Treatment is generally simple, and the lines of action are clear.

The facilities for the acquisition of practical knowledge in all departments of medicine and surgery have so developed that any and every industrious and ambitious student has within his reach, during his five years of study and those that immediately follow, ample opportunities of mastering all the therapeutic and technical operative steps required in dealing with the ordinary affections embraced under the head of gynaecology.

There is no more characteristic advance in modern surgery than the assumption of independent action by the practitioner in the operative procedures which come within the reach of his experience and skill. The field for such an exercise has greatly increased in recent years. Out of the competition between the consultants, the practitioner has reaped his advantages in postgraduate courses and polyclinics. You will supply the term that is applicable in the undertaking of any procedure which is not justified by the operators’ knowledge and experience.

We come now to consider the most important step in the diagnosis of those abnormal conditions which are every day presenting themselves for detection and treatment. This is, the first examination of the patient. I press on you that for your own safety as for her benefit, whenever possible, a short note should be made at the time of her history in relation to age, the catamenia, pregnancies, abortions, previous hospital action, evidence of bladder trouble, discharges, and the nature, character, and situation of pain. With such knowledge the object and scope of the examination in a large proportion of cases may be determined beforehand. Of special importance is the time of occurrence and the character of the last menstrual period. In every suspicious case we have first to exclude the possibility of pregnancy. If doubt arises, there should be some witness of the test you apply. The barren rat may enter a trap. In the instance of a virgin, the resort to a vaginal examination will depend on the nature and urgency of the symptoms, or the failure of past remedies to relieve these. Here, judgment and discretion must come in. Do not go on treating a sufferer from persistent primary amenorrhoea with emmenagogues who has an atresic vagina, or send a girl to Schwabach or Spä in whom the genitalia are absolutely negative! As a rule, obstinacy and urgency in symptoms must decide the practitioner whether essentially a case in which an anaesthetic should be availed of. No thoroughly satisfactory decision can be arrived at without it.

Let us here briefly consider the conduct of the examination without an anaesthetic, and what we learn from it.

It is this first examination which frequently determines diagnosis and treatment. Carelessness in abdominal palpation, percussion, and auscultation will leave undetected the loose kidney, which you will not be wrong in making your first quest for in your abdominal search; we overlook the sense of resistance, dulness, or fluctuation, and the sensitiveness caused by pressure in some part, or direction, as in McBurney’s or Lanz’s points indicative of appendicular complication; the characteristic resonance of the flanks in differentiating ovarian cystoma from ascites; feel or detect contraction of the pregnant womb, confirmed by associated signs, in the exclusion of pregnancy in the case of myoma, while we keep in mind the occasional co-existence of both of these states, as also the presence in a large fibroid of a misleading blunt which may be confounded with the
uterine souffle; the relative sensitiveness in the two inguinal regions, and the detection in either of any swelling or the presence of enlarged glands.

At the right side we keep appendicular, ovarian, and ecalc complications in view; at the left, ovarian, sigmoid, and occasionally also appendicular.

We remember that there is such a thing as left-sided appendicitis, and an appendix carried over to become adherent to the sigmoid, as also appendiculo-ovarian complications at both sides.

Coming to the external genitalia, even the labia may lead us into oversight or error. Such a chance may happen to the most experienced. He is a bold or extraordinarily fortunate man who cannot recall occasions in which too hurried a conclusion has led him to give a wrong opinion in gynaecology.

A hydrocele of the cord or a cystic Bartholin's gland may be mistaken for a hernia, or vice-versa. The examination of the urine may be overlooked in pruritus vulva, and the diabetic or other source of the irritation pass unrecognised.

The dorsal position is the only proper method for the examination of the introitus.

At the outset we may find an introitus closed by an imperforate hymen. Readily we detect the source of painful or frequent micturition in caruncle, some prolapse, procidentia, or a vaginal cyst at the outlet. New growths or ulceration, whether benign, malignant, or specific, are at once recognised; so is the characteristic appearance of the mucous surfaces often present with malignancy, as also the white leathery look of leukoplasia. Note is taken in passing of the anal opening, the presence of hemorrhoids, and the integrity of the perineum, the deficient character of the latter has its common association in a relaxed introitus, a vaginal prolapse, a cystocele or rectocele.

It is well to make the preliminary vaginal examination in the Marion Sims' position, the pelvis slightly elevated, the back of the left hand on the right scapula, and the right arm over the couch, with the head turned to the left. With the antiseptic tube of formalin or cinchon cream or lard, the old filthy practice of the jet of vaseline used in common for different cases has disappeared. In every instance where a final decision has to be arrived at the bowel and bladder should be emptied beforehand.

A word of caution is here necessary. Any abrasion on the examining hand will suggest the use of the rubber glove, and in all cases of suspicious discharge and sores this precaution should be taken.

I have known some sad cases of infection and blood poisoning arise from its neglect. I need not say that careful and thorough cleansing of the hands should follow each vaginal examination.

This vaginal search excludes erosions, ulcerations, and growths in the vaginal wall, as well as encroachments from the rectal and vesical sides.

We judge the character of the portio, its length, shape, hardness or softness, the size and feel of the os uteri, and the mobility or fixation of the uterus. We ascertain the presence of any swelling in either fornix, a prolapsed or sensitive ovary or swollen tube. Should any such condition of uterus, tube or ovary be discovered, the dorsal and bi-manual examination should follow.

The next and concluding step is the bi-manual examination which includes the recto-vaginal, recto-abdominal, and recto-vesical. Here the dorsal lithotomy position, with the buttocks well to the edge of the couch, and leg-strings or rests, are essential. Our accessories are a duckbill speculum, uterine hook, different sized tubular specula, and the uterine sound.

If we have satisfied ourselves fully by a process of exclusion in the previous lateral examination, on the points mentioned, all that we may require to see is the condition of the external genitalia and the state of the cervix. For this the tubular speculum only is required. Otherwise, the duckbill is brought into requisition, and the uterus, unless fixed by adhesions, or retracted by growth, being pulled off slowly the observer will observe the character of the erosion, the presence of a polypus, the nature of a laceration, or the indications of malignancy, are determined.

All evidences of pregnancy having been excluded, the length and direction of the uterine canal are found by the uterine sound. Withdrawing the speculum, with two fingers of the left hand in the vagina, and the right on the abdominal wall, we estimate the size and mobility of the uterus or growth, to direction, and mobility.

Searching either forearm, we satisfy ourselves as to the condition of the ovary and tube. In any case in which there is a swelling or tumour in Douglas's pouch, we make a combined rectal examination. Here, especially, there is a call for gentleness and slowness. The well-greased finger is slowly introduced, and the sphincter gently dilated. It is then carried well up, so as to reach the adnexa, and the suspicion of an ovarian or tubal enlargement is confirmed. If there be a tumour behind the rectum, such as an osteo-sarcoma of the sacrum, it will be readily detected. It is well at the same time to make a bi-manual examination with the other hand in the vagina; and, lastly, the recto-abdominal method which will help to throw light on any possible complication of a uterine or ovarian growth. If there be a suspicion that the uterus is ill-developed, or absent, the rectovesical test with the sound in the bladder and the finger in the rectum will determine this.

Long as it has taken, to give a trial in detail this examination, the practice it can be conducted in a very short time. When completed, we have detected or excluded all the greater changes in the pelvic visceras. We have taken note of the source, quantity and nature of the discharge, retaining if necessary some for microscopical and bacteriological examination. We have satisfied ourselves as to the condition of the external and internal genitalia, and, most important of all, the presence or absence of those signs which are indicative of existing or threatening malignant change. Follow this up with an examination of a catheter specimen of the urine, and all the essential facts involved in diagnosis will have been elicited.

In regard to the bladder, every now and then cases occur in which the cystoscope is necessary to decide the cause of the vesical pain, cystitis, or hematuria. With any care stone in the female bladder cannot escape detection. Obviously if renal or urinary signs and symptoms point to the possibility of a calculus in the kidney or the ureter the X-ray should be availed of to detect or exclude it.

There are not a few cases in which it is absolutely necessary to resort to anesthesia in order to arrive at a satisfactory conclusion. In nervous and sensitive women who involuntarily resist, when the abdominal muscles tighten and render the wall tense and rigid; where there is a large pendulous and fat abdomen in which palpation and bi-manual
touch is difficult; in cases in which we require complete relaxation and very thorough bi-manual exploration, so as to decide some uncertain point or suspected complication. Whenever such difficulties or doubts exist an anaesthetic is absolutely needed.

If we have excluded the genitalia and lower rectum, yet are still in doubt as to the cause of pain, a more careful search under anaesthesia may disclose a swelling in the sigmoid, and call for a sigmoidoscopic examination. In all such doubtful rectal cases, it is well to see the character of the stools on a few occasions. We may find some material evidence to assist us in pipestem or ribbon-like motions, and the presence of blood or mucus.

If trust I have not taken up your time uselessly in recalling to your minds the vital importance of an early, complete and correct diagnosis. One final word. Do not belied into the error, when you discover an uterine or adnexal disease or some other error of function in the genitalia, of ascribing to this every other ill from which the woman suffers. The organs of the body, though federated by the circulatory current, nerve distribution and connecting links, have each an autonomy of their own.

The human body is essentially a perfect democracy in its system of government. The smallest ganglion or gland claims independent freedom and liberty, though recognising the right of its local centre to control its action, while the latter obeys the central government. Consequently, each organ has to regulate its own governmental system, the responsibility of rectifying its special insanitary states. We have to realise this in the general treatment of the woman. He is the soundest gynaecologist who includes in his review of her pelvic organs an inquiry into the health of any other to which symptoms point as demanding attention.

At the same time there are reflective disturbances of function of organs remote from each other. The kidney is seriously involved, and such uterine reflexive neuralgeses are not of uncommon occurrence. Hence we have to discriminate between the functional error due to such neuralgeses, and that which follows an organic change. A woman with a retroversion of the uterus suffers from sickness and headache. The former symptom may or may not be a neuralgic; the latter may be consequent upon an undetected error of refraction.

I conclude with my favourite aphoristic motto, "Bene diagnoscit bene curat." (A lantern demonstration illustrative of several of the points touched on followed.)

A CASE OF BANTI'S DISEASE.

By F. J. BAILDON, M.B., C.M.,
Senior Hon. Medical Officer, Southport Infirmary, etc.

On February 13th, 1913, E. W., a young girl, aged 15, was admitted to the Southport Infirmary with the following history.

She had been working in a painter's shop where there is a stove kept hot in the daytime. On leaving work one cold night about a fortnight previously she got a chill and had some shivering attacks. She went to bed and sent for her medical man, who considered the case to be one of acute Bright's disease. He treated her for this, and she was sent into the Infirmary as suffering from this complaint.

On admission her temperature was 101.3; pulse, 128; and respirations, 28. Her face was puffy and white. There was some blood in the urine, but no casts were found, and unless blood was present there was no albumen. The abdomen was distended with fluid to such an extent that it was impossible to palpate any of the abdominal organs. She was put on a mild diet, dry-cupped over the loins, and a mild diuretic mixture prescribed.

No improvement followed, but the blood in the urine diminished in amount, and its presence became intermittent to some extent. The child had no pain, and did not appear much distressed. The abdominal distension increased so much that on February 22nd a Southey's tube was inserted, and in a few hours eleven pints of clear serum were drained off. Two days later another five pints of serum were drawn off. The removal of this large quantity of fluid made palpation possible, and a large mass was detected in the left hypochondrium, which was tender on pressure and which had a sharp border. Later on the splenic notch could be made out. No enlargement of the liver could be felt.

The girl was evidently very ill. A large, deep ulcer with a sloughy black base appeared inside the right cheek, followed in a day or two by a similar one inside the left cheek and a smaller ulcer on the tip of the tongue. These had the appearance of cancerous oris, but the external skin was not affected, there was no haemorrhage, nor was there any offensive odour. During the last few days of February she complained of pain in the rectum, and a painful red patch appeared at the side of the anus. About this time some oedema round the ankles was observed. As will be seen from the chart, her temperature ranged from 99 to 102.6, and it averaged about 101. On March 2nd, some large blood-clots were passed from the bowel, and shortly afterwards death took place.

Permission to make a limited post-mortem examination was obtained. The spleen was much enlarged and weighed 1 lb. 5 oz. The liver was cirrhotic and weighed 1 lb. 12 oz. The
right kidney was swollen and pale on section. There were some adhesions round some of the abdominal organs. No enlarged glands were found. There was no jaundice. No examination was made of the blood, but the patient was clearly anaemic, and the anaemia together with the enlargement of the spleen and the cirrhosis of the liver form the combination of symptoms known as Banti's disease.

A full account of splenic anaemia and its terminations, one of them being known as splenomegalic cirrhosis of the liver or Banti's disease, may be found in an article by Dr. Lyon in the "System of Medicine," edited by Osler and M'Crae. It is not a very common complaint, and nothing is known of its causation. Dr. Buchanan describes the changes in the composition of the blood in his book, "The Blood in Health and Disease," and I refer to these works for a complete account. One or two points are of interest in this case, however, and may be mentioned. First, the very short history of what is considered to be a chronic disease, the history in some cases extending over many years. Acute cases are mentioned, but looked upon as doubtful. This girl when admitted had the appearance of having been ill for months instead of days, and the liver and spleen give the same impression, as may be seen from the illustration. This girl was at work and apparently well five weeks before her death. Secondly, the disease is much more common in males than in females. Dr. Lyon records 17 cases, of which only 8 are females. Thirdly, although cases are recorded in children, it is mainly a disease of middle life. Fourthly, the occurrence of a tebrile temperature is said to be unusual.

It would appear as if an enlargement of the spleen with anaemia and cirrhosis of the liver may exist in a quiescent stage for a long period of time or until some intercurrent complication, such as a chill, disturbs the balance of the organism and precipitates the end. We know that advanced cirrhosis of the liver may be present without ascites. H. G. Sutton, in his "Lectures on Pathology," says that the most extremely cirrhotic liver he ever saw was in a man who met with a fatal accident when at work, and there was not a sign of dropsy. A sort of compensation may arise which enables the individual to maintain a reasonable state of health, but which soon collapses when the balance is upset.

I wish to express my thanks to Dr. Hearn for the careful notes he took for me. The liver and spleen are in the collection in the Thompson-Yates Laboratories, Liverpool.

**WHY MUST WE ALWAYS THINK OF SYPHILIS?**

**By Professor P. SPILLMAN, M.D., [Specially Reported for this Journal.]**

We know by experience that syphilis is no respecter of persons or social distinctions, that—venereal or non-venereal—it crops up here, there and everywhere, that innocent victims are legion, that the disease is hereditary and may be transmitted even unto the second generation, that many victims are ignorant of their misfortune—so much
so that in at least 15 per cent. of tertiary lesions the mode of infection remains a mystery.

In both hospital and private practice I meet with many cases illustrating the possibility for always bearing in mind the possibility of syphilis in mind. I will mention a few of them as object-lessons.

We will commence with the respiratory apparatus. What is commoner than pulmonary tuberculosis, and what can be more discouraging than the diagnosis of a confirmed lesion? Fortunately, in a certain number of cases, things are not always as hopeless as we are in the case of a man with well-marked hereditary, 40 years of age, who, three months after an attack of typhoid fever, presented symptoms of disseminated sclerosis. We suspected syphilis, and after the third injection of grey oil the symptoms cleared up.

In times gone by we did not recognise the possibility of syphilic polynuritis. An instance in my wards published by Dr. Etienne shows the remarkable efficacy of treatment, and nowadays the number of cases of neuritis cured by mercury is very great.

Similar good results are obtained in paraplegia, even when syphilis is denied or has been overlooked. We can recall the case of a woman, 80 years, who had been treated by many physicians with various remedies for years. Auscultation revealed signs of infiltration throughout the right lung, with no percussion at the apex. In spite of a negative bacteriological examination, the case looked unprospective. This patient, however, presented traces of serpiginous syphilides on the legs and lower part of the body. She had been contaminated early in her married life by her husband (who later manifested cerebral and spinal symptoms). Interrogation elicited complete curement and an alleviation of symptoms. The case cleared complete and syphilis was ruled out. With a gain of six months a weight of 25 lbs., and recovery has been maintained for the last three years.

A similar case is that of a medical man, 32 years of age, syphilitic since six years, inadequately treated by means of pills. His condition was hopeless, the loss of flesh, hemoptysis, and signs of extensive softening. This made us suspect syphilis, and he was put injected with grey oil, under which he quickly recovered. It follows that we must always bear in mind the possibility of pulmonary syphilis, and even if tubercle bacilli be found in the sputum the lesions may be mixed, and therefore in part susceptible to treatment.

Turning to the circulatory apparatus, we meet with cases of aortitis, apparently due to other causes, which nevertheless immensely improve under mercury and iodine. Syphilis is certainly responsible for 70 per cent. of cases of aneurysm, and this information suggests a more hopeful means of dealing with them than is usually supposed.

I may add that many otherwise inexplicable cases of anaemia do better on mercury than on iron simply because their origin in reality is syphilitic.

I have never come across such striking cases as those reported by Andral, Fournier, Dieulafoy, etc., of the success with treatment of profluse haemorrhages due to loss of mercury, and iodine when due to breaking down gummati, but I have seen cases of pseudo new growths of the liver cured by anti-syphilitic treatment.

A girl, aged 26, following an injury, presents what seem to be ordinary exostoses, but they proved to be manifestations of delayed healing by syphilis, and yield to treatment—this without any traumatism—when it was abandoned.

Lesions of joints apparently caused by injury or due to tuberculosis may be syphilitic. Dr. Louis Stillmann presented an instance of the kind before the Medical Society, and I myself have shown a case in which bilateral hydrosyphilitis proved to be due to syphilis in a girl who was also suffering from a lesion which looked like a tuberculous gumma. It is unnecessary to add that treatment was followed by prompt recovery.

Lesions of mucous membranes are those in which the patient derives most benefit from treatment based on the suspicion of syphilis. I have published many cases which bear out this statement.

How many patients, long and vainly treated for lupus of the pharynx, have been cured in a few days? In some instances they did not come under treatment until after destructive lesions had worked havoc, but in many others the healing was complete. Some of these patients made a point of coming to see me at regular intervals without waiting for any actual lesion.

It is in respect of the cutaneous and nervous systems that syphilis reserves the greatest surprises. As a case in point, the case of a man with well-marked nervous heredity, 40 years of age, who, three months after an attack of typhoid fever, presented symptoms of disseminated sclerosis. We suspected syphilis, and after the third injection of grey oil the symptoms cleared up.

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I may add that many otherwise inexplicable cases of anaemia do better on mercury than on iron simply because their origin in reality is syphilitic.

I have never come across such striking cases as those reported by Andral, Fournier, Dieulafoy, etc., of the success with treatment of profluse haemorrhages due to loss of mercury, and iodine when due to breaking down gummati, but I have seen cases of pseudo new growths of the liver cured by anti-syphilitic treatment.

A girl, aged 26, following an injury, presents what seem to be ordinary exostoses, but they proved to be manifestations of delayed healing by syphilis, and yield to treatment—this without any traumatism—when it was abandoned.

Lesions of joints apparently caused by injury or due to tuberculosis may be syphilitic. Dr. Louis Stillmann presented an instance of the kind before the Medical Society, and I myself have shown a case in which bilateral hydrosyphilitis proved to be due to syphilis in a girl who was also suffering from a lesion which looked like a tuberculous gumma. It is unnecessary to add that treatment was followed by prompt recovery.

Lesions of mucous membranes are those in which the patient derives most benefit from treatment based on the suspicion of syphilis. I have published many cases which bear out this statement.
SYMPHIS nine months before, and ultimately be- 
drifted into my consulting-room, where I manage to 
effect the fact, and under such circumstances he 
might be added in a few weeks.
Numerous, too, are the cases of cerebral arteritis 
thus cured, and these cases are the more typical 
in view of the absence of objective signs.
I stated earlier that the nervous system and the 
skin afford a rich harvest of cases cured by treat- 
ment instituted in spite of the absence of evidence 
of syphilis. I have noted a large number of ulcer-tuberculous 
lesions and ulcers, which promptly cleared up under specific treatment. It 
would be easy to multiply these instances, if in- 
stead of limiting myself to my own cases I dipped 
into the copious literature on the subject. The fact 
which I wish to impress upon you is that syphilitic 
disease is very "simulating" disease, that not only may 
it closely resemble other well-known diseases, but 
its own pathognomonic lesions may be curiously 
absent. Then, too, we cannot rely upon the co- 
operation of our patients, since for various reasons 
they may leave us in ignorance of their past patho- 
ological history, of which, for that matter, they may 
exceptionally be the ignoramuses. Since we 
know that many diseases apparently of quite a different 
nature may in exceptional instances be due to 
syphilis, it behoves us to be on the lookout for 
it and to bear in mind that even when syphilis is 
not alone involved, anti-syphilitic treatment will do 
good by relieving the organism of at least one source 
of depreciation.

CERVICO-FACIAL ACTINOMYOSIS.

By A. PONCET, M.D.,
Professor at the Faculty of Medicine of Lyons.

Gentlemen,—For the second time this year, and 
at a short interval, I present to you a case of cervico-
facial actinomycosis. You ought indeed to familiarise 
yourself with an affection which is fairly common 
and but too often passes unrecognized, especially by 
practitioners who have not had the good fortune to 
meet with clinical examples thereof, yet it is one in 
which a correct and early diagnosis is all important, 
since without it we are unable to bring to bear the 
therapeutical resources from which we are entitled 
to hope the best results.

Our patient was 21 years of age. She presents 
nothing of interest in her personal or hereditary ante-
cedents. She comes from Bresse, a district with a moist 
climate, where they grow cereals. Dr. Berard and 
I have placed on record several cases of the same 
disease precisely from this part of the country.

As a farmer's wife, our patient owns and comes into 
contact with cattle, especially cows. You now are all 
of you aware of the frequency of actinomycosis in 
the bovine race, and of the fact that the fungus develops on 
the straw and other vegetables on which these 
animals feed. These are points to be noted because 
they may put us on the track of the probable origin of 
the disease which brings the patient to my consulting-
room. From the first of July to the last August, when she began to complain of pain in 
the left half of the lower jaw, more particularly 
behind the angle of the jaw. A swelling made its 
appearance, and as the tooth, a recently decayed tooth, 
was not visible, I naturally assumed that the trouble 
was due to them. This gentleman, is a very easy 
man to make, especially as decayed teeth and actinomycosis are often associated. As a matter 
of fact, decayed teeth favour inoculation with 
the infection of actinomycosis. In such cases we often find 
ulcerations of the bucal mucosa, the edges of the gums 
are affected, the alveolar cavities are gapping and offer 
so many doors of entry for the fungus of actinomycosis 
that it is not strange that the process took hold in the 
month, and once it has gained a footing in the tissues it thenceforth multiplies at its ease.
Whatever may be the part played by decayed teeth

in actinomycotic infection in general, certain it is that 
in this particular instance the trouble was attributed 
solely to the bad state of the teeth, and this unfor-
tunate assumption dictated the treatment. Three 
decayed molars, including one wisdom tooth, were 
extracted, and the mouth thoroughly washed out. We better advised, 
fortunately this was only apparent, for a few days later 
the pain and functional disturbance reappeared, the 
trismus got worse, and so did the sub-maxillary 
enlargement.

This peculiar course is very significant, and I would 
take you to take particular note of it. In accidents 
of dental origin extraction of the teeth usually puts an 
end to the trouble, but in actinomycosis only temporary, 
transient relief is obtained. I would indeed go 
so far as to state that after adequate and pro- 
cine the symptoms recur with enhanced activity.

The fungus finds an excellent cultivation medium in 
the tissues damaged by the extraction. So much is 
this the case, that if there be the slightest suspicion 
of the case being one of actinomycosis it behoves to be 
cautious how we traumatise the mouth.

Therefore, in spite of, possibly indeed on account 
of, the unfortunate intervention of the dentist, the 
local state was far from auspicious, and I got 
the patient sent to the Croix-Rousse Hospital under Dr. Delore.

By that time it was plainly a case of actinomycosis.

There was an extensive swelling on the cheek and in the 
sub-maxillary region, the tumour was red, livid, with 
ulcero-tuberculous foci and of cardboard consistency, 
without any tendency to suppuration.

The clinical signs of the affection became still more evident in 
the course of the next few days. Here and there appeared 
fluctuating pimples standing out the tumour. By bringing them there escaped, not pus, 
but a characteristic blood-stained serous fluid, con- 
taining tiny puriform masses, like yellow grains, and 
microscopical examination clearly established the 
actinomycotic nature thereof.

I may observe that although positive microscopic 
results confirm the diagnosis and place it beyond 
question, the absence of the specific elements does not 
exclude the diagnosis, because it is sometimes 
very difficult to demonstrate their presence. Especially 
is this the case after the iodine treatment has been 
commenced; in fact, all trace of the yellow grains has 
been known to disappear after six days' treatment.

But let us return to the patient. As you see, she 
presents a very extended tumour occupying the 
left maxillary and genial regions. It is of considerable 
size, and, owing to its bright colour, it looks inflam- 
atory, so much so that a careless observer might be 
tempted to think a knife had been used, or that 
the tooth, which might be considered a foreign body, 
was acause of inflammation. Such a misapprehension 
would, of course, lead to the removal of the offending 
object, and the pus might escape. On palpation, this tumour presents a peculiar, 
cardboard, uniform hardness, and there are no soft spots. I need hardly point out that 
the actinomyotic inflammation of four months' standing 
would long since have broken down, and this slowness 
of evolution, this indisposition to suppuration is peculiar 
to actinomycosis.

Then, too, this mass has ill-defined margins; the 
thicker, extends vaguely in all directions, imper- 
ceptibly merging into healthy tissue. Over the zigyo-
matic arch you see some purules like those already 
opened. These we will incise before you, and 
you will see the blood-stained pus. There is already 
other tumour, a tumour containing puriform flakes of fibrin, 
which must be distinguished from the yellow grains 
peculiar to actinomycosis. There is no glandular 
enlargement and no temperature.

The function of the mouth is normal and especially of 
pronounced sensibility, the patient has the greatest difficulty 
in separating the jaws, speech is interfered with and 
mastication impossible. This symptom is pathogno-
monic.

She has been taking iodine, and already it is begin-
in to produce its effects. Though the swelling has 
not yet undergone any noteworthy change, the trismus 
is less rigid and the teeth can be separated to a greater extent.

With regard to treatment, the superficial, breaking-
down lesions have been opened, curteted and painted

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with tincture of iodine. She is also taking iodide of potash internally in doses as large as she can tolerate. In refractory cases it is well to associate the iodide treatment with the administration of arsenic, preferably in the form of an organic compound such as the cacodylate of sodium. Double strength of the latter in the course of a short time we shall see very tangible results, and in the meantime I advise her to get out as much as she can in order to expose the lesions to the sun because the parasite of actinomyces, like most of its kind, seems to be particularly sensitive to the direct action of the solar rays which greatly hinder its development. By this means we may confidently hope to cut short an affection which would otherwise infallibly go from bad to worse. I have been able to show a whole series of photographs of persons suffering from actinomyces, inter alia, that of a young man, also from Bresse, who comes to us now and then for inspection. He, too, is suffering from angulo-facial actinomyces. His case is identical in almost every respect with the one I have just demonstrated before you except that in this instance the mischief is limited to the characteristic tunefaction and trismus. Now that you have seen at least one example of the disease in a living subject, these photographs will enable you to remember the various forms in which the disease may present itself. Looked at as a whole the appearances are very characteristic, but looking at the cases separately, the possibility of a given maxillary swelling being due to actinomyces must occur to you. Should your suspicion be excited, nothing is easier than to verify the diagnosis and institute the specific treatment, and any failure in this respect would reflect discredit on the practitioner.

OPERATING THEATRES.

FRENCH HOSPITAL AND DISPENSARY.

ABSCESSES OF THE DORSUM OF THE PENIS, WITH COMPLICATION OF SIMPLE SORES UNDER THE PREPUCHE.—The patient, a cook, aged 21, operated on by Mr. de Méric, had contracted sores in South America, which had been treated on board ship by cauterisation and lotions. The sores came on four days after connection, but the man said he had been with the same woman more than two months before when the ship was at Buenos Ayres. On admission to the French hospital, Mr. de Méric had the sores. Fifteen days after admission a small abscess appeared on the dorsum of the penis, which discharged freely through a small opening. Another abscess soon formed at about an inch from the first, and it was evident they were burrowing beneath the skin. The glands in both groins were indurated but not enlarged. A Wassermann was negative. Mr. de Méric freely opened the sinus between the abscesses, passing first a director, and slitting up with a curved, sharp-pointed bistoury. Mr. de Méric said the case was interesting in view of what might occur in the subsequent history. Here was a man with a long prepuce, which, however, he could easily get back without doing himself or the chances any injury. These last, from the patient's account, had shown themselves four days after connection. The glands in both groins were indurated but not enlarged; they felt like marbles. There was no eruption, no sore through the course, no syphilis, no enlargement of the groins, no lancinating pain, no fever, no general feeling of unwellness, etc. Yet the chances, as far as one could see them on the inner side of the prepuce, looked syphilitic, though the induration was more of the doughy kind felt in simple sores than the absolute or even the paroxysmal real syphilis. The Wassermann was done in the hospital by Dr. Eckenstein and the result was negative; for this reason, Mr. de Méric pointed out, he only slit from side to side in this manner in order to deal locally with the sores; this he would not once have done had the Wassermann been positive. The negative Wassermann pointed to the sores being simple and not syphilitic, therefore any slitting up of the foreskin would have been followed by the incision taking on the form of a simple (or what in England is mis-named a soft) sore, and by the whole of the foreskin being converted into one large sore. With reference to the negative Wassermann, it might be said that since the patient had been in the hospital he had been taking protoiodide of mercury orally, and in the course of a week or ten days was hardly sufficient to convert a positive into a negative Wassermann, supposing the chances to have been syphilitic on admission. The abscesses and fistula were on the dorsum of the penis, and as far as possible every precaution was taken to prevent any discharge from the sores under the prepuce coming into contact with the small incision connecting the fistula; still such isolation of the dorsum of the penis would be very difficult in view of the constant change of the dressings. At any rate, the opening up of the fistula was an absolute necessity, in spite of the negative Wassermann, and, assuming that the incision did become contaminated, which was very likely, the diagnosis would be made quite clear according to whether further sores developed on the dorsal incision or not.

Four days after operation the incision between the abscesses had formed a large keloid-looking sore, thus proving as far as possible that the sores under the prepuce were simple or soft and not syphilitic; if the sores had been of the latter variety the incision would have remained a simple incision, and an incision would have formed on it, for, as Mr. de Méric pointed out, the discharge from a syphilitic chancre when inculcated on the same individual produced no result, whilst the pus from simple or syphilitic sores inculcated on the same person gives rise to similar or more intense sores, which very often take on themselves a keloid character. This last characteristic Mr. de Méric said he had frequently seen many years ago when he carried out a series of operations for syphilis, the result of which was invariably correct; in those days he could only be certain of this by the advent or the non-advent of the secondary symptoms, but at present we have the Wassermann's reaction to rely upon. So in those cases in which it would be an advantage to slit up the foreskin or to perform circumcision, but a negative Wassermann would negative any such operation. Many surgeons say that a negative Wassermann should not be always regarded as final, especially when the patient has undergone mercurial treatment, if only for a short time; however, the present case proves that a negative Wassermann may be perfectly correct, even under such circumstances.

SPECIAL REPORTS.

THE ANNUAL OPHTHALMIC CONGRESS AT OXFORD.

The annual Ophthalmological Congress was held at Oxford on Thursday and Friday, July 9th and roth, under the mastership of Mr. R. W. Doyley. It was attended by rather more than the usual number of members, and proved to be one of the most successful yet held. The addresses given in the mornings were extremely interesting, and led to some spirited discussions. On Thursday afternoon operations were demonstrated by several surgeons at the Eye Hospital, and some cases of interest were shown.

On Friday morning there was a discussion held on "The Question of Compensation in Injuries to the Eye." It was opened by Dr. William Robinson, of Sunderland, Dr. Frank Shufle-botham, of Newcastle-under-Lyme, speaking next, Messrs. Evans, Gray, Southall, Shiley, and Coull also spoke.

The annual dinner of the Congress was held in the Hall of Keble College on Thursday night, Professor Arthur Thomson being in the chair. After the dinner a discussion on the future of the Congress was held, when it was agreed to carry on the success of the meetings in the past, to continue to carry them on in the same way as before.

This year the addresses on the scientific and commercial museums were all held in the Department of Human Anatomy, kindly lent by Professor Arthur
Thomson, the fact of them all being under one roof being a great improvement on the previous arrangement.

Amongst the distinguished visitors to the Congress from America were Dr. Casey Hayes, Dr. Wendell Reder, Dr. Brown, and Dr. Gifford from the United States, and Dr. Darier from Paris.

The meeting, which terminated on Friday night with the usual singing concert, reflects great credit on the Master, and the energetic Secretary, Mr. Sydney Stephenson.

ROYAL COMMISSION ON VENEREAL DISEASES.

At the forty-sixth meeting of the Royal Commission, evidence was given by Dr. Svend Lomholt, Surgeon to the Municipal Hospital at Copenhagen, regarding the methods adopted for dealing with venereal diseases in Denmark. The principle has been to provide free treatment and to render it as easily accessible as possible, and in order to make this right of practical value an Act was passed in 1906 which contained a provision compelling the municipalities to arrange easy access for free consultation and treatment. Since that date, especially in Copenhagen, in which town probably 80 per cent. of the disease occurring in the country is to be found, a great deal has been done. Very complete hospital facilities have been provided, and in addition there are three public consulting rooms for contagious and venereal diseases at one of which evening consultations are held.

Twelve municipal doctors (two of whom are women) have also been appointed for the purpose of giving free treatment of venereal diseases. The experience has been that patients have shown themselves very ready to take advantage of the facilities. In some directions compulsory measures have been adopted. A doctor treating a case of venereal disease is required to point out all the consequences of the disease, and there is also provision for securing that persons suffering from the disease are not discharged until their disease has been properly treated. Dr. Lomholt thought that this latter provision had been very useful.

A system of confidential notification of venereal diseases is in force. The names and addresses of the patients are not notified, and the cases are identified only by numbers; the notification is consequently only of use for statistical purposes. Dr. Lomholt has made a critical examination of the published figures, and said that they could only be accepted with a good deal of reserve.

Mr. Charters Symonds, Consulting Surgeon at Guy's Hospital, giving evidence, laid stress on the need for largely increasing the means available for treating venereal diseases. He thought that burning inspections should be utilised as far as possible, and that these, together with any additional provision which might be made should be linked up with Insurance Committee areas and with panel doctors. Evening clinics should be provided at every centre. It would be necessary that a scheme of this kind should receive adequate subsidies from the State.

Mr. Symonds advocated the formation of a National Society which should supervise the selection of lecturers, the scope of teaching and the publication of books and pamphlets with a view to the education of the public respecting venereal disease. Such a society, he thought, should be voluntary and should be ready to be helped by the Government. A measure of which the Government approved. He would propose that the Royal Society of Medicine should nominate persons to serve as a committee of this National Society, which should have a definite sum of public money should be placed in the hands of that body.

With regard to the question of notification, Mr. Symonds said that the experience of other countries showed that in the present state of mind of the people notification was ineffective. It led to greater concealment of disease and tended to drive sufferers to quack treatment.

Mr. Arthur J. Evans, Honorary Surgeon to the Liverpool Stanley Hospital, was of opinion that if better facilities for treating venereal diseases could be provided at the general hospitals the spread of infection would be reduced. The establishment of such a clinic to a hospital should, he thought, be financed and controlled by the State and not by the committee representative of the charitable public. He thought that in poor-law patients the rate of the latter manifestations was very high. In the male sex this was exceedingly striking, and in a larger number of cases permanent incapability of earning a livelihood was produced; many also were beyond any hope of any form of treatment. Unfortunately a great difficulty in regard to Poor-law patients arose from the fact that there was no law to compel them to remain till properly cured. Patients frequently left the hospital while still in an infectious state.

As medical adviser to an important shipping company, Mr. Evans said that it was his experience that a great deal of venereal disease was introduced from abroad, and it was his opinion that this continuous introduction of disease into this country should undoubtedly be brought under control. He recommended that the Board of Trade should take steps to warn and explain to seamen and others the dangers of contracting venereal disease and that of infecting others of the community. The importation of disease would, he thought, be greatly lessened if sailors were aware of the risks encountered in foreign ports, and especially in the tropics.

CORRESPONDENCE.

FROM OUR SPECIAL CORRESPONDENTS ABROAD.

GERMANY.

Berlin, July 18th, 1914.

At the Hufelandische Gesellschaft, Mr. Petersohn discussed the

TREATMENT OF TUBERCULOUS BONE AND JOINT

DISEASES AND THEIR SEQUELAE.

He was altogether in favour of conservative treatment of such cases. Orthopaedic measures were supplemented by heliotherapeutics, which was easily carried out in that locality during the summer period. Tuberculous disease of bones was not suitable for treatment in city hospitals or cripples' homes, but in the open air. The more practical class of cases he recommended arbour colonies or arrangements of that sort, where sanubaths could be made use of. Treated in that way tuberculous fistula that had existed for years, could be cast off when spontoaneously and sealed up. Where the disease was only in one part and easily accessible, and the neighbouring joint not yet attacked, it should be radically removed. The speaker showed three cases of deep-seated joint disease in which he had strengthened the spine by transplantation of portions of tibia after the method of Albee. He was not yet, however, in a position to give a definite opinion as to the value of that form of treatment. He then showed two cases in which he had performed tuberculosis femoro-stomy for serious ankylosis of the femur after coxitis; the functional result had been remarkably successful.

At the Gesellschaft f. Geburtshilfe und Gynäkologie, Mr. Franz communicated a note on

CESEANEAN SECTION.

The speaker said he no longer practised extra-

terotional Cesarean section or symphysiotomy. He had had no satisfactory experience with the former, and the operation complicated matters very seriously. All that was wanted could be done with the intraperalonal method, but this should be made as simple as possible. In three years and a half he had operated in 120 cases. The technique had been similar in all of them. The incision, made longitudinally between the symphysis and umbilicus, was as small as possible. The uterus was also incised in the same direction, without any pushing down of the bladder. The head
AUSTRIA.

Vienna, July 18th, 1914.

Tenth Congress of the International Society Röntgen-Gesellschaft.—Continued.

III.—Therapeutic Application: Suprascapular and Deep.

Dr. Heinke (Leipzig) made a communication which dealt with the subject of "The Extra-Biological Effects of the Röntgen-rays.

1. The effects of the rays on living cells are very different according to the degree of sensibility present in those structures. For instance, in the case of lymphocytes, exposure to the rays produced immediate destruction of the nucleus, while the epithelial and embryonic gland cells displayed under the same conditions of exposure a slow modification of structure, which commenced after the lapse of a certain period of latency. (a) The period of latency was not yet being defined; it has been shown by Hertwig and Wassermann that the cells may proceed to division without actually dying. This process of sterilisation of the cells throws light on the period of latency, after the close of which a defect of tissue development, although not immediately due to the production of new cells. (b) The various modes of reaction of tumours display themselves according to the varieties of sensibility of the normal cells of the tissues from which they have been derived.

Dr. F. Heimann (Breslau): On "The Influence of various Filtering Media in the Mesothorium Radiation of the Ovary of the Rabbit." The author had employed a filter constructed of a thickness of 1 mm. of brass, 3 mm. of aluminium, and 3 mm. of lead. He had also applied the rays through a filter of 0.2 mm. of silver. It was only with the use of a lead filter that the destructive effect on the ovary was displayed, and the same feature was manifested in clinical research. In the case of cancer a rapid effect was produced on the epithelium.

Dr. Wolff (Berlin) communicated the results of his researches on bacteria, which had given purely negative results. He had also failed to obtain any therapeutic effects in the case of cancer.

Dr. Friedländer (Schöneberg) found the effects of radiation of the testicles of the guinea-pig as powerful with small doses as with large ones.

Dr. Evler (Berlin) saw cutaneous results in cases of suppuration, which could be traced through the progress of the infection and its cure.

Dr. Eberlein referred to the difference which he had noticed between the effects of radiation treatment of bothyromyositis in living animals and their wholly negative influence on the parasite in the test-tube.

Dr. Hasman (Berlin) stated that a more positive result was obtained when hard glass was used.

Dr. Eymer (Heidelberg) had also obtained appreciable effects in vitro.

Dr. Löwenthal (Brunswick): "On Radiation Therapy with the Use of Heavy Filters." Up to the present it had been impossible to produce results corresponding to the gamma-rays with the Röntgen tubes. The author had, however, succeeded in procuring, with the help of a 1 to 3 mm. lead filter, rays of that characteristic. After this he succeeded in showing that after exposure to the lead a portion of the rays were absorbed by the tissues of the body. Of the rays which passed through 1 mm. of zinc no less than 70 per cent. were afterwards absorbed in passing through the organism. By filtration through 1 mm. of lead a sufficiently powerful radiation was obtained which could be applied without injuring the skin. Behind the filter were found (1) primary ravs, (2) characteristic secondary rays, and (3) a special form of radiation similar in quality to the cathode-rays.

Dr. Pagenstecher (Brunswick): On "The Continued Treatment with Röntgen-rays." Comparatively little effect had hitherto been recorded of their use in the treatment of deep-seated tumours. Intensive radiaction had been tried in conjunction with various forms of exposure, so that only large doses were discussed. Then came the introduction of long pauses after the dangers of burns became recognised. But the tumour found time during these pauses inactivity of growth, and proceed to further expansion. In order to obviate such drawbacks, the author substituted, for the hard 3 mm. aluminium filter, either one of 1 to 1 mm. of lead or one of 2 mm. of copper. With these no injury to the skin had been observed, but after radiation of the same cutaneous area during a total period of 120 hours. In order to facilitate the application of those long periods of radiation—of one or two hours daily—Hrn. Pagenstecher and Löwenthal had prepared a filter-chest which was furnished with
dense filters through which the rays were allowed to reach from four to six persons at the same time. The author had also had a tube constructed which was furnished with an internal filter. In the intervals of the Röntgen-radiation small quantities of radium were utilised. Dr. Hessmann (Berlin) remarked that when using a brass filter of 1 mm, thickness, the exposure must be four times as long as with a 3 mm. aluminium one in order to provide a corresponding dose.

Dr. Hessmann then read a communication on: “The Röntgen-ray Treatment of Malignant Tumours with Massive Doses,” with special regard to the use of the Röntgen-rays in the radiation treatment of cases larger masses of radium—massive—doses, and had obtained favourable results in 10 per cent. of his cases. In cases of tumours of the larynx or pharynx he combined the Röntgen and radium rays. With the administration of massive doses a general toxic treatment must be adopted at the same time. Cases of tumours covered with the skin were treated with only 4 s., through a 3 mm. aluminium screen. Softer tumours which were already breaking down should be treated with canalisation. After the use of 4 s. he had seen necro-tension and removal. In treating tumours without any cutaneous investment he employed various filters. In the usual post-operative radiation therapy, special caution must be taken in most cases to use the greatest possible dose of Röntgen-rays as contrast with the procedure in surface therapy, an interval of six weeks must be allowed. In the percutaneous treatment of gastric carcinoma a 5 mm. aluminium filter should be employed. He recommended the preparation of gastric tumours by radiation treatment by preliminary surgical procedure.

Dr. Wichmann (Hamburg) discussed the “Value of the Röntgen-rays in the Radiation Treatment of Carcinoma.” The effectiveness of the Röntgen-rays in the treatment of carcinoma is hedged about with objections; surgical operation, mixed injection, infra-red, or relatively unfavourable relations or circumstances of the growth, and so on. The softer rays are suited to the treatment of some cases of carcinoma, the harder to others. An unfavourable result does not mean that the Röntgen-rays must necessarily be reformed with radium.

Dr. Paul Krause (Berlin): “The Röntgen-ray Treatment of Mammary Carcinoma.” On a basis of vast material, the author discussed the therapy of mammary carcinoma treated; the importance of preliminary operation, post-operative radiation, and radiation of recurrent growths. Exclusive radiation treatment gives a very unfavourable prognosis. Good results were attained only in cases of very small tumours and sparse patients, or in selected ones without considerable glandular metastasis. Recurrence with glandular metastases require a favourable field, with direct radiation; and perseverance on the part of the surgeon, with endurance on the part of the patient. In such cases shrivelling or connective-tissue degeneration was nearly always produced. In addition to the local radiation, prophylaxis of the thorax and cervical zone was necessary, so that when all diseased tissues had to be removed the operation should be submitted to the radiations and afterwards united. In other cases the radiation therapy was commenced ten days after the operation, and proceeded with in monthly stages for a year. He advocated large areas of exposure, four, rather than one, taken at the same time, and the only parts covered were the face, scalp, and abdomen. As the recurrence nearly always took place in the subcutaneous connective tissue, an unfiltered, very hard Röntgen-rays tube were used. The results were then very favourable; he had made eight successes in six cases.

Dr. Manfred Fränkel (Charlottenburg): “The Röntgen-ray Treatment of Pulmonary Tuberculosis.” He had obtained favourable results in sixty-four of eighty cases. The improvement was both general and local. Commencing increase of the fever was a favourable prognostic symptom. Tuberculous lung tissue is more sensitive to the rays than normal. Tuberculous glands react like the so-called inflammation of connective tissue, cicatrificial contraction, and consequent encapsulating of the pathological focus. Von Pirckaine become thick shells, and pleural thickenings and adhesions are broken down. He recommended the use of large doses of the rays in every case, and exposure of the whole thorax.

Dr. Eckstein (Berlin): “On some Unrecognised Effects of the Röntgen-rays, and their Therapeutic Value.” During the past five years he had obtained relief of pain, local shrinkage, and a change in the so-called Röntgen-rays—for example, after contusion. The relief was generally instantaneous, and continued for some hours, frequently for days, and occasionally for even months. He had combined the radium with 0.4—2 m. a., to a cutaneous area at a local distance of 15—30 cm., for a period of two to six weeks. He had also employed the Röntgen-rays for cases of skin ulcers, and for the so-called stasis of the cutis.

Dr. Fritze (Berlin): “The Use of Filtered Röntgen-rays in Chronic Eczema.” He had obtained favourable results in fifteen cases, by the use of aluminium filter. At each stage 1/8 E.D. was administered, till 2 E.D. had been reached; then a pause of three weeks was allowed.

(To be continued.)

FROM OUR SPECIAL CORRESPONDENTS AT HOME.

SCOTLAND.

PUBLIC HEALTH CONGRESS IN EDINBURGH.

At the Congress of the Royal Institute of Public Health, which was held in Edinburgh last week, the proceedings were of such varied interest, and covered so large a field of work, that it is impossible to do more than attempt, in a general way, to give some account of the principal communications. In the State Insurance Section, the President, Dr. Leslie Mackenzie, stated as the predominant problems in State medicine for the next ten years tuberculosis, housing, medical inspection and prenatal care of children, malarial epidemic, cancer, typhus, and the State medical school, and the organisation of research. In the subsequent proceedings of the section many of these were touched upon. Dr. Mearns Fraser, Portsmouth, in a paper on combating cancer, emphasised the fact that at present the only means of fighting the disease was to inform the public as to its nature, so that it might be removed early. Mr. Corbett Smith, introducing the discussion on sexual diseases, urged that education was the only solution; and that instruction must first be given to those who had to carry on the work of education. Frank speaking and avoidance of false modesty and hypocrisy were the first essentials.

TUBERCULOSIS.

In this section the discussion on tuberculosis centred chiefly round such factors as housing, and in a paper by Dr. Maxwell Williamson the great importance of dealing with slum property was emphasised. In the absence of such preventive measures as the checking of overcrowding, even a tuberculous environment could not produce much benefit. Dr. Alexander James was an exponent of the less orthodox view that tuberculosis was essentially a disease produced by the conditions under which people lived, and that Koch's bacillus was not a sufficient entity, rather the virulent transformation of a harmless, perhaps useful, organism, as the result of environment. In the pathological and bacteriological section, water-borne disease was one of the chief subjects discussed. In
CORRESPONDENCE.

The unavailing absence of the President, Professor James Ritchie, his opening address was read by Professor Beatie (Liverpool). In this address the occasional risk of water-borne typhoid was considered, and for estimations of coliform bacilli in water supplies was urged, but in estimating the meaning of the test it was necessary to consider the source of the water in relation to the possibility of contamination by any sewage. The examination of water was brought up by Professor Delépine (Manchester).

CHILD WELFARE.

The proceedings of the Child Welfare Section were opened by Dr. John Thomson's Presidential Address, in which the necessity for further legal powers for controlling the feeding of children and protection from the slumming of the criminal and pauper classes was insisted on. Dr. David Forsyth opened the discussion on the care of children under school age, in which he spoke of the pressing need of practical training of girls in their responsibilities as mothers. The babies whose mothers had to go out to work might be utilised in the practical training of girls by opening day nurseries near schools. Papers in connection with this subject were also read by Dr. Becket, Dr. A. K. Chalmers, Dr. Ballantyne, Dr. Mary Barclay, Miss Isobel Morris (of the "Duty and Discipline Movement"), and a number of others.

NATIONAL INSURANCE AND PUBLIC HEALTH.

In the second day's proceedings the topic of the State Medicine Section was occupied by the Address to the Council on National Insurance and Public Health administration, in which three by-products of the Act were specially mentioned—first, the accumulation of sickness records; second, the last report of the Nuffield Trust; and third, the achievements of the American, Australian, and Islands medical grant. Dr. Dunlop read a paper on the "expectation of life" judged from the mortality statistics of various Scottish towns. The range was very great; at birth the male expectation of life was 54.1 years in Kilmarnock and only 43.6 in Govan; at 25 it was 40.5 in Perth, against 38.9 in Govan.

THE MILK SUPPLY AND THE HOUSING PROBLEM.

again furnished matter for discussion in this Section. The most interesting and important papers, however, were those read on tuberculosis at the Tuberculosis Section and in the joint meeting of the Child Welfare and Pathological Sections. In the first of these the administrative aspects of the problem were emphasised, and the contributions of different countries and localities by Sir Robert Philip (President), Mr. Warburg and Dr. Halliday Sutherland (London), Dr. Bowditch (New York), Professor Haussen (Bergen) and Professor Rist (Paris), and many others. In the joint Section interest centred round the incidence of the disease in children and the milk supply. Professor v. Pirquet said that in Vienna infection through the lungs was the common source, and that in Austria and Germany cow's milk played no part. His conclusions, briefly, were: That for the first year of life respiratory was by far (95 per cent.) the most frequent; enterogenous infection (1-2 per cent.) was not important, and that prophylaxis had chiefly to do with this last. In Austria, in 1914, milk was invariably boiled before being used.

Professor Sims Woodhead's paper referred to the water supply, and those read on tuberculosis dealt with the danger to infants of the milk from tuberculous cattle. Dr. Haussen (Bergen), thought that infection from adults was the chief source of infection. Dr. Shennan emphasised the importance of continuously being forgotten—viz., that each locality must find out its own facts for itself. He would expect that in Edinburgh, where there was so much bovine infection of joints, there would also be a large proportion of bovine lung infections. These had not been proved experimentally. Dr. McNeil showed that the results of the von Pirquet test were quite different in Edinburgh from Vienna, the incidence of infection being much higher during the first four years of life, and lower during the later years of childhood. In Vienna the positive reactions during the first year are 5 per cent., whereas in Edinburgh they are 15 per cent., rising to 45 per cent. by the fourth year.

All the subsequent British speakers—Professor Delépine, Mr. Stiles, Dr. Mitchell, and Mr. Fraser, were strong in insisting on the real risks of milk infection and its country. In England the examination of milk showed that the small amount of surgical tuberculosis in Vienna was due to the milk being sterilised. Dr. Mitchell quoted 80 consecutive cases under 12 years of age in which 71 bovine and nine human infections were found. Of 406 samples of milk 82 contained tubercle bacilli.

IN THE INDUSTRIAL HYGIENE SECTION.

The Injuries of Soaps (Dr. F. Gardiner), "Dust and Tuberculosis" (Dr. Beattey), "The Electrifying Treatment of Lead Poisoning" (Mr. Chalmers), "The Campaign against Mosquitoes" (Surgeon D. H. Given), and other subjects, were discussed.

In addition to the sectional meetings, an exhibition of apparatus was also arranged, which was connected with child welfare campaigns from which various demonstrations on the diseases of children, nursing, massage, hygiene, etc., were given.

The exhibition was largely taken advantage of not only by members of the nursing profession, health visitors, and parents of all ranks.

After the first day's proceedings the members were entertained at a reception by the Lord Provost in the Royal Scottish Museum; on the next evening the Congress Dinner was held, and on the following day the College of Physicians gave a dinner to some of the members. A number of garden parties and excursions were also arranged, including a garden party at Hope-von House by the Marquis of Llindthig.

In reference to the resolution recently come to by the Ayr Burgh Insurance Committee to bring home, owing to lack of funds, their phthisis patients presently being treated in sanatoria, it appears that these patients are far in number. A matter afterwards came under the notice of the Ayr Town Council, who entered into communication with the Local Government Board and obtained an interview with them. The Town Clerk subsequently received a letter from the Board in which they stated that with child welfare arrangements, at any rate from want of funds or any other reason discontinued the treatment of insured persons, it fell to the local authority to attempt these cases if further treatment was necessary, and that it rested with the local authority to determine that the patients in question were in doing so they ought to be guided by the medical officer of health. In the view of the Board it was advisable that the nine patients in question should not be removed until it had been determined what further treatment was to be given to them.

NEW PROFESSOR OF CHEMISTRY AT ABERDEEN.

Mr. Frederick Soddy, M.A., F.R.S., Lecturer on Physical Chemistry in Glasgow University, has been appointed to the Chair of Chemistry in Aberdeen University, formerly held by Professor Japp. Mr. Soddy, who is 36 years of age, has already had a brilliant career. While Demonstrator in the Chemical Laboratory at McGill University, Montreal, from 1900 to 1903, he obtained a considerable experience in the physical investigation of radio-active phenomena, for the most part in conjunction with Professor Rutherford, to whom he owes his initiation in this subject. The result of this joint work was a paper giving the interpretation of radio-activity by the theory that the atoms of the radio elements are undergoing spontaneous disintegration. In 1903 he continued the work with Sir William Ramsay in London. They isolated the radium emanation in a pure state, and spectroscopically obtained the generation of it from the element helium. During this time Mr. Soddy lectured on radio-activity in the University College, London, and the Cavendish Laboratory, and in 1904 he gave a course of University extension lectures in Western Australia on modern advances in the physical sciences.

UNSUCCESSFUL ACTION FOR DAMAGES.

The case in which a lady patient sued Dr. A.
Lamont, Esslemont, Chryston, Lanarkshire, for £500 damages, was tried in the Court of Session last week before Lord Anderson and a jury. The pursuer had cut her left little finger when pruning in the garden, and was treated by the defender. In consequence of alleged fault of the pursuer before the doctor's part in his treatment, the pursuer had afterwards to get her finger amputated. The defender denied that he had been guilty of fault or negligence. The jury, after an observation of an hour and three-quarters, returned a verdict for the defender.

NEW LECTURESHIP AT ABERDEEN.

Mr. John Parlane Kinloch, M.D., D.P.H., has been appointed to the new Lecturehip on Public Health in Aberdeen University, out of six applicants. He is 28 years of age, and graduated M.D. at Glasgow University with commendation, having previously qualified there in 190; and he took the diploma in Public Health at Cambridge, with distinction in sanitary science. Dr. Kinloch has considerable teaching experience in Ruchill Fever Hospital, Glasgow, and as Assistant Lecturer on Public Health in the Anderson College of Medicine, Glasgow. His research work has included investigations of the biological properties of the typhoid, the diphtheria, and Cerebrococcus, and the origin of return cases of scarlet fever.

MEDICAL SERVICE IN COWAL.

Dr. McIntyre, Inselan, and Dr. Edgar, Lochgoilhead, were among those who attended a conference at Dunoon between the Highlands and Islands Medical Service Board and the representatives of parishes in the district. Small hospitals throughout the district were present, but the influential landowners present favoured the alternative of a powerful motor ambulance in connection with Dunoon Combination Hospital, which can take more patients.

LETTERS TO THE EDITOR.

[We do not hold ourselves responsible for the opinions expressed by our Correspondents.]

"THE BRITISH PHARMACOPEIA—1914."

To the Editor of THE MEDICAL PRESS and CIRCULAR.

DEAR SIR,—At its meeting to-day the Executive Committee of the General Medical Council formally adopted as "The British Pharmacopoeia, 1914," the complete draft submitted by the Pharmacopoeia Committee. It was resolved that copies, in advance of publication, should be made accessible to the public for inspection in the offices of the Council in London, Edinburgh, and Dublin on Monday, August 10th, at 10 a.m., and thereafter from 10 a.m. to 4 p.m., and that a copy for review should on the same day be placed in the hands of the editor of each of the medical and pharmaceutical journals on the Registrar's list.

The official publication of the new "British Pharmacopoeia" will be made by notice in the Gazette on Friday, October 1th, on which day copies will be on sale at Messrs. Constable and Co., Ltd., 10, Orange Street, Leicester Square, W.C. I am, Sir, yours truly,

NORMAN C. KING, Registrar.


THE DECAY OF FRANCE.

To the Editor of THE MEDICAL PRESS and CIRCULAR.

SIR,—The crude details of politics, the mere play of parties, seem to lie far outside the scope of medical journalism, but when physiological factors make up great part of the complex system of causation whereby the destinies of nations are moulded, the subject becomes of absorbing interest to the whole scientific world and the journals that represent it. If there are at present any peoples showing signs of decay, it behoves the nations around to inquire into the phenomena, and to avoid the diseases of the body politic that appear to threaten or already seriously affect their neighbours. With regard to our fast friends, the French, the policy of international pin-pricks has long given way to the extende; the virulent hatred during the Boer War and the episode of Fashoda have been quite forgotten, and the two nations of France and British are now working together with united and friendly intentions, rather than with an eye to the future." This month the French medical weekly has published the following article:—"The two medical applicants. If a newspaper publishes startling statements by its French correspondents, it never comments upon them in its editorial columns, nor does it allude to the solid fact that we have advanced far along the road of international friendship and commerce with our French neighbours. A most remarkable illustration of the indifference of the British Press was manifested during the Paris Hygienic Congress in May, 1913. The question was there once more discussed from the standpoint of the two distinguished churches by two Frenchmen, M. Leprince and M. Leclerc Bourgeois, who dwelt upon the danger from foreign attack due to the comparative paucity of their population and the continuously progressive decline in the birth-rate. He pointed out that the British population contains 15 per cent of the population of Europe, whilst to-day she has only a per cent. The excess of births over deaths during the period 1906 to 1910 was lowered in France by 50 per cent, whilst it remained practically stationary in the French and neighbouring countries. In 1911 the deaths exceeded the births by 43,850, while the number of births was the lowest ever recorded. M. Ribot, after adopting and emphasising all his country's statements and dwelling upon the fact that the French population has lost two fifths since 1871 and has long been much higher than that of their Northern neighbours, ended his speech with the following words:—"This country is sick, and it ought to be proclaimed aloud. The French race is withering. The people must be informed of the peril by which it is menaced. All the efforts of the Legislature and of the Government must be concentrated upon grasping with this peril." This profoundly impressive confession and appeal was entirely ignored by our home journals, and this is in marked contrast to the fate of similar reports of an equally alarming kind. The Times of June 26th last contained a telegram from its Paris correspondent on the still alarming decline in the birth-rate. The number of births last year was 745,460, the lowest ever, while the lowest figure ever shown with the exception of 1811. In less than 40 years the birth-rate has diminished by 280,000 a year. The statistics become more and more disquieting, when compared with the returns of other countries. Germany has at least 30,000,000 more people than France. If, like France, she should impose, instead of two years, a three years military service, she might make it virtually impossible for France to defend herself even with the help of her allies. It is now seriously proposed to displace the 1,000,000 of foreign European settlers in France by labour from the Kabyle and other tribes in the French African colonies. It is also seriously proposed to augment the army in France from similar sources. These ideas
are set out at length in a dispatch from the Times correspondent in its issue of Monday last, July 13th. The former idea is perhaps practicable; it is at least extremely significant. The second suggestion is even more significant, albeit grotesquely absurd, in view of the fact that establishment. The uniform subjects of abtropical and tropical Africa would die literally like flies in a European winter campaign. France is surely presenting us with an object lesson to which we cannot afford to shut our eyes. Our imperial responsibilities depending for their enforcement on the strength of our people, are inculcably vaster than hers. It is a big subject. In my letters so far I have barely opened it, and although ready to go on, I am equally ready to stop at the smallest hint from you.

I am, Sir, yours sincerely,

HENRY SEWILL.

The Old Rosery, Earlswood Common, July 17th, 1914.

OBITUARY.

SIR CHRISTOPHER NIXON.

It is with deep regret that we have to record the death of Sir Christopher John Dixon, Bart., which took place on Sunday last at his residence, in Dublin. The deceased gentleman, who was born on January 19th, 1845, the son of Mr. C. W. Nixon and Mary Anna, daughter of Mr. W. J. Hackett. He was educated at Trinity College, Dublin, the Cecilia Street School of Medicine, and at Paris. He qualified as L.R.C.S., F.R.C.P. in 1867, and D.M. in 1878. He was appointed F.R.C.P.I. in 1876, and received the M.D., R.U.I. (honoris causa) in 1885. Sir Christopher Nixon was well known to the medical profession in Ireland, having occupied the position of President of the Royal College of Physicians of Ireland, as well as having been Vice-Chancellor, a member of the Senate, and a representative on the General Medical Council of the National University of Ireland. Senior Physician at the Mater Misericordia Hospital, a Fellow (late President of the Pathological Section) of the Royal Academy of Medicine of Ireland, Professor of the Practice of Medicine in the Catholic University, etc...

A communication to the Times contributes the following appreciation of Sir Christopher Nixon:—"Ever keen and sympathetic as a practitioner, his remarkable powers of diagnosis in seeing through and through a patient's ailments almost at a glance, and his exceptional ability and skill, he rapidly won his way to the foremost place amongst the men of his time, and after holding many important positions in Ireland was made a Privy Councillor amongst the New Honours of this year. As a member of the General Medical Council he came to London regularly to attend its meetings, and was well known in Liberal circles of London society. A man of many parts, energy and ability, he was regarded by his pupils and intimate friends—not all of them of his own generation—as gifted with a geniality which has given to practice to humanity what might have been intended for the library and lecture-room of the Academy."

REVIEW OF BOOKS.

FIRST HINTS IN DENTISTRY. (a)

This "causerie" on a subject of which the importance seems to advance daily with seven-league-boots stride in this our "decadent generation," is well intended, as we are told in the preface, to the benefit of friends in general: "leur exposercar qu'il faut faire et ne pas faire." The author skilfully advocates and logically defends his application of the term Stomatologie to the theory and practice of his specialty and he unquestionably shows his readers what to do and what not to do with the enviable lucidity and coincident impressiveness of thought and diction which so uniformly characterise the published expositions of the Gallic experts in science and philosophy.

The first chapter of this book is the most appropriate heading which embodies the statement that: "When the teeth become painful, then, indeed, is the time to seek advice." And from this very judicious beginning down to the closing of his terminal (final) chapter, our author's text is quite egg-full of the most lucid information and suggestion, conveyed in an exquisitely luminous style, which will surely enable every Frenchman in the street to read as he runs, at bow-wow speed. The dictionary selection of subject matter are, of course, meant to be of the "popular" quality, but we have no hesitation in expressing the opinion that no general practitioner of the art of healing, or student of the prevention of disease can fail to find in the teachings of the author, the highly instructive and highly entertaining contents of this book most readable and suggestive little volume.

SMALL-POX AND SANITATION. (b)

When we noticed Dr. Hanaa's book in these columns some months ago, we anticipated that the facts contained therein would prove a valuable and important factor in the anti-vaccination movement, and the event quite justifies our anticipation. Our readers will remember that, stated in the most general terms, Dr. Hanaa's investigations went to show that among vaccinators the immunity between the age of forty and twenty years there were no deaths from small-pox. After this the percentage case mortality rose during the next two decades, to fall again during the ages between fifty and sixty years, while from sixty years and upwards it just reached ten per cent. Among unvaccinated persons the percentage case mortality for those under two years of age was 85 per cent. between two and five years 36.6 per cent., between five and ten years 19 per cent., between ten and fifteen years 3.2 per cent. After this age period the percentage case mortality again rose till between the ages of forty and fifty years it reached 50 per cent., at which figure it remained constant for the remaining periods. The figures also tended to support the belief that the protection afforded by vaccination here some relation to the scar area left by vaccination. We have not space to state in detail the reply of the Anti-Vaccination League to these figures, but we shall indicate the lines on which the reply proceeds. It is urged that the belief observed the protecting power is most, like the greater decline in the incidence of typhus


(b) "Studies in Small-Pox and Sanitation, based on the experience of the Liverpool General Hospital, entitled "Studies in Small-Pox and Vaccination" by William Hanaa, M.D. Published by the Anti-Vaccination League. London: 1914.
fever, be due to the cause operating in common in both diseases—improved sanitation. In this connection we would point out that there is no antagonism between vaccination and sanitation, and no one denies the influence of improved conditions of life, and of the sanitation of small-pox. One must beware, however, of the fallacy of comparing the general mortality from one disease with the case mortality from another. What Dr. Hanna's figures seem to show is that the case mortality of small-pox, expressed in terms of the age period for the vaccinated than for the unvaccinated in the same town, and for the vaccinated, for all age periods, was 2.9 per cent., as compared with 22.7 per cent. for the unvaccinated. It is no fairer to draw the conclusion that this percentage of 27.7 is much higher than it is in other places, such as Leicester. So far from being shattered, Dr. Hanna's argument is not touched by the fact that it was safer to hope for the recovery of liability to death to be attacked in badly-vaccinated Leicester than in well-vaccinated Liverpool.

We have said enough to show the general trend of the reply, a careful study of which we would recommend to our readers, not because we think it will upset the original statement of Dr. Hanna, but because we think that a recognition of the fallacies that it contains will confirm one in the belief of the uselessness of vaccination as a measure of preventive medicine.

ST. BARTHOLOMEW'S HOSPITAL REPORTS. (a)

The current volume of the 'St. Bartholomew's Hospital Reports' well maintains the high traditions of that ancient institution, and sets an example to other similar institutions of much good work well done and carefully handled. Besides interesting memoirs of the late Mr. Alfred Willett and Mr. Raymond Broadley Etherington-Smith, the volume contains two medical and five surgical papers. Dr. Sladden gives an interesting account of a trial of some tests in paralytic chorioretinitis; Dr. Alton and Dr. Broadley gives a case of blood in myelocytic leukaemia in relation to the prognosis of the disease. Dr. Thurnfield writes on splenectomy in acholeucytic jaundice, and Mr. D'Arcy Power on appendicectomy in the treatment of ulcerative colitis. Mr. Moreton records an interesting case of post-orbital arterio-venous aneurysm successfully treated by ligation of the internal carotid artery. Mr. G. W. Twigg writes on pes cavus as an initial sign of syphilis and Mr. H. J. Bergold gives an interesting account of the experience of the use of neo-salvarsan in the Skin Department of the Hospital. The usual statistical tables and information concerning the hospital work complete the volume.

ULCER OF THE STOMACH. (b)

For almost one hundred years since Matthew Baillie and Crueviller first thoroughly investigated the subject of ulcer of the stomach and established the disease as a definite entity in our nosology, the subject has been one of fascinating interest to generations of medical workers. In spite of this, we are still sadly deficient in exact knowledge as to the causation of the condition, and this deficiency, no doubt, largely accounts for our failures in its treatment. When moreover in an attempt to achieve success in intra-abdominal operations it seemed as if the treatment of gastric ulcer were about to pass from the domain of the physician to that of the surgeon, and patients with the symptoms of ulcer of the stomach flocked to the surgeons to be cured by operation of their distressing complaint. Operations undertaken under these conditions soon revealed the fact that our diagnoses, of which we used to be so certain, was often erroneous, and even when treatment was not infrequently failed to give any permanent relief. These discoveries have led to a profound modification of our ideas and the whole subject of gastric ulcer, its diagnosis, its causation, and its treatment, has been again cast into the melting pot for further study. What the outcome of this further study will be it is impossible to say yet to those who believe that it will lead to great increase in our knowledge and in our capacity for assisting the unfortunate sufferers.

Dr. Bolton has taken this opportunity of stating for us the problem of the disease, and the side of the question's which Mr. Broadley's book deals with. In its conclusions, Mr. Broadley's volume, is the opinion held at the present time that the disease is caused by a specific organism, which is a bacillus that can be cured by iodide of potassium and those that could not. The diagnosis then was simple and had the advantage of depending on the result of treatment instead of being the foundation of that result. We have come to the conclusion that the disease is an independent entity that stage, and accurate diagnosis not infrequently leads to successful treatment. Accurate diagnosis is urgently demanded both by the physician and the surgeon, yet the difficulties in the way of achieving it are often thrust into the best endeavours. Dr. Bing has made this difficult path somewhat easier, and we cordially thank him for the help he has given. Our thanks, too, must be extended to Dr. Arnold for putting Dr. Bing's work within the easy reach of English readers.

ELEMENTARY ZOOLOGY. (c)

In this work the author has assumed that the student possesses an elementary knowledge of chemistry and physics. One general principle, he tells us, has guided him in its compilation—namely, that "the organism should be regarded as a whole." In further illustration of this principle he states in the preface: "I have not adopted views which are based on certain morphological institutions of the body of an organism, such as cells and zoids, a mystical individuality, based upon assumptions with regard to their history or potential independence. I have taken in this view the 'individuality or indivisibility of the organism.'" This statement rather conveys the impression of placing a severe strain upon the "mentality" of the average intending student of zoology. To such, perhaps, it might even prove alarming. But with the preface the student need not necessarily concern himself, and he will find in the author's pages one of the best expositions of the science of elementary zoology now extant for the student's use. The bulk of the work is naturally devoted to the study of the external and internal structures of adult animals. There is, however, an excellent chapter on embryology, constituting a most helpful introduction to the subject. For the most part students experience difficulty in grasping and remembering embryological facts, but in this chapter their pathway of instruction is smoothed for them as far as it is possible to do so.

Other chapters deal with "Classification and Evolution?" and "The Animal in the World," each of which adds immeasurably to the usefulness of the work.

In an appendix the necessary details are given concerned in the practical working of zoology, which we
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would suggest would have been better placed as a special chapter at the beginning of the book. The first thing a worker has to learn is the tools and appliances required for his work. A word in commendation should be added in respect to the lavish number of illustrations explanatory of this as well as other parts of the work. We have recommended this manual as a trustworthy and comprehensive guide for the examinational purposes of the zoo student.

INDEX-CATALOGUE OF THE U.S. LIBRARY, SURGEON-GENERAL'S OFFICE. (a)

This, the latest volume to hand of this immense index-catalogue, comprises 1,057 double-columned folio pages, and includes titles under the initial letter T. This number alone occupied 522 pages, and the letter T occupied 82 pages. At that time the Surgeon-General's library contained 6,426 volumes and 8,580 pamphlets, and indexed 38,492 titles of articles in periodicals. To-day the library contains 132,641 volumes and 230,341 pamphlets. Book titles now number 295,049, and journal titles 1,089,778. Close on 1,720 columns are occupied with the titles of articles on Tuberculosis alone; in the 1893, 1894, and 1895 numbers was disposed of in 1,068 the science of chemistry is based. The price seems to us, however, to be somewhat prohibitive.

TREATMENT OF TUBERCULOSIS. (b)

This is a compact volume, of a useful size, dealing with the treatment of tuberculosis in all its forms. It commences with a general consideration of tuberculosis and the parts it affects, and then goes on to organize the International system of Ophthalmology. The treatment of predisposition and of actual phthisis, followed by the hygiene, treatment and alimentation which are of such vital importance in this condition. The pages devoted to the treatment of pulmonary phthisis are more than sufficient. The latest information is given and is complete without in any sense being drawn out, and should be read by every medical man whose work in any way brings him in contact with pulmonary tuberculosis. As part of our tuberculosis officers. The style of the book is excellent and the translator's part has been well done, whilst that of the publisher is beyond reproach, the type being easily read and exceptionally clear. The book is in cordially recommended for treatment of tuberculosis according to age and to the associated morbid conditions is very adequately dealt with, as also are those of extra-pulmonary tuberculosis affections: and the chapter on the social defence against tuberculosis is admirably done. The treatment of tuberculosis according to age and to the associated morbid conditions is very adequately dealt with, as also are those of extra-pulmonary tuberculosis affections: and the chapter on the social defence against tuberculosis is admirably done. The treatment of tuberculosis according to age and to the associated morbid conditions is very adequately dealt with, as also are those of extra-pulmonary tuberculosis affections; and the chapter on the social defence against tuberculosis is admirably done.

OPHTHALMIC SEMIOLOGY AND DIAGNOSIS. (c)

This book has been produced upon somewhat novel lines. It fills a space which has hitherto been vacant in the literature of the subject. Whether, however, that space having been filled the work will supply a need, remains to be seen. Nevertheless, it is worthy of study. The author has plainly devoted much time and thought to his work, and the book contains a mass of useful information for the ophthalmic student in a convenient and handy form. Again, a distinct and praiseworthy feature of the work is its emphasis upon the importance of observations, and some coloured plates of the fundus: these latter, the author tells us in his preface, form part of the collection of drawings which he has been making since 1884, all of which have been directly painted from the living subject. As the work consists solely of the symptomatology and diagnosis of diseases of the eye, and excludes the subject of treatment, it may be inferred that its accomplish- ment will be mostly fulfilled as a work of reference. There are some glaring misprints, showing careless proof-reading, and here and there is displayed a looseness of style, suggestive of hurried composition.

THEORETICAL CHEMISTRY. (d)

This volume serves as an introduction to the study of physical chemistry. The author has succeeded admirably in presenting such difficult problems as the quantitative theory of solutions and the principles of electro-chemistry in a clear and simple manner. The solution of numerical examples forms a definite part of the book. The volume consists of nineteen chapters, and is provided with a very complete index. In these chapters the theories of chemical science are very fully and clearly expounded, and we feel sure that a study of Dr. Getman's interesting work will greatly aid the student in understanding the fundamental principles of chemical science.

THE HEART BEAT. (e)

The rapid advance that has been made in recent years in the clinical investigation of morbid hearts has, we fear, tended rather to mystify than to enlighten many busy practitioners. The methods themselves require patient study and long-continued practice before they can be made to give satisfaction. These results, too, when obtained, though they have added greatly to our knowledge of the mechanism of the heart both in health and disease, have not as yet led to any profound consideration of the diagnosis or treatment of cardiac diseases. Under such circumstances it is not to be wondered at that the general practitioner is inclined to look on the methods of cardiography rather as a fad of the specialist than as an important and helpful aid to the clinical physician. While there is much that is sound in this position, it is quite obvious that the results of cardiography are of too much importance to be altogether neglected by any physician who wishes to do the best for his patients. In this admirable and concise little handbook, which gives in clear and concise language the chief facts and conclusions derived from the new knowledge, and lays stress on those that are of service at the bedside. The rapid evolution of a new department of clinical work (a) "Index-Catalogue of the Library of the Surgeon- General's Office, United States Army, Authors and Subjects." Second Edition. Revised and Corrected. Washington, 1913.

(b) "Treatment of Tuberculosis." By Professor Albert Robin. Translated by Dr. Leon Blanc. Assisted by Mr. H. de Mere. M.R.C.S., M.B.C.S. London: J. and A. Churchill.

(c) "Ophthalmic Semiology and Diagnosis." By Charles H. Beard, M.D. With thirty coloured plates and seventeen figures in the text. London: Kehmann, Ltd. 1913.


vidals the sequel of taking sulphates of the alkali metals. Besides its gentle purgative action, the sodium phosphate effects diuresis and adds to the acceptability of the preparation in cases with gout or rheumatism.

MEDICAL NEWS AND PASS LISTS.

The British Medical Association.

The eighty-second annual meeting of the British Medical Association will be held at Aberdeen on July 28th, 29th, 30th and 31st next, under the presidency of Sir John Loudon, K.C.M.G., M.D., F.R.C.P., Consulting Surgeon, Aberdeen Royal Infirmary and Surgeon-in-Ordinary to H.M. the King in Scotland.

Sixteen scientific sections have been arranged and will meet daily from Wednesday to Friday in the Marischal College. On Monday, Dr. Ogston, Surgeon-in-Ordinary of the Royal Infirmary of Aberdeen, conferred the Presidential Address on "The Anatomy in Physiology; Dermatology and Syphilis: Diseases of Children, including Orthopedics; Electro-Therapeutics and Radiology; Gynaecology and Obstetrics; Laryngology, Rhinology and Otology; Medical Sociology; Medicine; Naval and Military Medicine and Surgery; Neurology and Psychological Medicine; Ophthalmology; Pathology and Bacteriology; Pharmacology, Therapeutics and Dietetics; State Medicine and Medical Jurisprudence; Surgery; Tropical Medicine. The programmes throughout promise the most particularly interesting discussions owing to the large attendance of men of eminence from foreign countries and the Overseas Dominions.

On Tuesday, July 28th, at two o'clock in the afternoon, Sir Alexander Ogston will be inducted to the Presidential chair, while at 8.30 p.m. he will deliver his address in the Music Hall, Union Street.

On Wednesday, July 29th, at 12.30 p.m., Dr. Archibald Edward Garrod, F.R.C.P., F.R.S., will deliver the address on Medicine.

On Thursday, July 30th, at 12.30 p.m., Sir John Bland-Sutton, F.R.C.S., will deliver the Address on Surgery.

On Friday, the popular Lecture will be delivered by Professor J. Arthur Thomson, M.A., LL.D.

The last three addresses will be delivered in the Marischal College. A number of excursions have been arranged to places of interest in the neighbourhood.

Society for Relief of Widows and Orphans of Medical Men.

At the recent Quarterly Court of the Directors of this Society nine gentlemen were elected members of the first class, and 4,000 were voted for the payment of the half-yearly grants to the widows and orphans. At the present time there are 45 widows and 13 orphans in receipt of grants. The invalid funds of the Society now amount to £130,000. Membership is open to any registered medical practitioner who, at the time of his election, is resident within a 20-mile radius of Charing Cross. The annual subscription is two guineas, special terms for life membership, which vary with the age of the member. Relief is only granted to the widows and orphans of deceased members. Since the last Court five letters had been received from widows of medical men asking for relief. It had to be refused as their husbands had not been members of the society. Further particulars and application forms for membership may be obtained from the Secretary at the offices of the Society, 11 Chandos Street, Cavendish Square, London, W.

Deputation on Forcible Feeding to the Home Secretary.

The following statement has been sent to us on behalf of the intended deputation —

Today, at 4 p.m., a deputation of medical men was waited on by Mr. McKenna by appointment to discuss the matter of forcible feeding of prisoners. The deputation consisted of Dr. McIntosh (chairman), Dr. Haden Guest, Sir Victor Horsley, Mr. C. Mansell Moulin, Mr. Frank Moxon, and Dr. H. Schultz, thus representing the medical profession.

When the deputation was introduced they asked that reporters should be admitted. Mr. McKenna refused, on the ground that names of prisoners might be men-
toned in the discussion. The deputation then retired and discussed the Home Secretary's objection. On returning, they pointed out to the Home Secretary that his objection was without any weight, and that the names of cases to which they intended to refer had already appeared with details in the public Press. Mr. McKenna still refused to admit reporters, and in answer to Dr. McIntosh further refused even to admit the deputation's own reporter. Mr. McKenna said he had arranged that an official reporter should be present in order that the (Home Secretary) should keep full control over any report that ought to be sent for publication. The deputation then explained to Mr. McKenna that they could not accept his refusal, that their position in this matter of forcible feeding was under their public responsibility, and that therefore they demanded they should be heard in public. Of course the deputation is ready at any time to place its views before the Home Secretary should he reconsider his refusal.

Sanatorium for Woman in Surrey.

It is announced that the Metropolitan Asylums Board have purchased 27 acres of land at Hyde Hill, two miles from Godalming, for the purpose of erecting a tuberculosis sanatorium for women. Accommodation is to be provided for 200 patients. The land lies near the Thames, and is in the heart of some of the finest Surrey scenery. The plans for the building are in course of preparation.

Another Anonymous Gift to Cardiff.

It is announced that a further gift of £10,000 has been made to Cardiff Medical School by the anonymous donor who has previously made donations equivalent to £90,000.

A New Hospital for Hastings.

The Duke of Richmond and Gordon, one of the Provincial Grand Masters, laid the foundation-stone of the new hospital at Hastings last week, with full Masonic ceremonies. The building is to cost £50,000, and is to be erected as a memorial to King Edward.

London Hospital Scholarships.

The following awards are announced at the London Hospital Medical School —

Price Entrance Scholarships, Science, £100, C. S. Cloake; Anatomy and Physiology, £22 10s., L. G. Jacob; Entrance Scholarship in Science, £50, A. D. Adler.

University of London.

At a meeting of the Senate held on July 12th, it was resolved, in response to a request from the Board of Control, to suggest the following conditions for the grants allotted to the Board by the Treasury for encouraging scientific research into the causes and treatment of mental diseases and mental defect:—(1) Individual grants to be made to a few observers who have been thoroughly trained and who are capable of carrying out scientific investigation; (2) no grant under the scheme to be made merely to maintain or assist pathological laboratories or to be given to persons for the purpose of routine work; (3) grants to be given only to advance the study of fundamental problems connected with insanity and mental deficiency; and to inform the Board that the Senate would be pleased to advise them as to the objects towards which investigations thus aided might with most advantage be directed.

University of Cambridge.

At a Congregation held on July 15th the following degrees were conferred:—

M.C. — W. S. Perrin, Caius.

M.B. and B.C.—P. Stocks, King's; H. P. Dawson, Trinity;

S. G. Askey, St. John's; T. L. Hardy, Selwyn.

M.B.—F. E. W. Rogers (by proxy), Emmanuel.

B.C.—H. Hartridge, King's; W. B. Gordon, Clare;
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W. F. R. Smith, Pembroke; J. W. Pigeon, Christ's; C. Mackenzie, Emmanuel; C. R. A. Thacker, Downing.

Royal Colleges of Physicians and Surgeons of Edinburgh and Royal Faculty of Physicians and Surgeons of Glasgow.

The quarterly examinations of the above Board, held in Edinburgh, were concluded on the 17th inst., with the following results:

First Examination.—The following candidates passed: Andrew J. Meck, Leslie Macduff, James Chambers, Percival C. H. Uomer, William V. Jackson, Blizard, L. Smith, Daniel St. Clair, Donald Vania and Edward L. Adendorff; and six passed in physiology, nine in biology, and four in chemistry.

Second Examination.—The following passed: John Black, William A. Mein, Frederick C. J. Mitchell, James H. Brown, David S. Byrne and Martha H. Houching; and two passed in anatomy and two in physiology.


Final Examination.—The following candidates, having passed the Final Examination, were admitted L.R.C.P. and L.R.C.P. and S.C.:

Joseph K. Venables, Kenneth G. Fraser, Thomas E. Lawson, David C. Graham, Robert M. Paterson, Reginald E. Illingworth, John M. Chrystie, Edward Blackburn, James A. Bannerman, and William Millicott, Jan M. Beyers, Walter Chapman, Frederick S. Bunting and Joseph V. Duffy; and five passed in medicine, three in surgery, three in midwifery, and 13 in medical jurisprudence.

Edinburgh University—Graduation Ceremonial.

On Thursday last, July 16th, the Principal Sir William Turner, Vice-Chancellor of the University of Edinburgh, conferred degrees on successful students as follows—Doctor of Medicine, 28; Bachelor of Medicine and Bachelor of Surgery, 155; Bachelor of Tropical Medicine were also awarded. The following is a list of the honours conferred, the names being given in alphabetical order.


** Indicate that the candidate has passed the examinations with first-class honours. *Indicates that the candidate has passed the examinations with second-class honours.

Edinburgh University—A Award of Fellowships, Scholarships, Prizes, &c.

At the annual graduation ceremony on Thursday last, the following were awarded:


The Cameron Prize in Practical Therapeutics.—To Professor Paul Erlich, Director of the Royal Institution for Practical Therapeutics, Frankfurt, for his discovery of salvarsan, and its valuable therapeutic effects in syphilis, and also for his researches on numerous synthetic organic compounds of arsenic and on immunity.

The Gunnion Victoria Jubilee Prize in Forensic Medicine.—Sydney A. Smith, M.D.

The Entles Scholarship.—Ralph C. L. Bachelor, M.A., M.B., Ch.B.

The Allan Fellowship in Clinical Medicine and Clinical Surgery.—Douglas J. Glen, M.B., Ch.B.

The McEoch Graduate's and Medical Bursaries.—Robert G. Bannister, M.B., Ch.B.

The Beaney Prize in Anatomy and Surgery.—Peter MacCallum, M.A., M.Sc., M.B., Ch.B.

The Monat Scholarship in the Practice of Physic.—Ralph C. L. Batchelor, M.A., M.B., Ch.B.

The Conan Doyle Prize.—Charles P. M. Jonsbert, M.B., Ch.B.

The Annandale Gold Medal in Clinical Surgery.—Ivan Keith-Falconer McLeod, M.B., Ch.B.

The Buchanan Scholarship in Gynaecology.—Peter MacCallum, M.A., M.Sc., M.B., Ch.B.

The James Scott Scholarship in Midwifery.—Andreas B. Theron, M.B., Ch.B.

The Dorothy Giffilhan Memorial Prize.—Gertrude M. A. Herzfeld, M.B., Ch.B.

The Wellcome Memorial Scholarship in History of Medicine.—Gold medal—Joseph Schneider; silver medal—William Everett.


The Wightman Scholarship in Medicine.—Robert G. Bannerman, M.A., M.B., Ch.B.

The Cunningham Memorial Medal in Anatomy.—Robert Walker.

The Whiteside Bruce Bursary.—Henry J. Parish.

Conjoint Examinations in Ireland.

The following candidates have passed the second professional examination by the Royal Colleges of Physicians and the Royal College of Surgeons, July 1914—

NOTICES TO CORRESPONDENTS &c.

SUBSCRIPTIONS.

Subscriptions may commence at any date, but the two volumes each year begin on January 1st and July 1st respectively. To reduce postage charges on our monthly issues, foreign subscriptions must be paid in advance. For India, Malay States, New Zealand, and Colonies, we are officially-appointed agents. Indian subscriptions are Rs. 15-12-0. Messrs. Daws and Sons are our special agents for Canada. For South Africa, Messrs. H. J. Robertson and Co., of Sydney and Melbourne, are our special agents for Australia.

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Small announcements of Practices, Assistantships, Vacancies, Books, etc.—Seven lines or under (70 words), 4s. 6d. per line (minimum 2s. 6d.).

Contributors are kindly requested to send their communications, if resident in England or the Colonies, to the Editor, 5, St. Stephen's Place, Westminster, London, S.W. 1; or, if resident in Ireland or to the Dublin office, in order to save time in forwarding from office to office. When sending subscriptions to the Dublin office, the name and address of the person paying should be as applied to the Publisher.

Original Articles on Letters intended for publication should be addressed to the Editor. Each letter is read by at least one of the Editors, and no communication is accepted until it is authenticated with the name and address of the writer, not necessarily for publication, but as evidence of identity.

Patrons.—Reprints of articles appearing in this Journal can be had at a reduced rate, providing authors give notice to the publisher or printer before the type has been distributed. This should be done when returning proofs.

NOTICES TO CORRESPONDENTS.

Correspondents requiring a reply in this column are particularly requested to make use of a distinctive signature or initial, and to give the practice of, signing themselves privately by the name and address of the "Old Subscriber," etc. Much conclusion will be spared by attention to this rule.

Haline Dispensary, Dale Street, Stretford Road, Manchester, Honorary Secretary £100 per annum, with apartments, attendance, coal, and gas. Applications to Honorary Medical Secretary, 60, Farnham Crescent, Salford. 

Falkland Islands.—Assistant Colonial Surgeon. Salary £100 per annum; private practice allowed. Applications to the Assistant Private Secretary, Colonial Office, Bowring Street, W. R. Rockdale, Infirmary and Dispensary—Senior House Surgeon. Salary £125 per annum, with board, residence, and laundry. Applications to Mr. T. Elyea, Kershaw, 11, Bowring Street, Manchester. 

Manchester Northern Hospital for Women and Children, Park Place, Manchester.—Assistant Matron. Salary £100 per annum, with apartments and board. Applications to Mr. Hubert Tooney, Secretary, 39 Barton Arcade, Manchester, Wrexham Infirmary.—Resident House Surgeon. Salary £120 per annum, with board, lodging, and washing. Applications to Frank Nixon, Secretary, 7 Hill Street, Wrexham. 

Ingham Infirmary and South Shields and Westoe Dispensary.—Junior House Surgeon. Salary £115 per annum, with residence, board, washing, laundry, and wages from John Potter, Secretary, Ingham Infirmary, South Shields.

Appointments.

Baird, T. MAINIE, M.D., F.R.S., Munich, Honorary Surgeon to the Manchester Royal Eye Hospital.

Crane, F., M.B., B.S.R.U., Medical Officer of Health to the Llandudno Corporation.

Hewell, James B., L.R.C.P. Lond., M.R.C.S., Medical Officer of Health for Hammersmith.

MacGregor, A. C. M.D., C.M., Edin., Chief Assistant in the Electrical Department at St. Bartholomew's Hospital.

Menzies, W., M.R. I., Surgeon and Demonstrator of Anatomy at Guy's Hospital Medical School.

Rip, J. A., M.B., B.S., London, Medical Registrar to Guy's Hospital Medical School.

Stinson, E. Gerald, M.S., Londo., F.R.C.S.Eng., Assistant Surgeon to the Brecon Infirmary, Brecon.

Toon, A. H., M.B., B.S., Lond., Surgical Registrar and Demonstrator at Guy's Hospital Medical School.

Walker, John, M.D., Ch. Ch., Royal College of Surgeons, under the Factory and Workshop Acts for the Caithness District of the County of York.

Lithis.

Lockwood.—On July 12th, at 19 Upper Berkeley Street, Portman Square, W., to Charles Barrett and Edie Lockwood—a daughter.

McCardie.—On July 12th, at 39 Frederick Road, Edgbaston, Birmingham, the wife of Dr. W. J. McCardie, of a son.

Zoan.—On July 12th, at 27 Carlton House, the wife of Arthur Zoan, M.B., B.S., Lond., late I.M.S., of a son.

Marriages.

Curtis.—Butlin-Brown.—On July 7th, at Fushing Church, the Rev. John Curtis, B.D., to Eda Stanley Butlin-Brown, M.B., B.S., of London.

Davis-Jennings.—On July 7th, at St. Paul's Church, Kingston Hill, Herbert Ross Davies, M.D., of Kingston-on-Thames, to Miss Mabel Sue Ross of Southwark, to Eleanor Alice, only daughter of Mr. and Mrs. W. C. Ross, of the late James Puckle, Hampstead.

Ellison-Puckle.—On July 7th, at St. Peter's, Belgravia, Frank Ellison, M.D., seventh son of the Very Rev. Dean Ellison, late of the Church of England, to Miss Agnes Puckle and Mrs. Puckle, Hampstead.

Fletcher.—On July 7th, at the Parish Church, Arbery, Isle of Man, Robert Myksterley Fere, M.D., M.S., D.P.H., of Castletown, to Dorothy, daughter of George and Edith Parker, of Ballaugh, Castletown, Isle of Man.

Deaths.

Barry.—On July 9th, Lieut.-Colonel D. P. Barry, I.M.S., of the Royal Medical and Surgical, Lucknow, India, aged 72, in India.

Mason.—On July 9th, at 2 York Road, Birmingham, Hugh Herbert Mason, M.R.C.S., aged 66, late of Barking, Essex.

Petts.—On July 9th, of 4 Parkside Gardens, Yvonne, only daughter of Mr. and Mrs. W. G. Petts, late of Bermondsey, to Eleanor Rose, youngest daughter of the late James Puckle, Hampstead.

Benn.—On July 12th, in Aberdeen, Alexander Eith, M.D., aged 74.


Williams.—On July 16th, at The Cottage, Tealforth, Hubert Williams, L.R.C.P. Edin., aged 80.

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**THE MEDICAL PRESS AND CIRCULAR.**

"SALUS POPULI SUPREMA LEX"

**NOTES AND COMMENTS.**

**WEDNESDAY, JULY 29, 1914.**

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**No. 5.**

**A Death from Glanders.**

As interesting tragedy has recently been enacted in a Nottingham colliery village. One of the coal-workers, a man 33 years of age, was taken ill with an acute malady that suggested sunstroke. His fever abated; pains came on in the shoulder and nape of the neck, and after a week, pneumonic symptoms of an asthmic type. An inflammation followed, and appeared in the man’s ankle, and this was followed by an eruption of blebs in various parts of the body. Before death he was seen by a consultant physician, but no positive diagnosis was arrived at. It was only some days after his death that the medical attendant was led to connect the illness with a serious outbreak of glanders amongst the ponies in the pit where deceased worked. It is most interesting to note that neither the colliery surgeon nor the consultant had ever seen a case of human glanders, a fact that affords convincing and satisfactory evidence of the extreme rarity of the disease. Not many years ago the disease was endemic throughout the United Kingdom, and the textbooks of the last generation contained minute accounts of various manifestations. Some five or six years ago a fatal case occurred in London, and others are reported from time to time. Fortunately we have in malaihin a conclusive test as to whether a horse is or is not affected by glanders, so that it is possible to weed affected horses out of any suspected stable.

**Bacillus mallei** as the causative organism of glanders, although it has not so far led to the discovery of a remedy against the disease in man, has provided a diagnostic test in horses. As years go by it may be assumed that all the infectious diseases which now attack mankind will become so rare as to be more or less unrecognisable by medical men, as now actually happens not infrequently in the case of small-pox, typhus fever and plague.

**A Boxer’s Death.**

On the 23rd a boxing contest took place at Maidenhead Hippodrome, when the chief event was a fight for a purse of £25, between Private Eggleston, late of the Royal Berks Regiment, and Bill England, a Reading light-weight. Eggleston, the challenger, is thirty years of age, being eight years older and several inches taller than his opponent. From the first round he had the best of the fight, if, indeed, the contest is worthy of so one-sided an affair. England was advised by his seconds to give up at the end of the second round, but refused to do so. Half-way through he was so distressed and punished that Dr. Ellis, who was in the audience, appealed to the referee to stop the fight. On three occasions England had been almost counted out. The fight was stopped and the boxers shook hands and left the ring unassisted. Later, England became unconscious in his dressing room and died some hours after his removal to the local cottage hospital. Post-mortem he was found to have died of haemorrhage of the brain and to have sustained a fracture of the temporal bone. At the subsequent inquest the jury censured the referee for not having stopped the contest sooner. That view will doubtless be widely endorsed amongst sporting men, but a large section of the public outside that curious relic of barbarous times will go a good deal further, and assert that the whole conduct of these "boxing" matches should be rigorously reformed, or that they should be altogether abolished. The result in England’s case shows that the gloves offer but a flimsy disguise for what is really the old-fashioned prize fight. The palglist of a couple of generations back could not hope to do more than kill his man. Why do not boxers insist upon properly padded gloves, instead of the murderous shams used in modern boxing-matches?

**As an ingenious theory was spun at the recent Conference of the Royal Institute of Public Health at Edinburg**

**Town-bred versus Country-bred Workmen.**

He contrasted the figures of the height and weight of 2,740 men reared in industrial centres at indoor occupations with those of 440 navies, iron workers and salmon fishers who had been born and bred in country districts. As the
LEADING ARTICLES.

SECRET REMEDIES.

The evil wrought by unqualified medical practice is so vast and, indeed, so incalculable that any check to its operations is a matter of deep satisfac-
tion to thinking men interested in the welfare of the community. Some time ago the British Medical Association published a book under the title of "Secret Remedies," criticising the composition, the claims, the therapeutic and commercial value and other interesting details of and concerning a number of largely advertised nostrums. The work ran through several editions rapidly and it has undoubtedly been a thorn in the side of the patent medicine owners, for it has educated the public as to the worthlessness, absolute or relative, of the many preparations foisted upon them with a wealth of exaggerated phrase, if not of brazen and lying effrontery. By reason of its fearless statements the book "Secret Remedies" exposed its authors to legal attack from a whole swarm of nostrum vendors. As a matter of fact, however, if we remember aright, only one of them sought the vindication of the law courts. The plaintiff in that case was Mr. Charles Stevens, the managing director of a company formed for the sale of a specific for the cure of consumption. In a first trial brought against the British Medical Association for the recovery of damages for libel, the jury did not agree and the suit was dismissed. The analysis published by defendant gave krameria as an ingredient, a substance that Stevens declared was not contained in his preparation, the active or curative virtues of which lay in a certain root called umelalo, which plaintiff had discovered in South Africa as a cure for consumption. Some time after the unsatisfactory termination of the first trial a second took place last week, with the happy result that judgment was entered for the defendant Association, with costs of both trials. The case was heard at great length, but only a few of its many points of interest can be considered here. The plaintiff said that he had made £1,000 per month from the sale of his "cure" in Capetown. He was prosecuted for doing such things as belonged to the medical profession and was fined £10 in the first case and £25 in the second. After these prosecutions he set up business in the United Kingdom, where by a grotesque anomaly characteristic of our imperial legislation he was safe from prosecution. The exposure that was effected speedily and effectively in our colony could be brought about in our own country only at enormous cost incurred by a public-spirited professional association. No better illustration of the farcical state of British law with regard to the sale of secret remedies could be desired. Some of the medical testimonials published by plaintiff illustrate the necessity for drastic changes in the law. One, for instance was from a man not on The Register, but who was none the less debarred from advertising his opinions under the description "M.D." on a medical matter. It may be pointed out, by the way, that under existing law it is more than probable that the Royal College of Physicians could have seized and destroyed the whole of Mr. Stevens's stock of so-called "remedies." Anyway, it is a scandal to our national commonsense that
medically untrained persons should be permitted to amass huge fortunes by professing to cure disease by means that are, scientifically speaking, often nothing more than worthless impostures. Much more might be said about this interesting libel action, which marks an epoch in the history of the statutory campaign that King Henry VIII. inaugurated against "false remedies and false potions."

One last comment we have to make arises from the rumour that it is possible, in the failure of the plaintiff to pay costs, that the whole expenses of the two suits may fall upon the members of the British Medical Association, the resources of which have been seriously drained by legal expenditure during the past few years. Whatever may happen in the present instance it is a gross defect in administrative law that anyone should be able to bring actions for libel without any possible prospect, in the event of non-success, of paying the expenses of what is to all intents and purposes that bugbear of society, a speculative law-suit. The British Medical Association, whatever its faults in other directions, deserves the gratitude of the medical profession for its public-spirited action in the matter of "Secret Remedies."

THE PUBLIC AND UNLICENSED PRACTITIONERS.

In our present state of social enlightenment the fact that legally unqualified persons are allowed to discharge medical functions constitutes a standing reproach to our national prudence. It must be generally conceded that so intricate and responsible a science as that of medicine demands special education and experience from those who profess to offer its advantages to the community. Henry VIII. first recognised the necessity of State medical qualification whereby the public should be enabled to distinguish between the genuine practitioner and the charlatan. He bestowed large powers upon the London College of Physicians for the seizure of false medicines and for the punishment of false practitioners. Some of these provisions were strengthened in subsequent reigns, and, so far as the state of affairs is concerned in the present day, they occupy the position of un repealed laws. There is reason to believe that were the Royal College of Physicians of London to exercise its powers, it would be able to purge the metropolis, if not the major part of England, of a large proportion of its quacks and quackery. So far as the art of surgery is concerned, a famous Act of Henry VIII. (anno xxxv. Hy. VIII.), which established the conjoint Company of the Barbers and Surgeons of London, contained an unfortunate exception, which to the present day provides a loophole through which many an offender escapes. The clause setting forth this exception, on the authority of Christopher Merritt, Fellow and Censor of the London College of Physicians, writing in 1660, runs as follows:—

"Be it ordained, established, and enacted by the authority of the present Parliament, that all time from henceforth it shall be lawful for every person being the King's subject, having knowledge and experience of the nature of herbs, roots, and waters, or of the operation of the same by experience or practise within any part of the Realme of England, or within any other of the King's Dominions, to practise, use and minister in or to any outward sore, unsafe, wound, opisthumacioue, outward swelling; or disease, any herb or herbs, oynments, bathes, pulites, and emplasties, according to their cunning, experience and knowledge in any of the diseases, sores and maladies aforesaid and are otherwise into the same, or drinks for the stone, or strangury, or ague, without such vexation, trouble, penalty or loss of their goods. The forsaid statute in the forsaid third year of the King's most gracious reign, or any other Act, ordinance or statute to the contrary hereof, heretofore made, or in any wise notwithstanding." To this exception was appended a momentous condition that appears to have escaped notice in many prosecutions where the above clause has been pleaded in defence. The Act provided that the exception applied only to those who gave their help without fees for their "pains and cunning, but have ministered the same to poor people only for neighbourly and God's sake, and of pity and charity." This point about payment has led to many evasions, which might perhaps have been not infrequently brushed aside by a prosecutor armed with the necessary determination and resources. The whole question cannot, of course, be entered into here, but it may be stated briefly that, in the existing law, there are wide powers for the suppression of quacks and quackery. The obstacle to their application lies chiefly in the lack of a prosecuting body. The Royal Colleges have betrayed their trust: the comparatively modern General Medical Council is too wound up in its own narrow field to seek to extend its penal powers to the prosecution of unqualified practice—although, be it noted, such powers, even if they do not actually exist, could be readily obtained. A curious apathy, indeed, appears to ensnare the question which was handled so boldly by bluff King Hal some four hundred years ago. Even the Select Committee of inquiry into the proprietary medicines has strangely neglected the historical side of the problem, which is none the less vital to its proper understanding. Clearly, some drastic revision of the situation is needed in order to defend the health of the people from the snares of reckless and ignorant quackery.

CURRENT TOPICS.

The Prince of Physicians.

At a recent meeting of the Section of the History of Medicine of the Royal Society of Medicine, Sir William Osler put forward a plea for the restoration of the tomb of Avicenna at Hamadan, which is in ruins. He also broached the subject at a meeting of the Persia Society the other day, when
Professor Margoliouth delivered a striking address upon the celebrated tenth-century Arabian physician. Born near Bohkara in 980, it is said that at the age of eighteen he had learned all the science of a physician. It is not a little remarkable that the philosophy, metaphysics and science of this Persian "Prince of Physicians" should dominate the intellectual life of Islam for four hundred years as a consequence of the Aristotelian and Platonic systems. His principal work, the "Canon of Medicine," controlled for close on half a millennium the principal medical schools of Europe. It was written in Arabic and was early translated into Latin. In addition to this monumental work Alivccba also wrote a hundred large formulae dealing with various philosophical and scientific subjects. The proposal that the Persia Society should undertake the repair of his tomb seems to be a most fitting one, and it is not unlikely that the Section of the History of Medicine of the Royal Society of Medicine might be willing, together with the corresponding French Society, to contribute towards this worthy object. It is understood that the official permission of the Persian Government has been received and that a sum of £600 is needed towards the restoration and upkeep of the tomb of the "Prince of Physicians."

The Vice of Versatility.

The commonalty of mankind can grasp but one idea at a time, and it is duly suspicious of those who can do otherwise. It views any tendency to catholicity of temperament with undisguised misgiving, and loves the man with the label. This primitive and unfortunate fact especially affects the medical profession. A man is labelled "doctor," and there he ends. People know that he is a doctor and that he cannot be anything else. If he tries to be something in addition he cannot be a really good doctor. In the eighteenth century there were men who could fairly encompass the sum of human knowledge. Now we specialise. And just as we are beginning to see that undiluted specialization is not the ideal of human activity, confidence in its infallibility has permanently permeated the popular pericranium. Anyone who has escaped his label is distrusted. Weir Mitchell was branded as a neurologist and had to live down a subsequent reputation for literary efficiency. There are many medical men who would stray out of their grooves, and they dare, but they know the penalty. An observer's understanding is limited by his attainments, and so the man in the street misjudges. He thinks that the man of outside abilities cannot be much good at his profession and forgets that men may toil upward in the night while their companions sleep. The wings of genius, instead of bearing men aloft, often encumber them on the earth. Once, a man is classified and marked by the world he progresses at his peril. These people who will not stop growing are nuisances. They develop new characters and embarrass their fellow-men. The world in general does not think more than is absolutely necessary, and labels save thought. That is why they are so popular. Their influence is had all the same. A mind, blind, crammed, confused by other people's limitations is of less value even than one which negatives its efforts by the multiplicity of its exercises.

Workmen's Compensation and Medical Science.

The Workmen's Compensation Acts have presented many a knotty problem to the law courts. In that way they have achieved a good deal by way of educating the public and the legal profession, and of drawing the attention of medical men to various scientific points of more or less obscurity. Not long ago a case was reported in which a workman claimed permanent compensation on the ground that, while laid up as the result of an accident, he had grown so fat as to be unable to follow his occupation. His ingenious claim was unsuccessful in court. Last week a more plausible claim was tried by the Alfreton County Court Judge. A miner was certified in May, 1912, to be suffering from miner's nystagmus, and was awarded 148 per week compensation, payment of which was continued until January 28th, 1914. It appeared from the medical evidence that after a time the plaintiff's mental condition underwent serious changes—he became morose, and developed symptoms first of neurasthenia and later of melancholia. The question raised was whether the insanity arose out of the nystagmus. A good deal of evidence was forthcoming, but the judge eventually dismissed the application. Most medical men will agree with the view that there is no connection between nystagmus and insanity. From a scientific point of view a great deal of valuable material is wasted in the County Courts, where the conflict of medical testimony is the more or less necessary. All such evidence should be presented, in our opinion, as the report of an official body of investigation.

Dogs and Tramcars.

In the midst of a mass of padding in the daily papers about the Irish question and the cricket championship, and such like matters of high politics, there is still room for the things that move humanity, the straws that show which way the wind blows, the unsophisticated outpourings of the human heart, the letters to the Editor. And the subject is dogs. Should dogs ride in tramcars? If not, why not, and if so, why? Municipalities and powers differ. Some welcome our dumb companions as personal luggage, others charge him a penny—these latter mostly in Scotland, where they even refer the traveller to the book of Proverbs in the hope of encouraging him to proper tramcar behaviour. The money is not much, but it makes the dog go. Dogs, looked at in the light of tram travellers, have two points of view—scientific and sentimental. The standard is determined by the ownership or non-ownership of a canine companion. Sentiment begs his dog to be loved as himself, and to share the other collateral privileges of a freethorn Briton. Science points out a pullicose polyvarious pest, a purveyor of plagues and promiscuous propagator of pulking pups. And that is the view we should take up. We are under a canine tyranny of sentiment. Our own life is perfect, and to get other people to admit it we must grant the same to theirs. We are all slaves to a conspiracy of canine content. We know that the dogs in the street do not improve the edibles so recklessly displiced on the ground level. Yet we tolerate them. We know that dogs may carry disease—they are proverbially unclean—but because they are our personal parasites we suffer all manner of ills for their sake. All for sentiment—the great unreasoning power of reaction—the brake on the progressing world. We know it is unworthy of us, but we suffer it for the sake of flattery. The dog is the only animal that has found a god, and deity is not our everyday estate.

The Treatment of Early Mental Disease.

The change in our attitude with regard to the management of the insane, which is so striking a feature of modern medical opinion, reflects itself in
a noteworthy manner in the deputation which waited upon the President of the Local Government Board the other day. The object of the deputation was the presentation of a memorial, signed by many leading members of the medical profession and by numerous Members of Parliament, asking the Board to enable and encourage local authorities to supply and establish homes for the treatment of cases of temporary or incipient insanity. The need for such homes has long been felt for patients not demanding certificacy, for entrance into them would be purely voluntary and without compulsion. It was urged that these institutions should not be regarded as half-way houses to asylums, and that in order to encourage the public to come to them for early treatment, they should be kept outside the jurisdiction of the Board of Control under the Mental Deficiency Act. Emphasis was laid upon the alarming accumulation of the registered insane in the asylums, and it was stated that as insanity was not being checked by the present methods, it was necessary to attack the causes of early mental instability. The preventive measures proposed would not only be a great gain to the community, but would reduce the expenditure on costly asylum accommodation, which was such a heavy burden on the rates. As Dr. Chapple pointed out, the idea that insanity is a mental disease, and therefore to be treated in hospitals for the purpose, should be popularised. It is gratifying to note that Mr. Samuel, in replying to the deputation, proposed to ask the medical department of the Local Government Board to make a special study of this problem, to inquire into the experience of similar action which had been taken in Scotland, which appears to work so well, and to get into touch with the Board of Control with a view to his taking administrative action. If fresh legislation in the matter be not possible at the present juncture, the administrative machinery of the Board may be so altered, therefore, to be set in motion in the near future.

**Dublin Water Supply.**

Most of the world's distress is, in our opinion, due to lack of imagination, and the rest of it is due to a failure to realise in action those imaginings on which safety and progress depend. The case of the intelligent man does not get away from the idea that what is will continue, and that men picture themselves in other circumstances than those in which they are. Man is not a reasoning being; or, if he reasons, he gets no farther than the statement of premises—he shies like a nervous filly at the only logical conclusion. He does not believe in logic. He may even state his logical opinion in correct terms, but he does not believe what he is saying. People believe only what they do, there is no action divorced from belief. Belief is not an independent mental process, it is action. There is always a mental reservation in the mind of a man who says he believes this course would be the better but who takes the other course. He thinks in his heart that the other course is the better, perhaps because the stars in their courses will fight daily in the sky, because effect does not always follow cause in his experience. Any individual in Dublin will say that the water supply must be conserved, and that a daily consumption of 14,000,000 gallons at present will bring a drought, yet the collective mind does not see why any action should be taken, for 14,000,000 gallons are being consumed daily in spite of repeated warnings issued by the city engineer and by the engineer in charge of the water supply. The necessity for conserving the supply has never been greater since the drought of 1893; everybody talks, nobody does. There is more faith on earth than preachers dream of.

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**PERSONAL.**

Dr. W. D. MURRAY has been elected President of the South-West London Medical Society for the ensuing year.

Dr. G. FLEMING, M.B., C.M., M.R.C.P. Edin., has been appointed Medical Superintendent to the Darum County Sanatorium.

Dr. F. W. CRAIG has been appointed Medical Superintendent Officer of Health, and also Tuberculosis Officer, for the city of Derry.

Dr. KNOWLES BONNEY, M.D., was presented with the Savill Memorial Medal last week at the West End Hospital for Diseases of the Nervous System.

Mr. M. W. B. OLIVER, M.A., M.B., B.C. Cantab., F.R.C.S. Eng., has been appointed Assistant Ophthalmic Surgeon to the Miller General Hospital.

The following medical practitioners in Hull have been placed upon the Commission of the Peace for the city—Dr.s. Frank Nicholson, George Gaultby, and Mr. C. H. Milburn.

Dr. ALEXANDER H. MACKLIN, Senior Surgeon to the Blackburn Infirmary, has been appointed as one of the surgeons in Sir Ernest Shackleton's forthcoming Polar Expedition.

Sir RONALD ROSS, K.C.V.O., F.R.S., will deliver the biennial Huxley Lecture at Charing Cross Hospital Medical School upon the occasion of the opening of the winter session thereon on October 1st.

A complimentary dinner was given the other day at Oxford to Mr. Horatio P. Symonds, Senior Surgeon to the Radcliffe Infirmary, upon the occasion of the presentation to that institution of a portrait sketch by Mr. J. S. Sargent, R.A.

Dr. AND MRS. SCELROCK, of Trededgar, were the recipients lately of a handsome presentation from their many friends and patients in the George-town district as a token of the respect and esteem in which they are held by all classes.

Dr. JOSEPH GESANI, of Cork, was presented the other day with a handsomely illuminated address and a silver tea set by the Grand Order of Israel (Sion Lodge) in token of his valuable services rendered to the society for a period of over 25 years.

A presentation of a Belize two-seater motor-car was made on the 14th inst. to Dr. Enyr P. Price, of bangor, in recognition of his services to the North Wales Branch of the British Medical Association, particularly in connection with the National Insurance Act.

Dr. J. MATHESON LAWRIE, the Medical Superintendent of the Princess Christian Hospital and Sanatorium at Weymouth, was presented last week with his portrait in appreciation of his services. Mrs. Lawrie was presented at the same time with a service of plate.

Dr. THOMAS CUNNINGHAM PENFOLD, M.B., Edin., D.P.H., Medical Officer of Health for the Hexham rural district and for the Prudhoe urban district, has been appointed to succeed Dr. J. Finlay Macdonald as Medical Officer of Health for the Auckland rural district.

Dr. JAMES NIVEN, LL.D., M.B., Medical Officer of Health for Manchester, was the recipient last week of the gold medal awarded annually by the Council of the Royal Institute of Public Health to a public health official "in recognition of conspicuous services rendered to the cause of preventive medicine within the British Empire," more especially in connection with his work in the direction of the prevention of tuberculosis.
MEDICAL practitioners are often consulted on the subject of corpulence, as the inconvenience is obvious, and the late K. A. Proctor, the well-known writer and lecturer on astronomy, graphically described his own condition as being like that of a man who was wearing three overcoats with the pockets loaded with stones. Yet in spite of their sufferings comparatively few are willing to persist in the regimen necessary not only to reduce their weight, but to maintain it at a proper level. They are content to follow a course of diet for a few weeks, and they get off a few pounds either by visiting a German watering place or by following the directions of a medical adviser at home, but after a longer or shorter time they fall back into their former habits and speedily regain the weight lost.

It is usual to divide these cases into two great classes, the plethoric and the anemic, and these correspond to clinical conditions that can be readily recognised.

The plethoric type consists usually of well-grown, well-developed persons who enjoy the best of health and are often active and vigorous, by no means disinclined to take exercise, and frequently decidedly athletic and good at games. The tendency to corpulence usually shows itself soon after thirty, or even before, and increases with age. They generally suffer from akoria—that is to say, the excessive appetite which results from absence of the feeling of satiety, so that without being especially hungry they eat an unnecessarily large amount of food. This condition is usually hereditary, a family history of obesity being discoverable in something like two-thirds of the cases; and it is often also associated with a family history of gout, renal colic or gall stones. They are decidedly eupetic individuals, who enjoy life, and at least up to middle age possess the best of health, but after passing forty they begin to manifest such disorders as acute gout in the great toe or in some other joint, or albuminuria or glycosuria. In the latter half of life they frequently develop Bright's disease or diabetes, and on the whole we may regard this form of obesity as a condition by no means favourable to longevity; they die at or soon after sixty as a rule. The type is fairly equally distributed between the sexes.

The anemic type of obesity is more common in women than in men. It may be induced by anything that causes ill-health, supervening not uncommonly after a serious illness, such as typhoid fever. The subjects of this form of obesity, unlike the former class, are not, and do not look, as if they were in good health. They are pale, flabby, and disinclined in their appetites, and they suffer from minor ailments, such as constipation, dyspepsia, headaches, menstrual irregularities, or catarrhs, but they are less prone to develop the graver constitutional forms of disease met with in the plethoric group.

The aetiology of the two groups is essentially different; in the former there is merely an exaggeration of normal metabolic processes, a sort of excess of what happens in all healthy persons. The formation of fat is a physiological process which is more marked under certain conditions. The young girl at puberty normally puts on a layer of fat which rounds her form and conduces to the beauty of her figure at that time of life, while boys at the same age are thin, and remain so for another ten years. Bouchard showed that at the age of seventeen the consumption of carbohydrate to the pound of body-weight is 54 grs.; while at the age of twenty-five it falls to 42, the balance of unconserved carbohydrate being usually stored up as fat. After this age there is a progressive failure in sugar consumption associated with a gradually increased weight, so that at the age of sixty the sugar consumption falls to 38 grs. per lb., and although these figures are of course subject to individual variations they illustrate the general rule that after thirty most people tend to accumulate fat. The extent to which they do this doubtless depends upon their habits, as to, on the one hand, the amount of exercise taken, and on the other the amount of food consumed. Rubner's scale is generally accepted as expressing the requirements of the normal body; a man doing a moderate amount of work requires 41 heat units for each kilogram. (2 lbs.) of bodyweight, so that a person weighing 70 kilorgms. (to st.) would require daily about 3,000 heat units; but this quantity is easily exceeded. For example, beer readily supplies a large amount of nutrition, in round figures about 400 heat units or great calories to the pint, so that it is not surprising that those who not only live well in the matter of food, but drink in addition two or three pints of beer daily, accumulate a large amount of fat. It is not only beer that is fattening from its combination of carbohydrate with alcohol, for even sugar whiskies give 155 heat units to the ounce. Obviously it is easier to take an additional 1,000 heat units in the shape of beer than in the form of whisky, for while two and a half pints of beer would be regarded by most persons as a strictly moderate allowance, a daily dose of half a pint of whisky would be generally considered to verge on intemperance. Although fat supplies by far the largest amount of heat units it is rarely to be blamed for producing corpulence amongst English people, as their taste for this article of food is limited. It is generally to over-indulgence in carbohydrates that corpulence must be attributed, and these are chiefly eaten as bread. Most stout people are great bread eaters, and if bread is eaten with butter its effect is the more likely to be pronounced. As already stated, these people live vigorously; if they are hearty eaters they, as a rule, lead by no means sedentary lives, but take a fair share of exercise; in fact, they sometimes complain that the more exercise they take the more they eat and the stouter they grow.

If this is a correct account of the causation of these cases the principles of treatment are simple. All we have to do is to reduce the number of heat units consumed daily. The diet must be restricted according to scale, allowing, for example, 50 heat units per kilogram of body-weight, but we must bear
in mind that in the case of an obese person we cannot allow them to reckon their actual weight, but the diet must be based upon what they ought to weigh. The French have a simple known as Quetelet’s, which allows for every cm. over 1 m. in height 1 kilogram of bodyweight, but as we do not use these convenient weights and measures we may prepare a scale for ourselves something like the following:—

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Having measured the patient’s height and deduced his proper weight, we may allow a dietary giving 30 heat units per kilogram of bodyweight as the maximum, and this should be reduced month by month until the patient is getting instead of 1 meal that unit daily 1,500, or even less, but the effect of the diet must be watched, and something must depend upon the patient’s mode of life, for if compelled to be fairly active it is not possible to reduce the food in the same way as where he can be kept at rest. Thus in a case recorded by Delboeuf the patient, who weighed 234 lbs. (his height is not given), was kept on bread and his diet at first consisted of two quarts of milk daily, equal to 1,400 heat units; this was reduced to one and a half quarts, then to one quart, and finally to less than a quart daily, upon which diet at the end of seven months the patient had lost altogether 54 lbs., and was reported to be in perfect health. Such a regimen is obviously only possible under exceptional circumstances. The man had been unable to work, and was content to be admitted to a hospital where the treatment was carried out without any consideration for its duration, nor does there seem to have been any difficulty in persuading the patient to submit to a monotonous regimen which was almost equivalent to starvation. Most of our patients insist upon the use of food, and it is the duty of the physician to afford them this in any arrangements he may make for them. If we consult a diet table which should give the value of all ordinary articles of food in their contents of protein, fat and carbohydrates, and their calorific value, it will be found that it is easy to construct a diet which is made up of a variety of vegetables and fruit, cutting down the carbohydrates and fat, and allowing a reasonable quantity of animal food, so that without exceeding 2,000 heat units daily a sufficiently palatable dietary may be prepared. But it must be remembered that the ordinary British palate cares little for fruit and vegetables, and that the British housewife or plain cook possesses little skill in their preparation so that success depends in no small degree upon our ability to enlist the cooperation of not only the patient, but of his cook.

The following diet table is constructed to allow about 2,000 heat units, and will permit of being reduced 500 or so for the sickly and thin. Pre- tene biscuits for the brown bread at breakfast and tea:—

**Table I.**

This diet contains, roughly, about 2,000 heat units.

**Breakfast.**—Tea or coffee without milk, cream, or sugar; a slice of lemon or saccharine may be used if desired; half a Brusson Jeune roll or a piece of Hunter and Parkinson’s biscuit, or 1 oz. of toast, with butter; 1 or 2 eggs; any lean meat, game or fish; any salad or fruit in season.

**Luncheon.**—No soup; one dish of lean meat, poultry, game, or fish, with salad or green vegetable or 1 lb. of potato, artichokes, or peas; an omelette or stewed fruit of any kind sweetened with saccharine; a slice of bread and a piece of chocolate biscuit; no butter; water or mineral water but no alcoholic drink; black coffee sweetened with saccharine.

**Tea.**—One or two cups of tea with a slice of lemon, but no milk, sugar, or cream; half a Brusson Jeune roll or 1 oz. of toast with butter.

**Dinner.**—The same diet as at luncheon; any fruit at dessert; black coffee sweetened with saccharine.

**Table II.**

This dietary contains, roughly, about 1,500 heat units; without the whisky about 1,400; without potato, butter, or cheese about 1,100; without bread or toast 900.

**Breakfast.**—A breakfast dish of tea or coffee with 1 oz. milk, no sugar; 3 oz. brown bread, toasted, no butter; 3 oz. white fish—sole, haddock, cod; 1 egg; or alternatively 2 oz. lean ham; lettuce, watercress, or a tomato.

**Lunch.**—Six oz. lean beef or mutton; 3 oz. potato; 3 oz. cheese; Prolacto biscuits; 1 oz. whisky with water or mineral water.

**Tea.**—Tea with 1 oz. milk, no sugar; 2 oz. brown bread; 1 oz. fresh butter.

**Dinner.**—No soup; 3 oz. white fish with anchovy or Worcestersauce, but no butter; one small potato; 3 oz. mutton, veal, chicken, pigeon, turkey, pheasant, or partridge; cabbage, cauliflower, French beans; stewed fruit, sweetened with saccharine; savoury of fish or egg on a small piece of toast; 1 oz. whisky with water or mineral water; no other bread or toast, but one or two Prolacto or Proteine biscuits if desired.

It is probable that the anemic type of obesity depends largely upon the retention of chlorides and the consequent hydration of the tissues by Dr. H. Iscovestie on Hydration in Obesity. This is the property by which gelatine, membrane protoplasm, and similar tissues attract and retain water, and the amount of water so absorbed is very great, amounting to as much as five times the weight of the original sheet of gelatine used in the experiment. This process is affected by certain salts, being favoured by the chlorides of potassium, sodium, and ammonium, as well as by nitrate and sulphate of soda, while it is hindered by acetates and tartrates. In this connection it is interesting to remember that vinegar, citric acid, and citrates are popularly supposed to be remedies for obesity. Some of the advertised cures contain a certain proportion of bicarbonate and chloride of sodium, which would not favour the reducing process, as in fact Marcel Labbé has recorded a case of diabetes that became cedematous when taking 40 gms. (600 grs.) of bicarbonate of soda daily for a week. This form of obesity should be regarded therefore as a sort of cædoma and calls for treatment based upon the avoidance of liquids and of those articles of diet, especially those that result, which favour the retention of water. For such cases the Schroth diet as followed at Lindewiese might be tried in properly selected cases. This cure is not popular, as it calls
for a good deal of self-restraint. Each night the patient should sleep in a partial or complete cold wet pack, but where he objects strongly to the direct contact of the cold, the body may be wrapped in a thin dry sheet and then in the wet sheet, which is covered by a blanket and one or two eiderdowns.

The chief feature of the diet is the strict and absolute abstinence from all alcohol for a number of days. The amount which should extend from half a day to five or six days according to the case. A beginning may be made by abstinence from any liquid at the mid-day meal. The second point is the periodic use of wine as a drink, and upon this considerable stress is laid; it is believed that both the soups and the dinners should be sweetened as well as by its alcohol. No water may be drunk during the cure, indeed its use is said to be attended with danger, but in the early stages of treatment barley water or thin gruel or a cup of cocoa is allowed. The wine generally prescribed is a thin, light, rather acid country wine, either red or white; probably a low-priced still Moselle answers the purpose as well as it can be realised, if an attempt is made to carry out the cure in this country. The third point is the reduction of the amount of food, especially of the fats and proteins, while fruits, vegetables, and cereals may be eaten at discretion. Schroth is of the greatest stress upon the necessity of a thick diet of grains, especially in the patients living and sleeping as far as possible in the open air. At the commencement of the treatment breakfast should consist of two or three dry rolls or a cup of cocoa; at midday one or two tablespoonfuls of oatmeal porridge, rice or sog pudding, or under certain circumstances a small meal of bread or potatoes, and fruit compote, but nothing is allowed to drink; at night two or three rolls or bread and milk. During the first few days the patient may take a few mouthfuls of drink made with barley or oatmeal, lemon juice, and sugar, but later on this must be replaced by wine, which may be at first diluted with water and sweetened, but afterwards should be drunk absolutely pure. The quantity of wine may vary from 7 to 15 oz. daily. Liquids should be taken about four hours after food, but never at meals; with the liquid the patient may, if he desire, take a few mouthfuls of bread or biscuit. This stage of the treatment lasts from three to five days. In the stage of the second week, which should now be complete, is continued, while the food is restricted to five or six rolls daily, weighing altogether less than 3 oz., and being therefore equivalent to no more than 200 or 300 heat units, but under certain conditions the patient is allowed to take some boiled oatmeal or rice in the middle of the day, and after a course of dry days, which varies from one to four or five the patient is allowed to have one drinking day, and it is usual to begin by taking the wine warm. This stage lasts from three to five weeks, and it is then followed by a pause lasting five or ten days. Finally, the patient enters upon the third stage, which consists in a gradual return to normal conditions of life. Every case requires to be treated according to its special condition, and the method in line which could hardly be carried out satisfactorily away from Lindewiese, or in one or two special establishments in Germany, where the same principles are followed. It is not called a fasting cure, but it is an exceedingly low diet, comparable to the fasting methods that are popular in the British States, but differs chiefly in the restriction of liquids.

The advocates of the Schroth cure maintain that it not only differs in this respect from the simple fasting cure, but that it is much less dangerous, as the tissues are not completely starved, and the temporary restriction of liquids stimulates the vitality of the cells. It is said to be easy to carry out, calling for no apparatus which is not available in any ordinary household, as it is easier to give a wet pack than a bath, and this is especially the case with corpulent persons who are not easily moved. It is further said to increase the number of red blood corpuscles and to presage a permanent cure of anemia.

Myxedema is a form of obesity which has been definitely shown to be due to the deficient action of the thyroid gland. Although the patients take only a small amount of food they nevertheless gain weight, and there is a great analogy between such cases and many of the examples of anemic obesity in which the symptoms are commonly met with. In myxedema atrophy of the thyroid gland is a distinct feature, and in the absence of this symptom such a diagnosis would be doubtful, but it is quite probable that in many of these cases, though there may be no reduction in size, the function of the gland is depressed. This view is supported by the fact that the administration of thyroid gland has been found useful in many cases of obesity; this treatment, which was introduced more than twenty years ago, has been discredited by the abuse of the remedy by the over-large doses which patients took in their anxiety to produce a rapid effect; but there has been no failure on the part of experienced practitioners to introduce the treatment—a dose of 0.25 to 0.5 grains being used. The cure, which is doubtful, is the cure, is attended by a loss of weight.

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This diet contains about 1,500 heat units; it may be reduced by gradually omitting the roll or breakfast biscuits, which may be replaced by Protene biscuits.

**Breakfast.**—Fresh fish or fresh meat with any green vegetable; 2 Huntley and Palmer's breakfast biscuits, or half a Brusson Jeune roll; nothing to drink; no salt; 2 hours later half a pint of hot water with a slice of lemon in it.

**Dinner.**—Lean beef or mutton, chicken or white fish; any green vegetable or salad; any stewed fruit; 2 breakfast biscuits, or half a Brusson Jeune roll; no butter; nothing to drink; no salt; 2 hours later half a pint of hot water with a slice of lemon in it.

**No tea.**

**Dinner.**—No soup; any white fish; any meat, poultry, game, any green vegetables; any stewed fruit; savoury; 1 breakfast biscuit; no salt; nothing to drink.

If more bread substitutes are required a few Protene, Protaco, or Karali biscuits may be taken. Before going to bed half a pint of hot water with a teaspoonful of sodium phosphate should be sipped slowly.

**Karell's milk cure may be employed for the treatment of obesity, but as originally prescribed it is not very appetising. During the first week the patient gets every four hours a glass of skimmed milk from 2 to 7 oz. in amount, which in winter may be warm, and water or mineral water is allowed in addition. In the second and third weeks a little toasted white bread and a small portion of salt herring is added, and after one or two weeks of this regimen the milk at one meal during the day is omitted and soup is substituted. This treatment should be continued for five or six weeks, and the use of stewed prunes and baked
apples is allowed in order to overcome constipation. As this diet consists at most of a quart of milk a day the calorific value is very low, and the patient must be nearly starved. In Jacob's modification for the first week the patient is allowed 14 pints of milk daily, given in divided doses, and for the next few days is given an egg in the morning and a biscuit at night; then gradually two eggs, a little minced meat, vegetables and rice pudding are added. At the end of twelve days the patient returns to his ordinary diet, but the amount of liquid should not exceed 12 pints daily for the next few weeks.

Dr. Gulisch is to give very little food after the midday meal. Thus, for example, at breakfast the patient takes a cup of tea with bread and butter, and if he is so hungry that he cannot wait for lunch he may have an egg with a small slice of bread and butter at ten o'clock; at one o'clock the meal is composed of meat, vegetables, salad, and stewed fruit; tea time, coffee with a biscuit, or bread and butter; in the evening nothing but a small piece of bread and butter. It is important that the quantity of food at breakfast and luncheon should be sufficient to satisfy the patient. Under this regimen he claims that his patients lose regularly 1 or 2 lbs. a week.

The cases falling in the second class are undoubtedly more difficult to treat than those in the former group. They require much more supervision, and there is greater risk of doing harm instead of good by altering their mode of life. Changes in the diet should be made gradually; remedies should be prescribed with care, and their effects carefully watched; any complications should be sought out, and if possible removed, and the assistance of fresh air, especially of mountain or sea air, should be secured. As many of these patients are unable or disinclined to take active exercise, massage and passive exercises are extremely useful. In the present day in all large centres there is no difficulty in obtaining the services of well-trained operators who can carry out Swedish exercises, and at most watering places both at home and abroad there are institutions at which these can be obtained. An ingenious adaptation of faradism to produce the effect of general muscular exercise is the "Biocathode," which is in fact a large electrode, the patient being fastened by means of sandbags, and the current when turned on stimulating the contraction of all the muscles. From what I have seen of it its application does not appear to be unpleasant, and it is claimed to effect a rapid reduction in body weight, but it has been in use too short a time for a final opinion as to its value to be expressed.

Note.—A Clinical Lecture by a well-known teacher appears in each number of this Journal. The lecture for next week will be by Edmund Castley, M.D., Cantab., F.R.C.P., Lond., Senior Physician to the Metropolitan Hospital, and to the Belgrave Hospital for Children. Subject: "Abdominal Tuberculosis."

ORIGINAL PAPERS.

A CASE OF TUBERCULAR IODISM SIMULATING GUMMA OF THE EYELID.

By SYDNEY STEPHENSON, M.B., C.M.,
Edin R.C.S.,
Ophthalmic Surgeon to the Queen's Hospital for Children, King Edward's Memorial Hospital, etc.

GEORGE W., aged 30, attended my out-patients at the Kensington General Hospital for the first time on December 4th, 1907.

The following history was given by the patient—gonorrhea in November, 1906, lasting until March, 1907, that is to say, longer than any other gonorrhoea from which the patient has suffered. Towards the middle of March, 1907, a spot came out on the right knee, and was followed by others on the forehead, right forearm, left upper arm, and towards the end of that month, by "sores" upon the legs. In June or July last the patient's throat became ulcerated.

On August 14th the patient consulted Dr. David Walsh at the Kensington General Hospital. A diagnosis was made of tertiary syphilis. The notes which follow were transcribed from the patient's case-sheet:—"No sore throat or headaches. Primary sore last Easter. Treated with mercury since. Large crusty serpiginous syphilide on left thigh. Others have left pigmented superficial scars."

When I saw the patient on December 4th, 1907, his condition was as under:

The outer half of the left lower eyelid is red and swollen but not tender. At first sight, the appearances reminded one of an abscess in the substance of the eyelid. On palpation, however, it was obvious that the tissues of the lid were infiltrated, and the condition recalled a gummatous process. Another infiltrated area was present in the substance of the left cheek, one inch or so above the upper lip. Below the left jaw was a carnivorous look and a discharging pap by several fistulae. The right ear showed a scaly eruption, not unlike eczema. On the back of the scalp, situated over the occipital bone, was a crusted sore. A number of pigmented, supple, superficial cicatrizes, possibly the remains of cutaneous gummata, present over right knee, both legs, left thigh, left buttock, and right forearm.

The infiltrated lesions of the lower lid, cheek, etc., closely resembled gummata, but on reading Dr. Walsh's notes, it became quite clear that they represented that rare form of iodism known as "tubercular iodism."

Dr. Walsh's notes ran as follows.—The patient was treated locally with ammoniated mercury ointment and internally with potassium iodide (grs. 10) and citrate of iron and ammonia (grs. 10) thrice a day. His attendances at the Hospital were somewhat irregular, having been registered upon the following dates: August 28th, September 25th, October 19th, and November 16th. On the last-named date the potassium iodide was discontinued owing to the existence of "well-marked iodide papules face, etc."

The patient stated that a small swelling, an "iodic papule," had existed towards the centre of the left lower eyelid for about a fortnight, and that the swelling had become greater during the three days before he consulted me.

PROGRESS AND TREATMENT.

Boric lotion and oleate of mercury (10 per cent.) were prescribed to be applied to the affected lid.

December 11th, 1907.—The left lower eyelid is now tender, and the disease process has extended to the whole of that structure. There is definite ulceration of the upper aspect of the outer end of the swollen lid.

December 14th, 1907.—The outer half of the left lower lid is now ulcerated, and the rest of the lid is infiltrated. The parts are tender. The
likeness to a gumma becomes more and more pronounced. Sajodin, one gramme twice a day, administered internally, and the ulcerated surface to be treated with iodiform.

December 18th, 1907.—Condition, as shown in the coloured sketch, has improved. The left lower lid is occupied by a reddish swelling, more marked in the outer half than elsewhere, and the parts are slightly tender. A shallow ulcer, with clean-cut non-indurated edges and nodular floor, occupies the upper part of the outer half of the affected eyelid. It measures 3 cm. by 1 cm. The other sores, one on the left cheek and the other below the left side of the chin, are also in process of healing.

December 28th, 1907.—The ulceration of the left lower lid has now almost healed, and the infiltration of the parts is much less marked. The other lesions are also doing well.

**Remarks by Dr. David Walsh.**

There is a good deal yet to learn about the iodide-eruptions. In the foregoing case the original papule so exactly simulated a gumma that on clinical appearances alone anyone would naturally have diagnosed that condition. A similar neoplastic growth, however, is seen in the bromide papules met with sometimes in epileptic patients in whom there is no suspicion of syphilis. There is much similarity between the bromide and the iodide lesions—they are of rapid growth, are practically confined to the face and tend to early ulceration, while they are both serious conditions and sometimes end fatally. Another interesting fact is that both are caused not infrequently by the use of patent medicines: the one containing iodide and sold in the guise of "blood purifiers," and the other, bromide, entering into the composition of many nostrums sold for the "cure" of fits.

It is an old observation that both iodine and bromine are found actually present in the lesions. Many years ago it was suggested that their presence was due to the excretion or attempted excretion of the irritant metal concerned. In any case it may be reasonably assumed that the irritation forms the starting point of the nodule. How it comes to be deposited in one particular spot is an interesting speculation. Where the lesion originates in an excreting gland it seems likely that there may be a direct excretory irritation of the gland with secondary periglandular inflammation and invasion by pyogenic organisms. In one case of iodism under my notice there was cardiac trouble and feeble circulation, conditions that seemed to me likely to favour local deposition of the irritant.

So far as I remember a weak pulse is invariably associated with iodism, a fact that is compatible with the depressant action of the iodides on the heart.

The recurrence of iodism and bromism is an interesting point. During a continuous administration of either drug it is not unusual to meet with recurrent attacks of dermatitis. The mere fact of accumulation in the body is thereby practically excluded—as a matter of fact, some persons give larger doses of the iodide in order to cure the associated drug dermatitis. The likely explanation seems to me that the iodism is usually a phenomenon of weakened circulation and its first effects are seen in or near cutaneous glands, where the local circulation is likely to feel the first effects of a less forcible bloodstream. At any rate the relation of bromism and iodism to circulatory conditions would form an interesting and possibly fruitful subject of investigation.

At a recent meeting of the New London Dermatological Society a case of mixed bromide and arsenic eruptions was shown by Dr. Samuels. The patient was an epileptic who had taken bro-

**Fig. 1.—Case of Tubercular Iodism Simulating Gumma of Eyelid.**

January 15th, 1908.—The ulceration of the lower lid has healed. But there still remains some reddening and thickening of the outer half or two-thirds, with a few scales of desquamating skin at the lower part of the thickened area.

**Remarks.**

Of the various skin lesions that may on occasion follow the internal administration of potassium iodide, that described in the present communication is probably the rarest. At one stage the resemblance to gumma was most misleading. I was not surprised accordingly to find the following remarks made upon the subject in the fourth edition of Dr. Norman Walker’s "Introduction to Dermatology" (p. 60).

"In rare cases the lesions produced are at first solid, and later break down in a manner so similar to the gumma, that one or two patients have been dosed into their graves by the pushing of the very drug which was the original cause of their trouble. In others, large solid tumours have developed, leading to the mistaken diagnosis of malignant disease or even leprosy."

In reference to the present case a couple of points appear to be worthy of notice.—First, that the potassium iodide had been discontinued eighteen days before the patient was first seen by me; and, secondly, that the several lesions healed under the administration of another iodine compound, namely sajodin.
mide of potassium for years. There was a bromide papule on the cheek and smaller lesions on the eyelids which reminded one both in site and general appearance of Mr. Sidney Stephenson's case.

My own view is that neither the bromides nor the iodides should be given continuously in any case. Both are potent drugs, and there is abundant experimental evidence on record of their effect on the kidneys and other organs of the lower animals. In spite of obvious warnings of the kind we most of us continue to introduce for indefinite periods into the bodies of our patients drugs which exert a powerful irritating effect upon vital internal organs. It has always seemed to me that some part, at any rate, of organic disease of obscure origin may be due to our well-mean, but ill-regulated, therapeutic efforts.

So far as the ill effects of the iodide papules are concerned they are probably almost entirely toxic, due to the development of secondary pyogenic organisms in the lesions. These organisms are probably in many cases staphylococcic in their nature. The indications for treatment are simple. First, to cut off the drug absolutely; secondly, to give the patient rest, cardiac tonics, and to flush the kidneys with water or demulcent drinks; thirdly, to treat the iodide papules as specific pathogenic infections rather than as a mere drug eruption, by local antiseptic measures and by attempting to immunise the blood with vaccines, preferably autogenous.

CO-ORDINATION IN ADMINISTRATIVE METHODS IN DEALING WITH INFECTION AND INFANTILE MORBIDITY. (a)

By G. CLARK TROTTER, M.D., C.B., D.P.H., Medical Officer of Health and Tuberculosis Officer, Paisley.

In bringing before you for discussion the question of how far our administrative methods in the several and still increasing ramifications of the public health service can be co-ordinated so as to secure concentration of effort and efficiency, I was prompted by the fact that to some extent at least our office is modelled upon any part of other towns. This being so, the subject thus lends itself to comparative criticism; it must be remembered, however, that the area and population of Paisley are such that supervision is possible by one officer, and that if the town were larger further division of labour might be necessary as regards some of the work which is now combined.

It must long have been the opinion of Medical Officers of Health—In connection with infectious cases dealt with, both as regards results and the amount of expenditure involved—that, judged by a commercial standard of value in return for the amount spent, inequalities predominated. To a considerable extent hospital treatment has come to be looked upon as the case of the compulsorily notifiable infections, as an arrangement to suit the convenience of the citizens. This has come about by the well-meaned pressure which was brought to bear upon the householder—at the time the Infectious Diseases (Notification) Act became law—with the object of having cases removed to hospital. Now, undoubtedly this procedure was wise, as the diseases small-pox, enteric, and 1 believe also diphtheria from the nature of the infection are best dealt with in hospitals, but along with these others as scarlet fever were placed in the same category. The result has been that practically all these compulsorily notifiable diseases are treated in hospital. The cost of scarlet fever cases is the cause of a large annual expenditure, for which little can be shown from the point of view of prevention, and the disease is less fatal than measles or whooping-cough, which do not get anything like the same attention.

Now by better co-ordination of our administrative methods much might be accomplished. In the past there has been too little differentiation in the methods of dealing with infections, they have been grouped broadly as communicable or non- communicable; looked upon, might I say, somewhat as compulsorily to receive attention involving expense in the first class, and but little in the second. The way has been opened as it were, within the last few years, for an alteration in our administrative methods, instead of a universal label "infectious" to all notifiable diseases, much more attention is being directed to considering each disease strictly according to the precautions that can be taken. The Public Health (Scotland) Act of 1867 was amended in 1907, instead of the words "free from disease and infection" the words "proper precautions against spreading disease and to prevent its being communicated" were substituted; the definitions sections 57, 58 and 59 dealing with prevention of infection. While the idea was to obviate harshness in cases of phthisis, adoption of notification of which was then being urged, the change effected is not limited in its application, inasmuch as the "proper precautions" to be taken vary according to the disease, and with the advance of our knowledge of particular infections.

With the object of gaining information as to the working of several units of the public health service in connection with infection and infantile mortality—in ways different from the usual routine—I made inquiries of the Medical Officers of several boroughs. I find that the changes effected have been mainly with the view of dealing with scarlet fever cases, and although the object of this paper is not to discuss the merits or otherwise of any particular treatment, the fact of such radical change being brought about and sanction being granted by the Local Government Board, who permit dispensary or hospital treatment, while not insisting on a particular treatment, the fact that the Officers have to be insisted on, makes it necessary for me to review briefly the information gleaned, as it has a bearing both on the question of co-ordination between home visitation and hospital treatment, and in a general way on the whole administration, as it shows how advantage can be taken of the modification of the Act.

The burghs of Forfar, Clydebank, and Barrhead have for some time been treating cases of scarlet fever at home. In 1913 in Forfar 91 cases were treated in hospital, and 270 at home; in Clydebank 76 cases were treated in hospital, and 52 at home; while in Barrhead 3 cases in hospital, and 21 at home. The treatment is carried on as follows:

1. The burghs of Forfar and Clydebank have two special staffs of hospital, and Barrhead the medical practitioner in attendance is paid £1 per case, and the mother of the child is provided with a thorough basket and cloth to rub the child, and eucalyptus oil for rubbing. In the last-mentioned burghs scarlet fever is treated by Dr. Miller, in the first two burhgs a special nurse is employed to carry it out, but in Barrhead the medical practitioner in attendance is paid £1 per case, and the mother of the child is provided with a thorough basket and cloth to rub the child, and eucalyptus oil for rubbing. In the last-mentioned burghs scarlet fever is treated by Dr. Miller, in the first two burhgs a special nurse is employed to carry it out, but in Barrhead the medical practitioner in attendance is paid £1 per case, and the mother of the child is provided with a thorough basket and cloth to rub the child, and eucalyptus oil for rubbing. In the last-mentioned burghs scarlet fever is treated by Dr. Miller, in the first two burhgs a special nurse is employed to carry it out, but in Barrhead the medical practitioner in attendance is paid £1 per case, and the mother of the child is provided with a thorough basket and cloth to rub the child, and eucalyptus oil for rubbing.

(a) Paper read at the Royal Institute of Public Health, Edinburgh, Congress, July 20th, 1914.
overlooked, and is bound to be commented on when neighbour towns are adhering to hospital treat-ment. The appeal to the Local Government Board under Section 56, Sub-section (1) (d) of the Public Health (Scotland) Act, 1897, in the case of Barrhead, was given on condition that the medical practitioners were left free to prescribe and administer whatever treatment they consider most appropriate to the case, and it was distinctly stated that approval could not be given to " Milbe, or any other particular form of treatment. In Paisley practically all the cases of scarlet fever are treated in hospital. There were only three cases at home last year, so as regards home treatment of this disease, I have no comparisons to offer. The information I have given has, therefore, been got from towns where hospital treatment is in vogue. I have sometimes thought it is frequently a blessing in disguise for some children to have a mild attack of scarlet fever; after five or six weeks in our Borough Hospital the change in their general health and condition is so very marked, they are, as it were, physically recuperated and set up for some time at least. Measles, whooping-cough, chicken-pox, and mumps cases are visited, a special nurse being requisitioned from our hospital for this purpose, the cases mostly being notified through the schools. The Local Authority does not, as in the case of certain other infectious diseases, generally (that is, in the course of the year) provide for hospital treatment of measles and whooping-cough, but when it is obvious from the home conditions that the child has not a reasonable chance of being properly treated, it is left to the discretion of the Medical Officer of Health to admit the case to hospital. In 1913 the measles cases recorded were 1,497, whooping-cough 454, chicken-pox 525, and mumps 827. Sixty-five cases of measles were treated in hospital.

But with regard to methods of dealing with infantile mortality, as the result of the inquiries I have mentioned, I have not found that any town is working on exactly similar lines, for we have in connection with our Municipal Dispensary, which is specially for tuberculosis, observation beds, and on the principle that "diarrhoea" and "wasting" might in infants and children be possibly due to tuberculosis, these cases are admitted for observation, and, with but few exceptions, are found to be the result of improper feeding. I believe that in medical treatment was tried, and that such cases discovered on visitation into various institutions for treatment, but this was not continued, the results not justifying the expenditure, but then the conditions are different there, and the experience not comparable, as all are not under one control. Last year in Paisley we admitted twenty-seven such children suffering from diarrhoea, malnutrition, etc., nineteen were dismissed well, six considerably improved, while there were two deaths. This year the experiment has been continued, and a larger number, for the time dealt with, about twenty having been treated. My opinion is that in a proportion of the cases which come under the observation of the health visitor, this is the only feasible method that has any chance of success. It is quite useless, as is done at some dispensary consultations, to give, say, a powder, with directions regarding diet, to the mother; the child is by the time advice is sought in such condition that nothing short of removal for a time from its environment, together with adequate treatment, is, I think, necessary, and this, if not, will be of no avail. After dismissed the visits of the health visitor to the home will in many cases require to be continued to ensure proper attention being paid by the mother.

Now to summarise the co-ordination which might be recommended. The Medical Officer of Health must necessarily be in close touch through the visiting inspector, nurse, or nurses, with all the cases—infected, tuberculous, or infantile (visited under the Notification of Births Act); in a country district probably notification deaths can be performed by one person. Where domiciliary treatment has not received approval of the Local Government Board, this might be obtained on board lines, as in the case of the Burgh of Barrhead, for even if not used as a routine, it in times of epidemics may prove a useful asset.

The dispensary, and these now are largely in use for treatment of tuberculosis, could freely be used as advice centres, not for that disease alone, but for such cases as fail to get medical attention. There is no definition to limit the term "infectious disease" of the Public Health Act to compulsorily notifiable cases—the term may embrace pneumonia, syphilis, diarrhoea, etc.—in fact, to a very large extent the recommendations of the Minority Report on the Poor Law could practically be acted upon and treatment provided with the object of lessening mortality, which next to prevention of disease is the aim of our public health administration.

THE STATE IN RELATION TO THE PROMOTION OF MEDICAL RESEARCH. (a)

By SHERIDAN DELEPINE, M.B., C.M., M.Sc.,
Professor of Public Health and Bacteriology, and Director of
Public Health Laboratories, University of Manchester.

Up to quite recently most of the benefits which the State has derived from the scientific work done in this kingdom have been conferred upon it by means of private means or receiving grants from private persons, associations, or societies, etc. Most of these grants were intended to meet experimental expenses, and their recipients, except those with private resources, had to earn their livelihood by the exercise of a profession which very rapidly claimed the best part of their energies.

The successful cultivation of pathology and preventive medicine—that is, of the study of the causes, effects, and prevention of disease, generally demands a considerable expenditure of time and of money, and the co-operation of many trained observers is often essential to success. Up to about thirty years ago no special provision had been made for this kind of study. What had been accomplished before then was the outcome of the efforts of enthusiastic clinicians and young morbid anatomists awaiting promotion to some clinical post in various hospitals. There existed a few chairs of pathology, but these were associated with heavy clinical duties. There was no endowment applicable to pathological research. The first chair of pure pathology was that created in Aberdeen in 1882; the Cambridge chair dates from 1884. The State has, therefore, been far behind other educational institutions, and since then that science has been recognised as a subject deserving a full chair by all modern British universities.

During the same period the public health service, as we understand it at present, became organised for the first time. It may therefore be said without exaggeration that the arrangements made for the systematic study of the causes and prevention of disease are still in their infancy. The new universities, which owe their existence to the liberality and foresight of enlightened citizens of some of the great provincial towns, have of late

(a) Presidential Address before Section of Sanitary Science and Preventive Medicine, Congress of Royal Sanitary Institute, Blackpool, July, 1914.
received Government grants, which have gradually become more and more substantial, but these grants have been chiefly for teaching purposes.

Some important research institutes, such as the Lister Institute, the Usher Institute, and the Thompson Yates Laboratories, have been endowed by private benefactors since 1891. The College of Physicians in London and Edinburgh had not long before created research laboratories. A partly self-supporting public health laboratory was established in 1892 in Manchester. More recently, funds, such as the Cancer Research Fund, have been raised for special purposes. These are indications of the efforts which have been made during the past twenty-five years towards the improvement of higher education and of research facilities, but with all that, the number of desirable posts open to those who wish to devote themselves to a career of scientific research are still very few, and also prospects offered to those who would spend a few years in research are not encouraging.

The creation of chairs of pathology and allied subjects might have given greater opportunities for research had not the teaching and other duties connected with many of these posts been so heavy, and the funds available for research so small.

There has, however, been a gradual improvement during the past fifteen years in these respects, and hospitals are now in the United Kingdom between fifteen and twenty centres where the amount and importance of research work could be considerably increased if funds were available for meeting the cost of experimental work, and for giving to research workers adequate compensation for the time spent in investigations, from which they can expect no other material reward. Even then further improvements would still be needed to place the relation of scientific laboratories with certain Departments of State, local authorities, and hospitals, on a footing more favourable to efficient co-operation than it is at present. It would also be necessary that research laboratories should not be under the control of governing bodies, can often be influenced by the clamours of popular craze-mongers meddling with things which are beyond their understanding or asking for the abolition of imaginary abuses.

Much of what I have said about the position which the State has taken with regard to medical research in the past is true today. In the following quotation from the Final Report of the Departmental Committee on Tuberculosis, Vol. I., 1913, p. 13, which at the same time gives hope for better things in the future:

"It is, however, generally known that two widely different policies are possible—viz., one of complete centralisation, and one of devolution combined with limited centralisation. As the scheme finally adopted may prove to be of considerable importance in the future development of preventive medicine and public health, it appears to me desirable that the matter should receive the careful consideration of all who are interested in the public health service. The advisory council and the executive committee consist of persons belonging to State departments, institutions, and associations interested in the prophylaxis of disease, and some of the members have been actually engaged in research. These members cannot be said to represent the bodies to which they belong, because they have not been elected by them. It is, therefore, most desirable that those who are interested in the matter and in a position to form an opinion should now be known the views which they hold, as this may prove of assistance to the advisory council when the time arrives for them to come to a decision.

With the object of stimulating criticism I propose now to show how, in my opinion, a policy of complete centralisation would affect medical research. In the first instance I wish it to be clearly understood that whatever combined centralisation and devolution applies only to the actual work of research, and that, whatever method was adopted to carry out that work, some general guidance would be needed to indicate the nature of the investigations, to co-ordinate the work done by various investigators, and to utilise its results so as to meet the requirements of the State. This being understood, I will now consider a scheme for complete centralisation.

The Government would, in all probability, appoint a committee consisting of a director of research and several officers closely connected with those departments of State, such as the Local Government Board, the Home Office, etc., which must consider whether the local authorities and the new research laboratories would be erected, or some existing ones taken over. There would be in this central laboratory several sections, each of which would be under the special direction of a man able to take charge of some special branch of science, and to direct younger investigators. This man would be connected with an existing hospital, or some new special hospital might be associated with it. past, and their opinion that research under the National Insurance Act should be organised in such a way as not to discourage either voluntary contributions or voluntary research towards the same ends. The aim should rather be to stimulate and co-operate with voluntary agencies."
phalanx of young workers in a new laboratory. These young adults would not be respected by time any more than their senior colleagues have been, and in order to obviate the age difficulty it would be necessary to provide for frequent changes in the staff of the central laboratory. The central laboratory must be so arranged that it is capable of conducting a large number of experiments under the supervision of the superintendent, and for covering experimental and other current expenses. The stipends offered to the directors and other research workers would probably be sufficient to induce some of the best investigators to come to this central institution.

Valuable experimental work could be done under these conditions; but as the problems with which public health is concerned are in many cases greatly influenced by local, social and other conditions which vary considerably in various parts of the kingdom, certain investigations would necessitate the appointment of persons whose duties it would be to conduct researches in suitable localities. Certain researches, however, occupy many years and sometimes a lifetime. This is particularly true of statistical and of certain clinical and aetiological investigations. Some of the data necessary for such investigations have been in the past collected with great care and accuracy in some centres, at health offices, hospitals and other institutions, while the information available is less complete and reliable.

The investigators sent by the central committee would, therefore, require to have access to the books and other documents kept at various hospitals, health offices, etc., in order to be able to carry out their researches. In this way the central laboratory could control provincial work through a new agency, and its dependence on existing local agencies, though in many cases dependent on local institutions and men for most important data.

I hardly need to enter into more details in order to make clear some of the objections which can be offered to complete centralisation of medical research. The most important laboratories or the adaptation of old buildings would mean a material expenditure on buildings at a time when, both in London and all through the country, too much expenditure has already been incurred for the same purpose, and when money is wanted chiefly for workers and working expenses. If the provision of central laboratories for research and the offer of emoluments better than those obtainable in existing laboratories caused a migration of the best workers to some central institution, this would deprive existing institutions of the stimulating influence of these men.

It is doubtful whether this bringing of research workers together to one centre would result in greater efficiency than could be secured by supplying the same workers with the necessary assistance and subsisities without displacing them.

If, on the other hand, the policy adopted was to select research workers from among the ranks of the untired younger generations, the difficulties which impair the efficiency of existing centres would not be remedied and the action of the Government would be conversion of a speculative venture. It is difficult to believe that a small Government committee would, even if composed of men of exceptional foresight, be more successful in discovering budding geniuses than the senators and councils of all the universities of the kingdom put together have been in the past. It is true that at any time a certain proportion of the professorships, lectureships, and other posts giving opportunities for research are occupied by men no longer young and whose productive activities are possibly inferior to those of younger men, but this fault would not be remedied by the creation of a State department, laboratories and other institutions, which have up to the present been chiefly concerned with the study and control of disease and social conditions, might be followed by some immediate benefits; but much greater and more permanent good would be secured by helping, strengthening and co-ordinating the existing institutions, most of which are in great need of such help.

JUDGE SMYLY asked a doctor who was suing for his fees in the Shoreditch County Court what the patient had suffered from. The plaintiff claimed the medical privilege of not disclosing his patients' ailments, which the judge agreed with.
CLINICAL RECORDS.

AN INTERESTING CASE.
By HENRY CARSON SMYTH, L.R.C.P. and S.I.,
Resident Surgeon, Dr. Steevens' Hospital, Dublin.

WILLIAM D. was brought by the City ambulance to Dr. Steevens' Hospital, Dublin, on the afternoon of Sunday, June 5th, 1914, at five o'clock. He stated that he had been taken ill suddenly in the street with severe pain in the back, and vomiting.

The patient, a well-built man, aged 32, and unmarried, stated that he had always enjoyed excellent health, with the exception of some slight pain in his arms and hands about three months ago, for which he had to remain away from work for two or three days.

On the day of his admission to hospital, feeling quite well after eating his dinner, he had gone for a walk, and it was during the walk that he was seized with the pain and sickness.

He described the pain as starting in his back on the right side near the lower margin of the liver, and shooting towards the opposite side, and up to the right shoulder.

On admission the patient was evidently in severe pain, his face was flushed, and the right side of his neck was oedematous, his temperature was 106.4 F., pulse 88, and respirations 24 to the minute.

On examination no abnormality was discovered in the heart, lungs, or abdomen, and the urine did not contain either sugar or albumin.

Shortly after admission the oedema extended to the right side of the face, and an hour later to the left side of face and neck, closing both eyes. The pain was still severe, and had become constant, but of no relation to respiration movements. The pulse rate increased to 100, but the frequency of respiration was the same as before.

At eight o'clock p.m. the patient was restless, had some dyspnoea, but was able to lie down on his left side. The pulse rate had increased to 110 and respirations to 28 per minute. By midnight the pulse had further increased to 130 and the respirations to 40 per minute. The patient was suffering from marked dyspnoea, and he stated that the pain was rather worse than it had been before.

On examination of the chest at this time distinct surgical emphysema was found over the right side, and there was marked loss of resonant sound over the border of the left side of the wind-breath sounds. The oedema of the face had diminished, and patient was able to open both eyes. At 4 a.m. the pulse rate had fallen to 128, but the respirations remained at 40, and the dyspnoea had increased. Patient otherwise seemed easier, and stated that the pain was better. At 7.30 a.m. the patient had a violent attack ofretching, and brought up a small quantity of blood-stained fluid. He then became deeply cyanosed and died almost immediately.

Post-mortem examination twelve hours after death:

There was slight oedema of the neck and face, and the abdomen was distended. On opening the chest both pleural cavities were found to contain fluid under considerable pressure. This fluid was dark and blood-stained, and resembled that which the patient had vomited immediately before his death. Both lungs were collapsed, but did not appear to be diseased. The pleura itself and the pericardium were not inflamed, and the heart was normal. The mediastinum was occupied by what appeared to be a large cyst, the walls of which were adherent to the oesophagus behind and to the posterior surfaces of the pericardium and lungs in the front. The cavity of the cyst contained fluid similar to that in the pleural cavities, and the walls were necrotic. There was a small opening about half an inch in length from the cyst into the oesophagus, just above the diaphragm, and there was also a communication with both pleural cavities. The stomach was distended and contained fluid similar to that found in the chest. The other organs appeared healthy. Careful investigation failed to reveal the origin of the cyst, and no sign of an abscess or of pus was found.

OPERATING THEATRES.

THE CHILDREN'S HOSPITAL, GREAT ORMOND STREET.

A CASE OF ECTOPIA VESICE.—Mr. ERED M. CORNER operated upon a girl of about 5 years of age, the subject of ectopia vesice. Both the urethra and the bladder were completely everted, exposing the ureters and the trigone. The urine was led away from the bladder by means of two catheters, and that of the ureters was carried in four inches apart. The openings of the ureters were demonstrated by means of passing a catheter up each of them, and allowing the urine to flow through the catheter. Each catheter was then fastened in by silk and passed through the mucous membrane of the bladder. Mr. Corner referred at some length to the very unsatisfactory results which were obtained by means of covering in the exposed bladder by flaps. He preferred to take the greater risk and to make that flap wide and straight into the sigmoid flexure. It was objected to this method that the kidneys were infected from the bowel, and the patient died of uremia. But it could be replied that such persons on whom the transplantation had been successfully made led much more useful and enjoyable lives; some did not die young of uremia, and it had been asserted that ureteral transplantation with the trigone prevented, or tended to prevent, the passage of organisms from the bowel to the kidneys. The operation was proceeded with. All mucous membrane round the trigone was cut away and the abdomen opened. An assistant inserted a gloved finger into the rectum and made the sigmoid present at the wound. Having freed this part of the operation, it became apparent that the better and more useful and enjoyable lives; some did not die young of uremia, and it had been asserted that ureteral transplantation with the trigone prevented, or tended to prevent, the passage of organisms from the bowel to the kidneys. The operation was proceeded with. All mucous membrane round the trigone was cut away and the abdomen opened. An assistant inserted a gloved finger into the rectum and made the sigmoid present at the wound. Having freed this part of the operation, it became apparent that the bladder could be turned round easily, the sigmoid was opened, and an anastomosis made between the inverted trigone and the sigmoid. Mr. Corner here stated that he had split the trigone and made a small incision in the bladder. It was the difficulty of inverting the whole trigone, but was not so satisfactory. The inverted trigone tended to evert, and it was desirable to put an extra row of stitches at the upper part of the anastomosis to prevent this. When the anastomosis was completed a large hole remained in the abdominal wall. This had to be closed, and it required some ingenuity to accomplish it. In more than one case the hollow vaginal wall had been used to help fill up the gap. The difficulty was due to the cleft pubis. The operation had already been long enough, and to close the pelvis meant opening up each sacro-iliac joint as a preliminary, an operation involving much shock and quite out of the question. Mr. Corner stated that after operation these children's bowels were opened four or six times a day. They were a kind of autopenia. He intended closing the cleft pelvis by another operation a little later on. He should make no recommendation without due consideration. It was quite usual for a little leakage of urine to take place at the end of a week, making a daily dressing advisable. The critical time as to the success of the operation was during the period of the haemorrhage. It was then that the anastomosis stitches might loosen and the trigone begin to evert. If this happened the amount of urine escaping increased, and finally a ureretic opening could be seen. Operations seldom failed so badly as to deserve two.
panned by acute pain. The history given was that eighteen months previously she had been operated upon in another hospital for what was thought to be an appendix abscess. To was evacuated, but later on urine escaped from the wound. After a time, however, the wound healed. She remained fairly well until two months ago, when she got sharp pains across her back, and these gradually got worse until eight days ago, when they became located in the right lumbar region, shooting down into the groin. On examination, a tender swelling was found in the right iliac-lumbar region. The healed scar of the child incision, situated two inches above and to the inner side of the anterior superior spine of the ilium. An X-ray photograph showed no stone. The patient suffered from chronic constipation. A small incision was made in the right loin and a trochar and cannula inserted, a large amount of pus and urine escaped, and the opening was enlarged, the finger entering a large pyonephrotic cavity. After a careful search a small stone was found and removed from the lower portion of the pelvis of the kidney. A drainage tube was inserted. Next day the tumour had disappeared, there was an increase in the amount of urine passed, and it contained blood. The wound gradually closed and the patient made an excellent recovery.

Nephrectomy for an Old-Standing Sinus of the Right Kidney.—Sarah B., aged 14, was admitted suffering from a sinus which had been discharging from the right lumbar region for a long time. The history given was that the child was healthy until four years previously, when she began to have attacks of pain in the right side. These were often of a severe nature, but in the intervals the child seemed quite well. A year later a lump was noticed in the right side and the pain became constant and severe. An operation was performed in one of the Liverpool hospitals, and this was followed by a second and then by a third. At the last operation a stone was said to have been removed; the wound never closed. On examination there was a sinus discharging pus and urine in the right loin with some tendingness on pressure. An X-ray examination showed no stone. Under ether Mr. Newbottle passed a probe down the sinus; it entered a large cavity, so the sinus was laid freely open. The walls of the cavity were formed of a thin layer of kidney substance, and after a tedious dissection the whole of the sac was dissected out, the renal vessels were tied, and a small portion of tissue lying on the vena cava scraped. No stone was discovered. A large drainage tube was placed in the cavity, and thus wound healed firmly, the child making a good recovery.

Mr. Newbottle said these were two cases of interest. The first was a case of calculus pyonephrosis, and was rather unusual as that recovery had ensued when apparently the kidney had become disorganised. Again the X-ray examination had failed to show the stone, probably because the swelling was very large and it was difficult to exert any pressure when taking the picture. In the second case the child had been an invalid for four years, and the kidney was almost totally destroyed. The cause of the condition was probably the same as in the first instance, but even though there had been removed the kidney did not recover as might have been expected in a child. The operation was extremely difficult, as the parts were adherent to important structures.

TRANSACTIONS OF SOCIETIES.

THE NEW LONDON DERMATOLOGICAL SOCIETY.

Meeting held Thursday, July 6th, 1914.

The President, Dr. David Walsh, in the Chair.

The President showed a case clinically resembling tertiary syphilis, but in which the Wassermann reaction was negative. The patient was a woman, aged 50, who had been under treatment on and off for the last nine years for an eruption on the leg. She had had eight children, of whom seven are living, and has had no miscarriages. The general health is good, but she has rheumatic pains at times and suffers from diffuse headache. About the legs there is a ringed eruption of somewhat peculiar appearance; there is an oval raised verrucose area, surrounded with a whitish cicatrical area, and that again by a red margin. The verrucose is on the right leg, but lately the eruption is generally distributed, and several patches are on the left leg and ankle. Clinically the case suggests a tertiary syphilis, but a Wassermann test proved negative. The patient had not taken any mercury for some weeks before the blood was tested. Dr. Walsh said he had seen verrucose plaques showing these, and the case was probably of that nature.

Dr. D. Vinnace said that if this had been lichen hypertrophicus, he believed there would have been a lichen planus and probably would have been lichen plants elsewhere on the body.

The President exhibited a photograph of a patient with multiple hard changes. The patient had some desultory treatment, but was of careless habits, and he had no less than seven hard changes. He had not previously seen, nor found mentioned in literature, a case with so many hard sores. Six were on the penis, and one was among the pubic hair. Probably the sore on the woman was on the upper part of the penis. At the first operation Dr. Walsh took off one of the lesions with a little cotton wool, and in the scar which afterward exuded spirochete could be seen. They healed up marvellously under neo- varsyn, and the patient appeared to have had no fresh cutaneous lesions.

Dr. Vinnace said he assumed that most members had seen cases with two changes at the same time. He had one case now under treatment by "606"; one case of tertiary syphilis and lichen. The other was the patient. He had a patient with three changes concurrently.

Dr. II. C. Samuel showed (1) a case of drug eruption. The patient, a youth, had an extensive eruption. The patient was given arsenical hyperkeratosis and some lesions on the conjunctiva. This was the second time he had had a drug eruption. The previous attack was an ordinary bromide arm.

Dr. J. Midleton asked whether Dr. Samuel was prepared with any explanation of why these rashes formed at all. They were largely pustular, and one wondered how the peculiar organisms gained entrance to the lesions. He had heard that by giving one of the inorganic salt solutions and the diapedesis of leucocytes, and so there was activity around the area spot, for instance. One writer had spoken of the intensive administration of iodide of potassium followed by chloride water; and another spoke of powerful irritation of iodine, four times as strong as the usual. He would like to know whether this patient had had less eruption since the eruption occurred. He regarded epilepsy as a toxic ailment, and in this patient an outstanding factor was tooth sepsis. He objected to giving bromide of potassium as a remedy for epilepsy. In all cases bad teeth should be extracted; it had known cases get well simply after that had been done.

Dr. G. Trivick said that general practitioners looked upon bromide as the sheet-anchor in cases of epilepsy; and he had had cases in which the fits were kept in abeyance and the patient was more comfortable taking bromide. But he agreed with Dr. Midleton that cases should be observed with the view of detecting any source of irritation, such as errors of refraction or, conditions of the nose or throat. But even then there was a residue of cases in which nothing could be done. He always remembered the case of a medical man who, under the impression he had rheumatism, took iodide continuously. Finally, he called in a consultant, who found him to be suffering from acute nephritis, from which he had never recovered.
Dr. VINRACE said he understood that this bromide rash had only existed for days; and he would like to know the date when the signs of arsenic poisoning occurred, also what were the manifestations in this case. Had the exhibitor any explanation of the multiple scars and pustules which appeared on epileptics treated with bromide. In the present case the Ophthalmoscope appeared a beautiful coloured plate of a case of his own, which, because of the eye condition, came under Dr. Sydney Stephen's care. In the case of iodide papule the patient had an ulcerating tumid lesion on the cheek, one on the eyelid, much resembling that in Dr. Samuel's case, except that one was due to bromide and the other to iodide. Clinically, it would be difficult to distinguish the lesions due to the two drugs. Iodide papules were very rare; and where they appeared the patient probably had some idiosyncrasy. Sometimes the iodide was increased in dose with the idea of getting rid of the papule. He had seen many patients who had responded in that way. His own case was syphilitic, and the iodide papule followed traumatism in the eye. It was well known that gumma did follow injuries. He asked what Dr. Samuel possessed as a cure for his present patient seemed to be in a serious condition. It seemed to be a case of having to choose between bromide and epilepsy. This patient had been taking bromide for a long period; why should the drug at one particular period do so much damage to the kidneys at such times rebel and refuse to excrete the drug, so that it was driven to choose another means of exit? The danger from giving bromide consisted in its continuous administration. The same was true of syphilis; patients were given the drugs in hospital for six, nine, and twelve months without interruption. He contended that the administration should always be interrupted.

Dr. SAMUEL replied that in making statements one was often guided by instinct. When the patient first came, there was what appeared like a streptococcic condition; there were some attacks, where one would have expected the streptococcus to grow; and there were outlying inflamed hair follicles, such as were found in intertriginous conditions. Moreover, the swelling and the recurrent feature favoured the streptococcic view. He admitted that in many of these cases went on to erythematous eczema, not erysipelas; they had no constitutional symptoms.

**SPECIAL REPORTS.**

**THE EIGHTY SECOND ANNUAL MEETING OF THE BRITISH MEDICAL ASSOCIATION HELD AT ABERDEEN, 1914.**

[By Our Special Representative.]

Sixteen years have elapsed since the British Medical Association met for its annual meeting in a centre north of the Tweed. It was in 1898 that the city of Edinburgh played the part of host, and now for the first time in the career of the Association the "Silver City by the Sea," as Aberdeen has been styled, is acting this week as host to many hundreds of members and their wives. The historical associations of Aberdeen are great and interesting in the extreme, and the Association is fortunate indeed in being able to house the whole of the Sections, as well as the Exhibition, in the spacious and magnificent Marischal College. A splendid welcome has been extended by the citizens and medical fraternity of this "grey, wintry-featured, sea-tempered" city of the North to all the visitors by whom she is at present thronged.

Sir Alexander Ogston, K.C.V.O., L.L.D., M.D., the newly-elected President of the Association, is well known to the members of the Association, and has the good wishes of H.M. the King in Scotland, and Emeritus Regius Professor of Surgery in the University of Aberdeen. Born in 1844, he was educated at Aberdeen University.
qualifying as M.B., C.M. in 1865, becoming M.D. in the following year. His valuable services connected with the Royal Infirmary are remembered with lasting gratitude, and he is now Consulting Surgeon thereto. In 1885 Sir Alexander (then Professor Ogston) served in the Soudan, and in 1896, 1900 in the South African Campaign. His Address on Surgery, delivered at the Portsmouth meeting of the Association in 1896, on "The Medical Services of the Army and Navy"

SIR ALEXANDER OGSTON, K.C.V.O.

created a great impression at the time, calling attention, as it did, to various shortcomings that then marred the medical efficiency of the two great Services. Such fearless criticism, an ardent desire to seek the truth, and an undaunted courage in the face of obstacles are among the characteristics of Sir Alexander Ogston, who is held in the highest possible esteem by the citizens of Aberdeen. He was appointed Surgeon-in-Ordinary by the late Queen Victoria and also by King Edward VII. In 1912 he was created K.C.V.O. The University of Glasgow bestowed upon him the Hon. L.L.D. in 1907, and the University of Aberdeen followed suit in 1910. Sir Alexander is a Deputy Lieutenant for the County of Aberdeen, and also Hon. Colonel (R.A.M.C.) Highland Territorial Division.

Such is the record of a distinguished surgeon who now presides over the fortunes and future of the British Medical Association for the ensuing year, and the Association may indeed be congratulated upon its choice.

GENERAL ARRANGEMENTS.

It is fitting that the Association should meet in Scotland this year now that it has been decided to establish a permanent Scottish office with a whole time Scottish Medical Secretary.

The momentous decision has been arrived at, after the liveliest discussion and the expression of many divergent opinions, that the special fund for the defence of professional interests should be in the hands of a Trust Association, or other organisation, not a Trade Union.

Before the President's Address was delivered, Sir Clifford Allbutt, K.C.B., the President Elect for the Cambridge Meeting, 1915, was introduced.

The President delivered his address last night before a crowded and distinguished audience.

At 11.30 p.m. on Monday the Address on Medicine will be delivered by Dr. Archibald Edward Garrod, M.D., F.R.C.P., F.R.S., Physician to St. Bartholomew's Hospital, while, at the same hour to-morrow, Sir John Bland Sutton, Surgeon to the Middlesex Hospital, will deliver the Address in Surgery.

RELIGIOUS SERVICES.

At 9 a.m. this morning the annual service for the Association will be held in the West Parish Church of St. Nicholas (Church of Scotland). A service for Catholic members will be held simultaneously in St. Mary's Cathedral, Huntly Street, when it is hoped that the Celebrant will be the venerable and revered Dr. Chisholm, the Bishop of Aberdeen, the sermon being preached by the Rt. Rev. Mgr. Meany, the Administrator of the Cathedral. At both services coin will be made for the Royal Medical Benevolent Fund.

THE WORK OF THE SECTIONS.

As in the previous year, the scientific work of the Association will be conducted in sixteen sections, all of which are comfortably accommodated in the buildings of Marischal College. Among the interesting discussions that are to take place are those on: "Headache" (Section of Medicine), to be opened by Dr. Harry Campbell; on "Death Certification" (Section of State Medicine), to be opened by Sir Victor Horsley; on "The Etiology and Treatment of Carcinoma of the Tongue" (Section of Surgery), to be introduced by Mr. W. G. Spencer. In the section of Electro-therapeutics an electro-cinematographic demonstration is to be given by Professor Bergonie. Certain combined discussions are sure to attract large audiences, such as that on "The Pharmacology and Therapeutics of the Animal Extracts exclusive of Thyroid Extract," to be opened by Professor Noel Paton (Physiologist) and Dr. O. F. F. Grunbaum (Therapeutics); and on "The Diagnosis of Chronic Pulmonary Tuberculosis in Infancy and Childhood," in which Dr. D. B. Lees, Dr. Clive Riviere (Section of Diseases of Children), and Dr. Ironside Bruce (Section of Radiology) will take part.

THE SOCIAL FUNCTIONS.

The annual dinner of the Association takes place to-morrow night, when a large gathering is expected. This afternoon the town Provost and Town Council of Aberdeen are giving a garden party in Duthie Park. Other garden parties are arranged for at the Deeside Hydro-pathic, which has a 9-hole approaching and putting course; at Parkhill House, near Don, at Inchmarnock, on the north bank of the Dee, and at other centres noted for their beautiful scenery. A number of long and short excursions to places of interest in the neighbourhood have been arranged for.

The Ulster Cup will be competed for at the Royal Aberdeen Golf Links, Balgownie, Bridge of Don, on Thursday, at 9 a.m. Intending competitors are requested to send in their names and addresses, along with their club handicap, to Dr. H. de M. Alexander, 29, King Street, Aberdeen. The comfort and convenience of lady visitors has been especially looked after, and altogether members and their ladies may be assured of a most pleasant and profitable visit.

THE ANNUAL EXHIBITION.

There is no excuse for members not visiting the annual exhibition this year, for this unique display of instruments, books, drugs, appliances and foods is housed under the same roof as the Sections. Being so conveniently situated, therefore, members will have an unrivalled opportunity of inspecting the various exhibits at their leisure. A few minutes spent in making a tour of the stands is time well spent.

ROYAL COMMISSION ON VENEREAL DISEASES.

SIR JOHN COLLIE, at the 48th meeting of the Commission gave the results of some observations he had
recently made in connection with 2,176 men referred to him for medical report. These were divided into three classes—(1) 1,119 whom accident or illness had overtaken, (2) 557 apparently healthy, but required to pass medical examination before entering employment, (3) 500 of the same class as the second division, but who also submitted themselves to the Wassermann test. Of all three division 196 were found to be suffering from venereal disease. In the first two divisions, in connection with which clinical evidence was relied upon, 60, or 6.2 per cent., were found to be affected, in the third class, where the Wassermann test was applied, 46, or 9.2 per cent., were shown to have had syphilis. The 500 cases of those apparently in perfect health (as evidenced by a thorough physical examination), which were taken as they presented themselves for examination, and no selection was made except that working-class people over 21 years of age only were chosen. 103 of the 500 had served in the Army or Navy, and of these 24, or 18.9 per cent., gave a positive Wassermann reaction. The percentage of positive reactions in the remainder of the 500 was only 6.

Sir John stated that the figures probably did not represent the full extent of the existence of the disease, for the men examined were of a somewhat superior artisan class. An interesting feature of the investigation was the fact that the Wassermann test showed a positive reaction in as many as 12, 16 and 19 years, and in one case as to 29 years after intimation, and in several after all recollection of the infection had disappeared.

Mr. Frederick J. McCann, F.R.C.S., Surgeon to the Samaritan Free Hospital for Women, said that it was of the utmost importance that syphilis and gonorrhoea should be regarded as common female ailments, for which no satisfactory treatment should be available as for other female ailments without any special stigma being attached to them. If proper facilities for in-patient and out-patient treatment were provided the special aspects of these diseases would to a large extent be obviated. He based his statement on the early local signs of syphilis and the signs and symptoms of gonorrhoea which were much required. This instruction should be given at the special hospitals for women and in the gynaecological departments of the general hospitals. He contended that it was essential that gonorrhoea should be regarded as a serious disease in both sexes, especially in women, and that prompt and effectual treatment was required. The medical profession would show its sense of the present aspect by impressing upon patients the gravity of the disease and the necessity for early curative treatment.

Dr. Chalmers, Medical Officer of Health for Glasgow, gave supplementary evidence at the 49th meeting of the Commission with reference to the experience of the Glasgow Corporation. He stated that ophthalmia neonatorum was made compulsorily notifible in Glasgow in 1911, and that in the beginning an attempt was made to supervise the cases at the homes. It was, however, soon apparent that this was far from being so effective for hospital treatment. Arrangements had accordingly been made for this treatment, and it had been necessary in some cases to provide also for the reception into hospital of the mother. Their experience had shown that a proportion of children suffering with ophthalmia neonatorum also suffered from congenital syphilis, and that the resultant defects in vision were greatest when the diseases were concurrent. In the period from 1911 to 1913, of 461 children suffering from ophthalmia neonatorum 13.6 per cent. were found also to be syphilitic.

Dr. Chalmers was of opinion that no form of compulsory notification of venereal disease, whether for any class of persons, or of cases, would effect its object. His view was that the trouble required not compulsion but education, and he presented to the issue of an authoritative statement showing the danger to life in after years of syphilis contracted at an earlier period, and of the disastrous effect on children would to a considerable extent effect this.
Painless Delivery.

The last meeting of the Académie de Médecine was particularly interesting by the communication of Prof. Ribemont-Dessaigne on painless confinement by the injection of a nerve sedative closely allied to mesothorium. A large number of women were thus treated in the maternal ward of the hospital, and each one seemed distinctly indifferent to the usual throes of delivery, absolute silence replacing crying. The uterus contracted on no way modified by the anaesthetic, nor was delivery retarded. As regards the child, it presented at first a kind of somnolence, but from which it was quickly aroused by holding it up by the feet and blowing into its little face. This treatment was ever observed in the mother or the child.

GERMANY.

Berlin, July 25th, 1914.

At the Medizinische Gesellschaft in Berlin, K. Klock discussed the Treatment of Malignant Tumours of the Eye by Mesothorium and Radium.

He said that very little had been recorded respecting such treatment. The reason for that was that metastases were feared and it had been considered safer generally to enucleate. The malignant tumours of the eye often presented a tendency to spread, which was accompanied by a special tendency to metastatic spread. The disease had been found in the liver as much as from 10 to 15 years after enucleation of the eye. He first showed two cases that had not been under treatment by radiation, one a large malignant tumour on the mesothorium, the other a sarcoma of the choroid. He would afterwards show them a series of cases that had undergone treatment by radium and mesothorium emanations. The first case was one of epibulbar melanoma of the right eye. The whole outer wall of the cornea was covered by a thick hardened skin that reached almost to the middle of the sclerotic. When the patient first came under treatment the disease had been in existence a year, and had been treated for that period by an ophthalmologist, chiefly by cauterisation. The vision in that eye was 5/10. The following was the course under irradiation: during the first months the sitting was for 30 minutes with 12 mg of mesothorium. There was diminution in the photophobia but not in the size of the growth. A total of irradiation was one hour and 35 minutes with radium, and 7 hours and 35 minutes with mesothorium. The papillary region was now quite clear and the thickened skin covering had disappeared. The pigment had partly gone and the conjunctival injection was much less. Almost the initial case of the growth had disappeared and a half hour later the tumour had receded still further. Clearing up was quite plain, the pigment in the upper part was quite gone, whilst that in the lower part was reduced to some slight patches. The tumour had now disappeared with the exception of a couple of small oval pigment spots the size of limpets.

The second case was one of melanoma of the right ciliary body. The patient, a woman aged 57, came to the clinic on account of loss of sight which she had been conscious of for six months. The iris was pushed forward and between it and the cornea was a brownish tumour. The result of irradiation by mesothorium for a total of 10 hours and 20 minutes was a diminution in the size of the tumour, and a considerable diminution of the internal pressure which had previously been high. The mesothorium was applied weekly for 30 minutes. At present the whole of the papillary region was quite free and the tumour was reduced to the size of half a pea.

The third case was one of epibulbar spindle-celled sarcoma in a woman of 39. The question was from an exploratory excision. For a month 10 mg of radium were applied every third day for 5 minutes. The growth the size of a bean was seated at the left external angle of the sclerotic and reached into the region of the pupil. The tumour, notwithstanding the treatment did not diminish in size, so that enucleation had to be performed. Within a month, however, there was recurrence which in spite of intensive radium treatment still persisted. It was then subjected to treatment by mesothorium for 50 minutes together; this gradually reduced the size of the growth so that the present height of the growth was a radially streaked cicatrix left. A very fine nevus data on the cornea showed the former site of the tumour.

Considering the effect of radium on eye diseases generally we had to come to the conclusion that the cases that had been raised had to suffer disappointment. In conjunctival affections (trachoma) its effects, as regards recurrences, had been doubtful. The great field for radium treatment in diseases of the eye lay in the treatment of tumours. Great caution has to be exercised in the treatment of deep lying tumours, but the irradiation of growths in the anterior chamber led to favourable expectations as to results.

Hr. Paul Lazarus had had a case of rapid recurrence after enucleation of a spongy mass below the eye. In that case he had introduced below the bulb and into the orbital fissure 250 mg of mesothorium radium bromide (200 of a 1 per cent, mesothorium solution and 50 mg, of 100 per cent, radium bromide), in small tubes and allowed them to remain for 30 hours. There was no reaction. In that 30 hours the tumour necrosed and melted away. The eye itself now showed no trace of burning neither internally nor on the cornea. Unfortunately the case was then lost sight of.

He could show resistance to the rays on the part of the nerve substance and brain in another series of cases. There was, in opposition to the notion that the action of the rays was limited to the lecithin content of the organ, that it depended on the splitting up of lecithin into cholin and that the action of the rays was to a certain extent identical with that of cholin. But the tissues rich in lecithin seemed to be the most resistant. The arrangement of the spermazoon was the most sensitive part of the tissue.

One of the dangers of radiation of the eye was the sensitiveness of the conjunctiva, that could be got rid of however by proper covering up. A second danger lay in the resorption of the tumour mass into the surrounding parts and in the hurling of any metastases that might be present into other tissues. It had been seen that when a tumour disappeared a fresh growth came in the buccal mucous membrane, or on the gums, or the lower jaw and grew rapidly. From the first it was not the tumour alone that was to be treated, but the whole of the neighbouring parts.

AUSTRIA.

Vienna, July 25th, 1914.

TENTH CONGRESS OF THE DEUTSCHER RÖNTGEN-GESELLSCHAFT.—(Concluded.)

IV.—PHYSICO-TECHNICAL ADAPTATIONS.

Dr. F. M. Fraedel (Frankfort a. M.) made a communication on "The Improvement of the Armamentarium and Auxiliary Apparatus for Röntgenography." He pointed out the following desiderata: (1) A new apparatus with a gasous apparatus; (2) A new apparatus; (3) The kino film has been improved, so that 15 pictures per second can now be taken. He believes, however, that the apparatus will never be such as to allow of experimental form of static with special provision for perfect focusing; the interpolation of a Nürnberg apparatus for tele-röntgenography, and a special apparatus for orientation of the camera in taking stereoscopic pictures, (5) The exposure to the exposure of the skin and for the display of the curve of the motions of the heart.

Dr. Holzknecht (Vienna) showed new models of Röntgen-ray apparatus (cameras, distinctor, radiometers, etc.). One was an exposure key, by which the periods of exposure were exactly tabulated.
shutter furnished a combination of distinctor and Bucky effect.

Dr. J. Rosenthal (Munich) discussed some of the questions of Röntgen-ray therapy of deep-seated organs, and pointed out the imperfection of present methods of measurements.

Dr. Eckert (Berlin) also discussed the therapy of deeply-placed organs, and demonstrated the use of suspended tubes with the help of an apparatus enabling the operator to move the tubes slowly over the patient's body. This arrangement gave specially favourable conditions for deep-seated therapy.

Dr. Braun (Solingen) discussed "Experiments with a Shutter for the Röntgen-ray illumination and photographing (Bucky effect)." He had used the Bucky filter in taking photographs and in illumination with the Röntgen-rays, and estimated its value highly. He found that the thicker the object the better it worked; it was then itself less prominently conspicuous.

Dr. Frick (Berlin) praised the Bucky filter, but pointed out that we must take account of the luminous quadrangles which are often found in a shadow-like shadow; also that distinctors are sometimes met with.

Dr. Bucky (Berlin) explained those phenomena. The bright spaces owe their origin to the metallic radiation, but can be minimised by using a screen of lead overlaid with copper.

Dr. Braun (Solingen) pointed out that the luminous areas were injurious only in taking photographs, not in the transmission of luminosity.

Dr. B. Walter (Hamburg) discussed the graduated values of gun materials for screens. He exhibited a combination of use in furnishing specific luminosities. The most valuable material in this connection is tin, so that a coat of tin of this metal may come into use. He also discussed the relative values of radium and mesothorium, and demonstrated with the help of a film in a mesothorium preparation represented two-thirds the cost of a radium one of the same strength.

Dr. Bucky (Berlin) then demonstrated the use of his "adaptateur," an instrument for measuring the progress of adaptation of the human eye to darkness. This consists of a lamp of which the intensity of light can be graduated, placed behind a green shade.

Dr. Grossmann (Charlottenburg) discussed critical data on the method of fields and the}

Dr. Tammelmann and Schütte (Berlin) discussed "Practical Experiments with the Fürsteneckschichtenmeter." This instrument has been constructed by utilising the action of the Röntgen-rays on selenium, and is an instrument of dosage—both for radium and for diagnosis. The instrument works satisfactorily, and can be rapidly adjusted.

Other dosimeters were exhibited by Dr. Levy-Dorn (Berlin) and by Dr. Hammer (Freiburg-Breisgau).

V.—Diagnosis in Affliction: (Sect. V. Various Regions and Growths.)

Dr. Franz Wohlauser (Charlottenburg) exhibited a large number of diapositives showing the changes demonstrable in tabetic ostepathy and the help of the Röntgen-rays. It was repeatedly happened in his personal experience that he was able to make a diagnosis of tubercles in its initial stages from the revelations made by the action of the rays. In one case he enabled the alveolar condition of combined tubercles and tubules; insomuch as a patient displayed a tabetic arthropathy of the knee-join, while the tibia displayed the typical picture of syphilitic bone disease.

Dr. Grashev exhibited radiograms in which failure of diagnosis had taken place, in which it might have been comparatively easily avoided. In a case of sarcoma of the neck of the femur, and in another of sarcoma of the vertebral column, a diagnosis of chronic inflammatory processes had been made. In another case, a diagnosis of sarcoma of the femur had been made, which on operation appeared to the naked eye to be a sarcoma; through it was diagnosed chondromata by the microscopic diagnosis. For the first time, after operation on a recurrent growth, the pathologist formulated the diagnosis of chondroplastic sarcoma. A specimen which displayed a portion of the epithysaroma of the odonoton has been pronounced to be one of fracture.

Dr. Graessner demonstrated a number of varieties of spina bifida occulta of the lumbar region in the living subject. The condition is one of frequent occurrence, and attains a practical interest in the second year of life, when lesions of sensation, deformities of the feet, and ulcers of the skin of the latter come to develop. In most of those cases the true diagnosis can be made only with the help of the Röntgen-rays. Early recognition is of the greatest importance, as improvement can be hoped for only after section of the cisternal bands and detachment of the adhesions within the spinal canal which have been pressing on nerve trunks. Spina bifida occulta could be found in 70 per cent. of cases of emressis in children, and of vaginal and uterine prolapse in women.

Dr. Nemenow (St. Petersburg) demonstrated a series of diapositives. Amongst them were cases of needles in the abdominal cavity—in a case in which 131 needles were removed from the stomach by operation, knitting needles in the bladder, pellets of kidney with double ureter, various abnormalities of gallbladder, and malformations in position of the chondrophy of elbow-joint, ulos ventriculi et dutoni, pneumoniae craniae.

Dr. Rosenblatt (Odessa) demonstrated a series of rare Röntgen-ray pictures. (1) A sarcoma of the ulna, in which the associated bone was resected and replaced by a piece of sibula. After eight months a recurrent sarcoma appeared in the transplanted head of sibula. The question arose of local extension of the traces left in the seat of the original disease or of metastatic adhesion of the sarcoma to the sibula before transplantation. (2) Congenital diverticulum of oesophagus. (3) Acquired oesophageal diverticula. (4) Blind ending of descending colon and canicular junction of flexura coli sinistra with abscess. (5) Carcinoma of duodenum.

Dr. Sabat (Lemberg) also showed rare specimens of Röntgen-ray pictures: craniosenosis, chondrostoma, hydro-pyopneumo-pericardium, arterio-sclerosis of aortic arch, hemiomenia of thorax, colitis ulcerosa tuberculosa, colitis tuberculous lesions, subphrenic abscess with formation of gas, large abdominal vesse.r which appeared like enormously dilated gall-binders.

FROM OUR SPECIAL CORRESPONDENTS AT HOME.

SCOTLAND.

The Public Health Congress.

The concluding meeting of this Congress in Edinburgh was held on Monday, the 20th. The joint session of the State Medicine and Industrial Hygiene Sections was presided over by Dr. Leslie Mackenzie, chairman of the Edinburgh Medical School. The subject affecting the welfare of children. Dr. Brown, Medical Officer to the Govan School Board, discussing the nutrition of the school child, emphasised the importance of ante-natal conditions in relation to the health of the mother as influencing the nutrition of the offspring. He also showed that when a family income fell below 20s. per week, a sufficient diet could not be obtained. Dr. Trotter, M.O.H., for Paisley, read a paper on "Gripping in Action, Methods of Dealing with Infection and Infantile Mortality." His argument was that more discriminating treatment was required in connection with infectious diseases, and that it was not enough to introduce them into the more easily notifiable and the non-notifiable. The control of tuberculosis in Lanarkshire was discussed by Dr. Wilson, M.O.H. for the county. The Insurance Act had enabled the authorities to tackle the problem in a way undreamt of three years ago, and now they
had sanatoria and work colonies, hospitals, dispensaries, and special provision for the treatment of surgical tuberculosis, including an X-ray equipment. Many cases of the disease referred, up to the present about 90 per cent of the phthisis cases notified were beyond hope of permanent improvement.

After a paper by Dr. Margregor, Glasgow, on the cicatricial and ulcerous forms of tuberculosis in nature, Dr. Nathan Raw, of Liverpool, discussed the infection of children by tuberculosis, in which he reiterated the view that he has already expressed elsewhere as to the relation between human and bovine sources. He urged the sanitary aspect of the question, and the importance of preventing the infection of children by a tuberculous mother, which was most likely to arise in poor-class homes. A tribute was paid to the isolation of families of cases of tuberculosis with whom the writer worked in infection; he was convinced that the removal of older tuberculosis from homes was simply a question of time.

Dr. McWalter, Dublin, questioned the efficacy of notification, on the ground that it was a fallacy to look upon the tubercle bacillus as the efficient cause of tuberculosis. He regarded it mainly as a question of housing. After the discussion on the papers on tuberculosis a number of interesting communications were read, among them being Dr. Love's paper on "The Vaccine Treatment of the Complications of Scarlet Fever," Dr. Dittmar's on "Communal Cleanliness," and Dr. Paul Ritchie's on "Arthritis, Deformations and Industries to Industrial Conditions," which would seem that coal miners are more affected by the disease than any other class.

The Sections of Epidemiology and Child Welfare met together under the chairmanship of Professor Hunter Stewart. The principal discussion centred round Dr. Ker's paper on Isolation and Quarantine Periods for Infectious Diseases. The substance of the paper was read at a medical meeting some time since, and had already appeared in The Medical Press and Circular. On one of the chief questions—the infectivity of desquamation in scarlet fever—Dr. Ker was somewhat sceptical, and favoured a shortening of the period. Drs. Mead and Ethel Mead read a paper on infections as soon as the rash had faded, and quite possibly even when the catarrhal stage is over. For the sake of the patients themselves prolonged stay in hospital in cases of whooping cough was very beneficial; but it was very doubtful whether the actual infection lasted after the development of the whoop. In the subsequent discussion there was general agreement. The paper was read and discussed by Dr. Ker. Owing to the small attendance at the meeting of the Pathological Section the papers were not taken as read.

The Congress was formally closed by a meeting in the Asher Hall in the evening, when Dr. Otto Nachod delivered his address on "History of Public Hygiene." It was announced that next year the Congress of the Royal Institute of Public Health would be held in Brussels.

Insurance Act in Scotland.

The further points of interest in the annual report by the Scottish Commissioners, additional to those referred to a fortnight ago, concern, among other matters, the drug fund. The chemists thought that on the tariff of charges upon which they were allowed to base their accounts there would be some of the drug fund per person left over in every area. The Commissioners did not agree with this, and suggested that any proposal for increasing the tariff rates should be postponed until actual experience had been obtained. It has been found that the average cost for daily attendance in each case of adult and child in Stirlingshire, Argyll and Kilmarnock, to is. 10d. in Zetland and 2s. 11d. in Aberdeen. The floating fund has therefore had to be drawn upon in many areas. As regards sanatoria benefit this has been partly taken up by Insurance Committees, with the co-operation of Medical Officers of Health and the Local Government Board. Authorities have been able to co-operate with one another in providing sanatoria, etc., as was necessary in the interest of the patients. The paper of the Proprietary Sanatoria Committee is not to provide institutions, but to utilise institutions provided by other authorities. Scotland's share of the amount available for sanatoria under the Finance Act of 1911 amounted to nearly £60,000 which has been distributed equally among the 44 L.G.B.s approved comprehensive schemes by 5½ counties and twelve burghs, and the proposals of twelve counties and six burghs are still under consideration. The seventeen approved schemes cover 15½ million people, and of the eighteen proposals that have been made for 12½ million and a half millions, so that the total schemes under the notice of the L.G.B. represent over 50 per cent. of the population. The number of available beds has increased from 853 in July, 1912, to 1.290. For the eighteenth half-years 4,682 applications for sanatorium benefit were received, and 3,800 persons got sanatorium benefit. The total cost was nearly £140,000. The Commissioners lay stress on the field open to committees in the way of providing health lectures.

Proposal to Erect a Chair of Tuberculosis in Edinburgh.

At the last meeting of the University Court, Edinburgh, a letter was read from Sir Robert Chrishiston, Chairman of the Victoria Hospital and Dispensary, in reference to the endowment of a Chair of Tuberculosis in Edinburgh. The proposal was favourably received by the Court.

Alleged Cancer Street in Ayr.

The annual report of the Imperial Cancer Research Fund refers to an address which Sir Thomas Oliver delivered this year. He said that his attention had been directed to the report strewn with suspicion as to the existence between the years 1893 and 1908 nineteen persons and one dog had died of cancer. In some of the houses two or three cases had occurred. Since in nearly all these cases there was no hereditary history of the disease, the large number of deaths among successive occupants suggested, he said, that the matter was more than a co-incidence. Commenting on "cancer houses," Sir Thomas Oliver wrote:—It is not an agreeable subject for any medical man to see cancer germs lurk in houses." The street above alluded to is in the town of Ayr. Sir Thomas's native place. In consequence of his statements, an investigation was made on the spot under the auspices of the Imperial Cancer Research Fund, every facility being given by the local public health authorities. The street referred to is broad and contains the best type of residential detached and semi-detached villas, with gardens front and back. The householders, the reply states, being mostly retired business men or belonging to one of the professions, the average age is, therefore, higher than in other parts of the town. The age of the cases of cancer was in all the cases was below the age of 50, or 60, although only one could be verified. There was no positive evidence of infection of any kind whatever. So far as the investigations into the "cancer houses" and the "cancer areas already proceeded," concludes the report, "they accord with what has already been established by experiments on animals. 'Cancer houses' are as much a myth as are 'cancer cages.'

Medical Conditions in Mull.

The Highland and Islands Medical Service Board has been visiting Tobermory. The Board was represented by Dr. Norman Walker, Dr. J. L. Robertson, Senior Inspector of schools, and Mr. L. McQuibben, Secretary. Among other present was Dr. MacDonald from Iona. The chairman, Dr. Brown, said: "The object is to insist upon annihilating the difficulties of distance as regarded the out-of-the-way districts. During a discussion on the parish of Torosay, it was mentioned that the arrangements have been made as a result of the visit of a doctor in Salen. In reference to Dervaig, in Kilminnach parish, the United Free Church minister asked if any provision was to be made, now that Dr. MacLean had retired. Should the doctor happen to be at Lochaline, a good boat would have to travel between So and 90 miles to bring the doctor to that island. The general consensus of opinion at the Conference was that one large hospital should be arranged for at Tobermory to serve for Mull, Ardnamurchan, Coll, and Tiree.
LETTERS TO THE EDITOR.

[We do not hold ourselves responsible for the opinions expressed by our Correspondents.]

FORCIBLE FEEDING.

To the Editor of The Medical Press and Circular.

Sir,—I am afraid that Mr. McKenna's fear of the truth being made public has somewhat misled you on the subject of the medical deputation to that Ministry. His excuse for not receiving us immediately, as we immediately showed to be groundless, was the persistence of the case, and I think that your remarks might have accorded to the deputation a little more just appreciation than that "the matter fell through." To my mind it was improper on the part of Mr. McKenna to draw a line of demarcation between medical practice and the public, and thereby shirk a responsibility which he might have discharged. But in the majority of cases yield to the "stress" they are subjected to. If you consult Hansard you will recognise that these words signify nothing less than that the prisoners are tortured. It is true that the medical officers in the prisons are usually medical men, and therefore legally can be employed as torturers or executioners; but in our opinion the imposition of these reprehensible instructions and their obedience to them is contrary to all the ethical principles of the medical profession. All the points I wish to subordinate say—namely, and, as I have said before, it is quite obvious why Mr. McKenna declined to defend his administration in public. As regards the ridiculous question that he put in a letter to us,—namely, What is the alternative? there is only one possible method, as you say,—namely, full female enfranchisement. The existence of militancy has nothing whatever to do with the granting of such enfranchisement.

I am, Sir, yours truly,

Victor Horsley.

July 22nd, 1914.

To the Editor of The Medical Press and Circular.

Sir,—There can be no doubt, I think, that the ideas of a handful of medical men who are opposed to so-called "forcible feeding" are altogether untenable and ultra vires. What is called militant suffragism is nothing more nor less than another name for sex warfare, and the aim of these militant women is obviously to inflict the maximum amount of public injury with the minimum amount of inconvenience to themselves, and the latter is admirably achieved so long as they are allowed to commit crime ad libitum and escape prison through "an attempt to commit suicide" by starvation (a crime for so), in many cases repeating the same or other crimes whilst on licence. It is certainly unwarrentable that the lives and property of millions should be at the mercy of a few desperadoes, some of whom are demented, and whose ranks can be readily repleted as they fall out one by one under the present easy-going conditions, and who hope by a system analogous to guerilla warfare to exhaust public patience and ultimately achieve their end through violence and public abuse.

It is the duty, therefore, of the Government, so far from discontinuing forcible feeding, to resort to it as a preliminary in every case of "attempted suicide" or hunger strike, otherwise they manifestly admit to prison for one offence and release them under "temporary discharge" for another.

I am, Sir, yours truly,

Clement H. Siers, M.R.C.S.

5, Chantreyton Head, Hove.

July 23rd, 1914.

THE DECAY OF FRANCE.

To the Editor of The Medical Press and Circular.

Sir,—The letters on the decay of France which have appeared in recent issues of your publication have been full of interest to every thoughtful individual. As the writer of them remarks, "the population question is the fundamental question of the day. You cannot, however, take a limited view of the matter; as I read him, he is imbued with the idea of imperial domain both for France and England. He considers it necessary to make the mother country the nursery for prospective enfringants of whom will carry with him the flag of his country to maintain its supremacy. Is the imperial idea a correct one? More important than the welfare of France or of England is the well-being of the world as a whole. Now, the population of the world is a more or less constant ratio to the amount of available food in the world. It is not a question of money; it is the fundamental question of meat and drink. There would be no surplus population if there were enough food for everyone. How far this is due to economic short-sightedness and imperial wastefulsness is a question still to be discussed, but the chief factor at present in its causation is the over-population of the world. The available amount of food in the world is sufficient for a number of people. Express this number as x. The total population is then expressed as x plus the surplus for whom there is not a sufficiency. When millions in India were starving to death there was more food than could be cultivated, but there was not enough food to be bought. It might be argued that our surplus population could be employed to make the desert arable and the jungles fruitful, but that would mean a total abandonment of the war-staten. It is in the interest of the world to act as drags on the wagons of the pioneer and rob him of his just reward. Besides, as your correspondent points out, the surplus population is not fit for such work, it has to be culled in workhouses, gaols and asylums. To the universal it matters not whether France decay or England wither. Patriotism is un-Christian, for it implies the waxing of one power at the expense of another's waning. As long as there is not enough land under cultivation to supply the needs of men, every nation and nations to decrease the population is expedient and excusable. Better, however, than this would be the acquisition of sense by the collective intelligence in order that money should be spent on what will provide potential bread, and not on that which profligates it.

I am, Sir, yours truly,

Neo-Malthusian.

REVIEWS OF BOOKS.

PRACTICAL HORMONE THERAPY. (a)

There can be no question that the therapeutic use of organic extracts and internal secretions is a very fascinating subject, and the brilliant results achieved with one or two substances are such as to justify the author insisting on the "positively enormous" prospects held out by this line of research. Still, we must not blink the fact that at present our knowledge of the subject does not go very far, and that further progress is conditional on difficult, painstaking observation. Writers on the subject will therefore do well to take the diplomatic maxim to heart, "Surtout point de zèle." We shall not advance our knowledge by arguments based on statements that this or that organ "controls possibly in some way another organ." We should be safer and sounder if such has been shown to be the case. Nor can we set much store on results of organotherapy in such vague disorders as ovarian dysmenorrhoea, neurasthenia, or hyperæmia.

It is readily conceded that the author has given us an exhaustive and voluminous treatise on organotherapy: he tells us all that is known—and a good deal that cannot by any stretch of imagination be said to be known. His work will certainly stimulate inquiry and

(a) "Practical Hormone Therapy." By Henry E. ATVATER, M.D., late Professor of Clinical Diagnosis, Loyola University, Chicago. London: Balliere, Tindall, and Cox. 1914. Price £4 net.
will prompt many a reader to ascertain for himself what measure of usefulness attends the employment of the less well known of these organic extracts. We cordially agree with the author's remark that "some of the statements regarding the therapeutic applications of endocrinian preparations are strange, to say the least," for whoever would imagine the use of placental extract as a remedy for alopecia or of adrenal extract as a cure for sea-sickness.

The principle of the use of these therapeutics — viz., to supply to the body a particular hormone or combination of hormones which, through disease, has been diminished or lost, is certainly a most reasonable one, but unfortunately these hormones are, for the most part, difficult to obtain, the evidence whereof is inferred rather than demonstrated. In any case, it is to be hoped that preparations of these hypothetical substances will not be named according to their fancied action. We already have "leukodrines," "vasoconstrictors," and a few others which must horrify both the physiologist and the philologist.

What, then, are the substances the use of which in therapeutics may be said to have a scientific basis? Well, of course, first and foremost comes thyroid extract, then adrenalin following by pituitrin, possibly thymin, ovarian extract, luteal extract or lutein, and—well, this is about all, because the action of the last three is by no means established, that last would seem to be a medicinal effect. Take the placental hormone, for instance; one man says it increases the flow of milk, the next man contradicts this, but finds that it causes uterine contraction, while a third brings it forward as a remedy for apoplexy.

The task of assigning a particular therapeutic function to the individual gland is often so great that organo-therapeutics fall back on pluriglandular extracts, a sort of polyvalent stew, eye of newt and toad of frog," the use of which, observes the author, "is by no means as unscientific as some might think . . . since some of the failures following the use of a single animal extract may be obviated by combining it with one or more synergistic extracts."

The reason for this phenomenon is to be found in a brilliant future for organotherapy, and works like this one which synoptise the results obtained by countless scientific labourers are of immense service. But do not let us get into a state of hysterical excitement over mere possibilities, let us abstain from such language as that in which a distinguished English physician recently referred to the subject. "The internal secretory glands already unfold before the astonished view of the seeing eye a land of promise beside which the vast area of the brain, covered by Lister and Pasteur, is destined to pale into honorable insignificance. The ductless glands and their hormones come to us as peaceful conquerors who brook no denial. They lighten our darkness and show us miracles. In studying them and endeavoring to unravel their intricate and esoteric mysteries one sees ever and anon to be on the trail of the Great Secret and in danger of losing one's mental perspective."

LITERARY NOTES.

Those of our readers who were fortunate enough to secure a set of Mr. Hanslin Fletcher's realistic sketches of Guy's Hospital, published a short while ago, will be glad to learn that the same talented artist has just executed a fine series of eight drawings of St. Bartholomew's Hospital. The plates, which measure 17 in. by 11 in., including margin, are replicas of the beautiful wash drawings made by Mr. Fletcher only a spring ago. The view of the Priory Church interior is a noble study in colour, the others are in monochrome. The subscription price for artist's signed proofs, printed on Japanese paper, with plate paper mounts, is two guineas the set. Bart.'s men in all parts of the world will welcome this opportunity of possessing these delicately finished and wholly representative drawings of their alma mater.

The plates are issued by Messrs. W. H. Beynon and Co., Fine Art Publishers, St. Alban's Lodge, Chelsea.

MEDICAL NEWS & PASS LISTS.

Medical Sickness and Accident Accident.

At the usual monthly meeting of the Executive Committee of the above Society, the half-yearly balance-sheets were submitted and it was stated that the Society's funds amounted to £26,000, and the income of the Society is well over £15,000 per annum, and shows a steady rise every year. The grateful letters from members who attain the age of 65 and over, and from the families of those who have reached an age satisfactory to those under whose careful management the Society has prospered sufficiently to enable this bonus to be paid, and the amount actually paid increases every year, and touched £3,500 in 1891. This fact proved that many attain 65 years, and that insured medical men are, taken as a whole, good lives.

The claim account presented was slightly lower than that of last year, and was under the expectation provided for by the tables.

Death under Ether.

Mr. W. Schiödner held an inquest on the 17th inst. at St. Pancras concerning the death of Anna Grabot, aged 43 years, who died at the New Hospital for Women and Children, 59, Euston Road, under an operation.

The evidence showed that the deceased, the wife of a cabinet maker, had been ailing for the last few years with pains in the back and internally. The previous day she went to the New Hospital, 59, Euston Road, as an out-patient, and there, after examination, was told that she was suffering from an internal growth, and that it was advisable she should become an in-patient and undergo an operation for the removal of the growth, to which she consented. On Tuesday afternoon she was prepared for the operation, which was for the removal of anæmia. The operation was completed it was noticed that a sudden change came over her. Restoratives were used, and the operation quickly completed. Deceased had a second relapse, and died a few minutes later. On a post-mortem examination being made by Miss Goldby, one of the House surgeons, it was found that there was a cancer of the heart and liver. It was found that the cancer was of old standing. Death was due to syncope owing to latty degeneration of the heart whilst under the influence of the anaesthetic.

Dr. Miss Nora Payne observed that the deceased was an administered ether, which she had taken very well indeed. The operation was a long one, occupying over two hours. Suddenly she noticed there was a change in her condition, on which every endeavour was made to restore her, but she never regained consciousness, death being due to fatty degeneration of the heart, accelerated by the anaesthetic. Witness had given anaesthetics in over 3,000 cases successfully.

The jury returned a verdict of "Death by misadventure."

Landlord's Responsibility for a Defective Drain.

At the West London County Court, on the 21st inst., Judge Selle delivered a considered judgment in a case in which a landlord was sued on the ground of an illness said to have been caused by a defective drain.

In December last Mr. Matthews, of Hurlingham, let on lease to a Mr. Worthy the house at 15 Comber Road, Parson's Green, at £36 per annum. Shortly after entering into occupation Miss Worthy complained of the water in the cellar being too strong to be entered into. An examination of the house drains disclosed a crack in the main sewer, from which sewage had saturated the surrounding soil, while gas was also given off. The plaintiff claimed £100 damages.

His Honour found on the evidence that defendant had let the house without having the sanitary arrangements examined. Since the medical evidence agreed
that enteric fever is caused by a bacillus entering the system, and that he was caused by merely inhaling sewage gas, his Honour did not feel justified in finding that the enteric fever was directly caused by the defects in the sewage arrangements. His Honour found, however, that a person whose general health was affected by these minor insanitary conditions, as Mrs. Worley's was in this case, was more liable to enteric fever than a person in normal health. If the enteric fever had not supervened Mrs. Worley would have required some medical treatment, and he did not think the defects should be considered breach of the Houses and Town Planning Act. He assessed the damages at £15 with costs. If, however, it was decided on appeal that the fever was the direct result of insanitary conditions, he assessed the damages at £95, with costs on the highest scale.

The Unallocated Funds.

A MEETING of the Insurance Committee for the County of London was held last week at Spring Gardens. Mr. Fred Cusby was elected Chairman of the Committee for the ensuing year, and Mr. J. Howarth was elected Vice-Chairman.

Replying to a question, Mr. Frank Briant, London County Council said that he had been received from a solicitor stating that he had been instructed by Dr. H. Basset to bring an action against the Committee to make it disgorge monies that had accumulated during the last year, through insured persons not selecting a doctor.

Mr. C. C. Greenwood stated that since May the number of deposit contributors in the county area had decreased by 4,449. If that rate continued, the committee would not be able to repay the moneys contributed within a short time. In regard to the distribution of monies in the panel fund for last year, the Medical Benefit Sub-Committee recommended that as the Insurance Committee was unable to agree as to the method of distribution, the Insurance Commissioners be requested to distribute such monies among the practitioners on the panel.

Mr. C. C. Greenwood thought the proposal was an easy and simple way of ending the controversy. He made an appeal to members to dispose of it, in order that they might all "pull together" for the benefit of the insured persons.

The sub-committee's recommendation was carried by 36 votes to 10.

Unstamped Medical Preparations.

At Marylebone last week, Mr. Biron heard a summons at the instance of the Customs and Excise against Samuel Simpson, of Brondesbury, trading as James Alfred Simms, at Paddington, for exposing for sale or selling as medicine, remedies, without Revenue stamps attached and without having a licence.

The defence was that the question was whether the defendant or someone else was liable for the duty. The prosecution must show that the defendant was the proprietor, or original vendor of the articles before they could make him liable for the duty. The defendant bought wholesale and had no prescriptive right in the medicines at all.

Mr. Biron ordered the defendant to pay fines amounting to £21 1s. 6d., with costs.

Mr. Paul Taylor heard a similar case in which Isaac Rowe, trading as I. Reid and Co., of Edgware Road, was summoned. The defence was the same as in the previous case. There were six summonses, and Mr. Paul Taylor fined the defendant £1 on each summons, £6 in all, with £2 2s. costs.

University of London.

The following have passed the M.D. examination for internal and external students:


Branch II: Mental Diseases and Psychology.—C. S. Ricklund, B.S. Coll. Gen.


Branch V: State Medicine.—H. L. Hopkins, Guy's Hosp.

Branch VI: Tropical Medicine.—M. F. Reaney, London Hosp. and London School of Tropical Medicine.

The following have passed the M.S. examination for internal and external students:


London School of Tropical Medicine.

The following candidates have passed the examinations during the session May—July, 1914:

The following passed with distinction.—A. C. Munro (Capt. I.M.S.), M.B.Glasg. (awarded the Duncan and Lallaca medals); C. Bonne, M.B.Amsterdam; J. M. Stenhouse, M.B., B.C.Cantab., J. S. Webster, M.B.; Ch.B.Victoria.


Royal College of Surgeons of Edinburgh—Fellowships.


Royal College of Surgeons in Ireland.

The following candidates have passed the mentioned examinations, July, 1914:

Primary Fellowship Examination.—Moses Briscoe, Robert A. Keane, John A. C. Kidd, Robert C. B. Ramsay.

Final Fellowship Examination.—Andrew R. D. Carbery, Frank M. Fonsceca, Lady A. Menezes, John O'Leary, Balwant Rai, Jerome Suareas, Hassan Suvarhataya.

Final Dental Examination.—Walter G. Keys, Arthur C. Wiley.
Abdominal Cesarean Section in Eclampsia.—Peterson (Amer. Jl. Obst., lxix., 4), from facts gathered during the past three years, comes to the conclusions that the operative results during the five years from 1918 to 1923 have so improved as to make operation in cases of Cesarean section amongst other obstetric operations in the treatment of antepartum eclampsia. The statistics show that the earlier the operation is done after onset of convulsion, the better the result. The mortality, maternal and fetal, is not so high as to the right of Cesarean section amongst other obstetric operations in the treatment of antepartum eclampsia. The statistics show that the earlier the operation is done after onset of convulsion, the better the result. The mortality, maternal and fetal, is not claimed that every woman developing eclampsia should be operated upon, but that the operation should not be condemned without a hearing, because the results obtained are improving rapidly; it must be considered seriously, although other methods from a statistical standpoint are superior. The operation is contra-indicated when attempts at delivery have been made from below or many vaginal examinations made. The operation will very rarely be indicated before the eighth month and is not advised for the unskilled practitioner. When the operation is decided upon, it should be done as early as possible.

The Serum Diagnosis of Pregnancy.—Jellingshaus (Amer. Jl. Obst., lxix., 4), in a long paper concluding with a detailed account of the technique of the test, concludes that Abderhalden’s defensive ferment theory is correct, but that the dialysation method has not always been correct in the pregnant cases, but so in the non-pregnant ones. Since uniform results have not been obtained the test cannot be recommended as diagnostic purposes. Many of the writers who have used the test for this purpose, when they obtain a positive result in a case which proves to be not pregnant, blame it upon some error in technique or impure placental albumen. Since the error is not detected until the case is made evident, the method must be looked upon as useless until the technique is improved so that errors can be positively avoided. Much of the literature condemning the dialysation method is due to the fact that the writers have not reported a few non-pregnant cases. The claim that eclamptic serum contains less ferment than normal pregnant serum is not substantiated, and was not found by the author. The method is entirely a laboratory procedure and absolutely unsuitable as an office test.

Influence of Ectopic Pregnancy on the Uterus.—Sampson (Amer. Gyn. and Obst., xviii., 5). In twenty-five cases the uterus was removed on account of ectopic pregnancy, or because of the tendency to recurrence of the condition in the other tube or because the other tube required to be removed. The specimens were immediately injected and examined by X-rays and microscopic section, and it was found that under the influence of early ectopic pregnancy the uterus thickened more than normal, due to hyperemia and increased size of muscle fibres is not certain. The changes in the endometrium are quite similar to those found in early pregnancy. The entire lining of the uterus takes part in this change. The trabeculae and the compact layer of the endometrium are more evident than in the non-pregnant uterus, but not so evidently in early uterine pregnancies. There is often a decidual reaction around the blood-vessels in these trabeculae, and the development of the compact layer and also the decidual cells seems to be intimately associated with the arterial invasion of the endometrium, which takes place throughout the trabeculae. Venous spaces are also very evident. It is difficult to detect any change in the uterine wall other than arterial and venous hyperemia.

the complete termination of the tubal pregnancy uterine involution takes place. The uterus becomes smaller, due to decrease of arterial and venous hyperemia and increase of the endometrium. There is possibly a certain amount of sclerosis of the radial arteries and their branches. The earliest regressions changes detected were dilatation of the veins spaces and escape of blood into the tissues of the endometrium. The regressive changes are apparently due to uterine contractions injuring the structures of the endometrium, interference with the arterial circulation, a condition of venous congestion. Rupture of the superficial venous spaces would give rise to uterine bleeding and involution of the endometrium, while rupture of the venous spaces at the junction of the compact and spongy layers separates the two layers and may give rise to a decidal cast. In the majority of cases the termination of the pregnancy is a gradual process associated with repeated attacks of pain, and some of the products of conception may remain active in the tube for some days or weeks after the commencement of the termination, and therefore the process of involution is delayed in the uterus.

Spinal Anesthesia in Pelvic Surgery.—Ansprech (Amer. Jl. Obst., lxix., 4) reports thirty-six cases treated, and draws the following conclusions, that even in skilled hands there will be a higher immediate mortality as a routine anesthetic than either ether, chloroform, or nitrous oxide. It has no post-operative mortality of morbidity, and in this respect it is superior to the other general anesthetics and nitrous oxide and oxygen. It is more troublesome to the surgeon, and should not be used unless the surgeon has familiarised himself with all the details of the technique; he should also be fully aware of the complications likely to arise. Spinal anesthesia is the best form of anesthetic in selected cases, but should be reserved for those operations in which the dangers of general anesthesia are increased.

Predetermination of Sex.—Brum (New York Med. Jl., June 6th, 1914) records the result of his efforts towards the predetermination of the sex of the infant in the case of thirty women who were under his care. He based his procedure on his observations that excess of nourishment of the mother predisposes to the birth of a female child, while deficiency in nourishment predisposes towards the birth of a male. Further, that the sex of the infant is largely determined by the activity of the adrenal glands of the mother, and where deficiency in this activity exists a female child is likely to be formed. Of the thirty patients twenty came under treatment during the first two months of pregnancy, and ten after the second month. These mothers all desired to have male children. These patients were all put on a strict diet till after the fourth or fifth month of pregnancy. Rich albuminous food, such as eggs, meat, fish and cheese, were strictly forbidden, and the diet largely consisted of such substances as cereals, fruits, potatoes, milk, buttermilk, and butter. Each patient was given after each meal a capsule containing two grains of the extract of suprarenal gland combined with four grains of lecithin. Of the twelve patients who came under treatment before the end of the second month of pregnancy all gave birth to male children, and of the remaining ten six gave birth to male children. Brum concludes that it is safe to say that we probably have definite means for the predetermination of the male sex if the following essentials of treatment are carried out. Treatment should be instituted immediately after the woman has missed her period. Foods rich in albuminous nitrogenous materials should be inter-
dicted. Extract of supra-renal gland combined with lecithin should be administered regularly and the treatment continued during the first five months of pregnancy.

K.

Emetine in Dysentery.—Friedenwald and Rosenthal (New York Med. Jl, July 4th, 1914) describe the result of the treatment of nine patients dysentery by means of emetine. The patients, seven males and two females, ranged in age from 10 to 42 years. The anaebas were demonstrated in all cases except one. The treatment was begun, but could not be observed after the first day of treatment. The patient in whom they were not found had been having frequent injections of argyrol. The result of treatment, however, was so marked that the treatment was repeated in the second attack diagnosis. The protocose was used in all instances and the ulcers observed, scrapings being taken for the demonstration of the organisms. Examination of the blood showed a high leucocyte count, which diminished as the disease abated. The drug was employed hypodermically in the form of the hydrochloride in doses of from one-third to one-half a grain three or four times daily for about a week. In all instances the drug was well borne. In a few instances purging occurred to the point of the whole body, but this symptom always disappeared within a week or two. Usually after the third or fourth injection the stools began to lessen in number, from eight to ten a day to one or two; the bowel movements disappeared entirely and the bowel could no longer be felt. In all instances the patients improved rapidly in general health, and the rectal ulcers disappeared after a week or ten days. As a result of their experience, the writers came to the following conclusions:—Emetine is a specific in the treatment of amoebic dysentery. It is quickly absorbed, and its effect is rapid and striking. It produces no unfavourable symptoms, such as nausea, vomiting and depression. The drug is not altered in the intestines, and is absorbed with but little modification. It is not influenced by this remedy, so that its employment as a diagnostic measure is of the greatest value. Recurrences after apparent cure are not infrequent, and therefore it is best to treat all cases showing a tendency to relapse intermittenly with emetine.

Appendicular Grafting.—Braham (Brit. Med. Jl, July 11th, 1914) reports that a boy, aged 11, fell when walking on a railing and bruised his perineum, causing extravasation of urine. The tissues in the groin were incised and a catheter passed through a supra-pubic cystotomy. Excessive straining ensued and loss of the distal portion of the urethra. Two months later (November 1913), an unsuccessful attempt was made to reconstruct the urethra. Another attempt in March failed. At the end of May, 1914, the writer dissected out of the proximal and distal portion of the urethra in the perineum, and removed as much scar tissue as possible. At a resected portion of the spheno-sonas vein was found to have too small a calibre, the patient's appendix was removed and used as a graft. The serous coat of the appendix was scarified and half an inch of its distal end removed, the whole graft being over an inch in length. A rubber catheter was passed through the penile portion of the urethra and the appendix then threaded on it. The point of the catheter was then passed into the bladder. It was then quite easy to unite the mucous membrane of the urethra and the appendix at either end, and that being accomplished, the wound was supported. The catheter came out in four days, but was replaced under an anaesthetic of it's distal end removed. Nine days after the operation the catheter was left out, the perineal wound was healed, and the urine has ever since passed naturally. The boy is about, and mitractates freely and normally without discomfort.

NEW PREPARATIONS.

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Under the formula—

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The use of the triangular bandage in first-aid work is well recognised, and it has been customary to print upon the bandage the directions for the method of application. An advance in the quality and clearness of the pictorial representations has recently been effected in connection with the "Tabloid" triangular bandage. The designs are plain, precise, complete, and in accordance with the latest practice. Another point of importance is that these particular bandages are compressed into a small space, one bandage occupying no more room than a match-box, and they can, therefore, be carried without inconvenience in the pocket of the first-aid man. Each packet is provided with a stout covering which will resist wear and tear.

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Clinical Congress of Surgeons.

We are asked to announce that the medical staff of the Central London Throat and Ear Hospital, Gray's Inn Road, invited their American correspondents to breakfast at the Great Northern Railway Hotel, at 9 a.m. on Thursday, July 30th, and at 10 a.m. to visit the hospital.

Cards of invitation on application to the Dean.

NOTICES TO CORRESPONDENTS.

Correspondents requiring a reply in this column are particularly requested to make use of a Distinguished Signature and Initial, and to avoid the practice of signing themselves "Reader," "Subscriber," "Old Subscriber," etc. Much confusion will be spared by the attention to this rule.

SUBSCRIPTIONS.

Subscriptions may commence at any date, but the two volumes each year begin on January 1st and July 1st respectively. Terms per annum, 21s.; post free at home or abroad.


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Dr. William Bruce, M.D., of 34, Greenhill Gardens, Edinburgh, late surgeon to the Duke of Buccleuch's Militia at Dalkeith, left estate of the gross value of £16,263.
MEDICAL PRACTICE IN THE FEDERAL DISTRICT OF RIO DE JANEIRO.

To the Editor of The Medical Press and Circular,

Sir,—By the courtesy of the Privy Council I have received a copy of a despatch from His Majesty's Consul-General at Rio de Janeiro stating the conditions under which persons holding foreign diplomas are permitted to practice medicine, surgery, and dentistry within the federal district. I send a copy in order to show to those who care to call at this office; it will be incorporated in the next edition of the pamphlet, published by the Council, giving the conditions under which憋 persons qualified in their own country may practice abroad.

Yours faithfully,

NORMAN C. KING,
General Council of Medical Education and Registration,
299 Oxford Street, London, W.

STAFFORD (Edinburgh).—In reply to your enquiries (a) we have it on the authority of the Register-General that no fatal case of small-pox occurred last week throughout the United Kingdom; (b) the publication of Abrupt is not officially given in the returns of Great Cities and Towns, but is, we understand, about 60,000. That of Edinburgh, according to the latest census returns, is given as 320,000, and that of Glasgow 1,467,000.

PRIZER.—The matter is one requiring consideration, and, after due inquiry, we will communicate with our correspondent privately.

Yours,—We shall be glad to consider the proposed article.

THE MEDICAL DIRECTORY.

To the Editor of The Medical Press and Circular.

Sir,—The annual circular of The Medical Directory has been posted to every member of the medical profession. Another copy will be forwarded on request, should the first notice have inadvertently gone astray.

It should be the practice of practitioners will kindly co-operate in returning forms to us promptly, so that the entries may be as accurate as possible.

To meet the convenience of purchasers, the Directory will be on sale this year EARLY in the month of December.

We are, your obedient servants,
J. H. and A. CHURCHILL.
7 Great Marlborough Street, W., July 25th.

T. D. (London, W.)—We regret that through the negligence of clerks in the Low of London we are unable to publish your letter.

Vacancies.

Certificate Factories Surgeons.—The Chief Inspector of Factories announces the following vacant appointments:—Ashton-under-Lyne (Lancashire) (Ralph Beswick), Hulme Dispensary, Dale Street, Stretford Road, Manchester.—House Surgeon. Salary £100 per annum, with apartments, and 15 per cent. on all amounts. Application to Mr. W. G. H. Bennett, Secretary. (See Adv.)

Bolton Infirmary,—Sanitary Dispensary.—Senior House Surgeon. Salary £120 per annum, with board, residence, and laundry. Applications to T. Elwyn Kershaw, Secretary.

Bootle Borough Dispensary.—House Surgeon required. Salary £120 per annum, with residence, board, and laundry. Applications to the Secretary, 71 Oriel Road, Bootle, Lancs.

Bristol City Hospital.—Assistant Medical Officer. Salary £200 per annum, with furnished apartments, board, washing, and lodging. Application to the Medical Superintendent, Maidstone. (See Adv.)

Kent County Asylum, Maidstone.—Fourth Assistant Medical Officer. Salary £200 per annum, with furnished quarters, board, attendance, coal, gas, garden produce, milk, and washing. Applications to Medical Superintendent, Maidstone, Maidstone.

Hull Royal Infirmary.—Senior House Surgeon. Salary £150 per annum, with board and furnished apartments. Applications to Chairman of Committee.

North Lansdowne Hospital, Barns-in-Furness.—House Surgeon. Salary £100 per annum, with residence, board, and laundry. Applications to the Secretary.

Northampton General Hospital.—House Surgeon. Salary £220 per annum, with apartments, board, washing, and attendance.

Appointments.

DEILD, GERALD C., M.B., Ch.B., Manchester, Second House Surgeon to the Manchester Royal Eye Hospital.

FLEMING, G., M.D., C.M., North Bristol Bootle.

HULME.—Senior Medical Superintendent to the Durham County Sanatorium.

KOOGAN, CHARLES L., M.R.C.S., L.R.C.P., Honorary Assistant Physician to the Municipal Hospital, London.

MILLER, S., M.B., B.Ch., House Surgeon at the Royal Victoria Hospital, Manchester.

MURPHY, W. MAXWELL, M.B., Ch.R.Edin., F.R.C.S., Surgeon to the Ear, Nose, and Throat Department at the Dewsbury General Hospital.


SUTHERLAND, GEORGE W., Ch.B., Ch. Surgeon, Resident Surgical Officer to the Manchester Royal Eye Hospital.

Births.


HOLLAND.—On July 22nd, at 35 Essex Anne Street, the wife of Earle Holland, M.D., of a daughter.

PASMORE.—On July 21st, at Chesham House, Warrington, the wife of Dr. E. S. Pasmore, M.R.C.P., of a daughter.

REWS.—On July 19th, at Watton Grange, Bedfont, Middlesex, to Dr. and Mrs. Rev. daughter.

Marriages.


BAROES-ABEL SMITH.—On July 25th, at Southwark Cathedral, Barley Barou, son of Dr. and Mrs. Barley Barou, of Clifton, Bristol, to Rachel, daughter of the late Abel Smith, M.P., and of Mrs. Abel Smith of Crowbury, Hertford.

D'OLIVARIAN—HUMPHREYS.—On July 21st, at St. George's Cathedral, Southwark, Thaddeus Turner O'Callaghan, Surgeon, elder son of P. T. O'Callaghan, of West Norwood, to Adelaide Humphrey's, youngest daughter of the late Thomas Humphreys, of Ennute House, Chester.

TOOMEY-ABBOTT.—On July 22nd, at Holywood Church, Somerset, Dr. Frederick Tooth, of the Old House, Nethew, Stowey, Bridgewater, to Kathleen, daughter of Mrs. Archer, of Aller Park.


Deaths.

BARTON.—On July 29th, at Cheetham, Edwin William Barton, M.D., of Swallow, Lodge, Markham Bury.

BERRY.—On July 21st, at Romiley, Amelia Elizabeth, second daughter of the late John Betty, M.D., on July 21st, at Swinton, under 12 year's, 179 Jerningham Road, New Cross, London, James Montague Brand, surgeon, late of Stratton, N. Cornwall, in his 84th year.

KILGOUR.—On July 21st, at Chelsea, Frances, daughter of the late John Stewart Kilgour, M.D., of 2 Keynsham Bank, Chlesea.

RIVER,JONES.—On July 25th, at 4 Chesham Place, Gwендolyn, the eldest daughter of Dr. and Mrs. Ridg-Jones.

HULME DISPENSARY.

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WANTED 3 HOUSE SURGEON duly registered and fully entitled to practice. Salary £300 to £420 per annum, with apartments, coal, and gas. Applications, with testimonials, at once, to Honorary Medical Secretary.
NOTES AND COMMENTS.

The verdict of those members of the Aberdeen British Medical Association who attended the annual meeting in the B.M.A. was that it was a most successful gathering. The native attractions of the "Silver City" are sufficient in themselves to ensure the pleasure of visitors at any time, but last week these wereenhanced by fine weather and the splendid welcome extended to the Association by the local medical men and the citizens who did all in their power to entertain the members. One feature of the scientific proceedings will be connected with the Aberdeen meeting, and that is the prominence given in the three great addresses to medical history. Perhaps something in the atmosphere of the place itself, with its ancient and historic university and other associations, may have been responsible for this retro- spective vein of thought. It must not be supposed, however, that these discourses were for this reason inferior, from a scientific standpoint, to those of previous years. On the contrary, all three were of a high order and full of suggestiveness.

In view of the increased interest now shown in medical history it might almost be as well to add a new section or a sub-section specially to consider matters within its province at future annual meetings of the Association. Next year, at Cambridge, the propriety of so doing seems to suggest itself, and we beg to submit the proposition for the consideration of the Council of the Association.

The place of the Queen Alexandra Day Fund in the heart of the nation stands unaltered by the success of the Queen Alexandra Rose Day collection in aid of the London hospitals. After all expenses have been paid, the secretary, Miss C. May Boonan, has had some £20,000 to distribute, or about £6,000 more than the amount available last year. It is gratifying to note that the chief item of expenditure was that incurred in the purchase of the roses sold by the ladies who kindly acted as volunteer street collectors. This year the distributing committee under the Lord Mayor have made their grants upon a new and far more equitable system than that adopted in former years. It is understood that Queen Alexandra indicated, at the desire of the committee, certain hospitals to be benefited to the extent of £6,645. The result is that many small hospitals have for the first time participated in the grants of this most popular Fund, a fact that will do not a little to advance its prospects in the future. Some large grants have been made this year to some of the great and wealthy hospitals. It is not altogether easy to understand why citizens should be asked to contribute in the streets to a charity which literally draws in funds by special appeal in hundreds of thousands of pounds. On the other hand, there is every reason why the man in the street should contribute to the support of the small and special hospitals which minister to his needs and have done so for many a year, and some of the best and oldest of which are ignored by the King Edward Fund, which is gradually crowding out of existence the Hospital Sunday Fund.

The recognition of the small and special hospitals by the Alexandra Fund Precedent marks a change of policy that is consonant with the universal kindness and tact which has always characterised our Royal Family in these matters. The small hospitals, in spite of their many years of usefulness and their great share in the advance of medical science, are ignored, except in a few special instances, by the King Edward Fund, whose awards are made by a small committee, which includes no representatives of the small and special medical charities, but is composed of medical men and philanthropists, who, however amiable and beyond reproach individually, have nevertheless been always identified with a policy of absolute non-recognition of the smaller medical charities. The Medical Press and Circular has consistently raised its voice against this defect in the administration of the Hospital Sunday and the King Edward Funds. It has again and again contended that the fundamental error is to be found in the non-representative nature of the two Funds in question. The Hospital Saturday Fund, in which the small institutions are adequately represented, bestows its grants upon great and small alike. A system that collects huge sums of money from all classes of society and then entrusts its distribution to a small board of persons who rigidly exclude the smaller institutions must always remain open to the more or less grave suspicion that public interests are subordinate, in some instances at least, to private prejudices. Hence the supreme importance of the wider and more liberal extension of grants to all sorts and conditions of hospitals inaugurated by Queen Alexandra.

At an inquest held last month at Myrtle Hill, Lichfield, upon the body of a groomsmen who died from the effects of a horse-kick in the abode, the medical man who gave evidence took the opportunity of calling attention to the pressing need for the establishment of cottage hospitals in rural districts. The exact nature of the injuries sustained by this unfortunate man was not stated, but it is within the bounds of possibility.
LEADING ARTICLES.

THE ADDRESS IN MEDICINE AT THE ABERDEEN MEETING OF THE B.M.A.

In the annual Address in Medicine delivered before the British Medical Association at its summer meeting, we have come to expect an oration that will provide food for reflection, and which, at the same time, will enable us succinctly to review the various stages by which our present knowledge has been gained. The learned address delivered by Dr. Archibald Garrod last week at Aberdeen is, in these respects, a model which future lecturers might do well to copy. In dealing with medicine from the chemical standpoint he has aptly unfolded to our gaze the wonderful possibilities that underlie the influence of chemical science, and especially of that branch known as bio-chemistry, in modifying not only our conception but also the treatment of disease. Since the early investigations of Wöhler and Liebig the progress of chemical research in its intimate relations to practical medicine has grown steadily year by year.

Starting from the first synthesis of urea, the investigations of workers in the domain of the carbon compounds has proceeded apace until the molecular structure even of the proteins themselves is no longer hidden from the analyst's ken. Fresh conquests are still being made in our knowledge of those mysterious and complex organic bodies known as enzymes, and the researches of Aberydell have opened up a new field of investigation into certain specific chemical reactions. Some of these cannot but be far-reaching in their effect upon practical therapeutics, and in one direction, at least, the use of hormones promises to be of real service in conditions where the various internal secretions are judged to be at fault. How profound may be the bio-chemical changes involved in the diverse group of affections usually comprehended under the term "disorders of metabolism" we can, in the present state of our knowledge, hardly estimate. There is one point in Dr. Garrod's address to which we would specially draw attention, and that is that, most if not all, of our therapeutic efforts are inefficient as compared with the natural powers of protection with which the body itself is endowed. Many of these mechanisms are resident in the blood, while others appear to be associated with, or dependent upon, the glandular secretions. If through a greater understanding of the relationships between the chemical composition of the foodstuffs and that of the bodily

that if an exploratory abdominal operation had been performed within a few hours of the accident the man would have been saved. It is sad to think of the number of lives lost annually from want of that skilled surgical attention such as can only be provided in a cottage hospital. There is a far greater need for these institutions in small towns and villages than for reading-rooms and libraries. It is desirable thought these may be. Where human life is at stake no effort should be spared to provide means for its preservation. Surely no more fitting monument to anybody whose name it is desired to honour could be found than a cottage hospital established in some country district where its beneficent work would continue to be done as a memorial to the name of its founder. The erection of clock-towers and statues, however beautiful, and even useful, cannot compare in practical utility with one small cottage hospital. We commend this need to all pious philanthropists and especially to those who desire to erect some memorial and who are yet undecided as to the exact form it should take.

The gradual disappearance of Shellfish and enteric fever from our midst has Enteric Fever proved one of the outstanding triumphs of modern sanitation. Indeed, in the British Medical Journal it was pointed out that there was in the past a mistaken idea that typhoid fever is primarily an enteric disease which occurs in this country. The disease was regarded as an importation from abroad. It is now known, of course, that the disease is indigenous to this country.

We are not aware that any serious accusation has been advanced against the mussel in this particular connection. Indeed, having regard to the fact that the mussel is boiled before consumption, it is presented to mankind in a condition which not only preserves the food from the consumer of living pathogenic bacilli. The mussel is invariably cooked for eating purposes, so that it is completely sterilised, and the only living microbes conveyed by it would be those acquired by contamination after cooking. The attempt to exculpate all shellfish because of the rumour that they are infected is futile and misleading. The first great distinction, so far as the spread of disease is concerned, depends on the primary fact as to whether the shellfish is cooked or uncooked. It is a matter of established scientific observation that enteric fever may be, and is, conveyed by solutions of contaminated oysters. That fact cannot be gainsaid, and a similar statement applies to other kinds of shellfish that are eaten raw. The saving grace of the kitchen saucepan converts the mussel from an active danger to an innocuous foodstuff. It can render a similar service to the oyster; but mankind has a fixed and lasting preference for the flavour of the living oyster. It is interesting to note, by the way, how the humanitarians connive at the barbarous way in which the oyster is swallowed alive. Nowadays it is the fashion of these tender-hearted emotionalists to protest against the cruelty of exterminating flies by "sticky" fly-papers. Why strain at a gnat to swallow an oyster?
secrections we shall be able the better to influence the complex processes of metabolism, we shall have gained much as practitioners. In the case of diabetes we do possess the knowledge whereby the output of sugar is largely in the hands of the medical man. With regard to the restriction or prohibition of certain articles of diet in other diseases, much responsibility rests upon the medical profession. In the twentieth century, however, we are in possession of greatly increased knowledge both from the physiological and also from the chemical side, and the help thus derived from the pathological and clinical laboratory should never be minimised nor refused by the practitioner who is anxious to do the best for his patients. Increased powers of diagnosis, as afforded by modern scientific tests, the basis of which consists of the application of some profound chemical reaction, must lead to correspondingly improved methods of treatment. By calling the attention of the medical profession, as it does, to one aspect, and that of great importance, of the science of medicine, the Address in Medicine of 1914 will be remembered as a most thoughtful and earnest discourse.

THE ADDRESS IN SURGERY AT THE ABERDEEN MEETING OF THE B.M.A. An account of the evolution of the practice of surgery since the introduction of anaesthetics and asepsis, with a vivid description of all the horrors attendant upon operations before the days of Morton, Simpson and Lister, would, we venture to think, provide the average reader with quite as much excitement as may be found within the pages of most novels or works of adventure. To say that the modern surgical operation is absolutely without risk would, perhaps, be asserting that which is not true, but that it is practically so in favourable circumstances and when undertaken by skilled hands few will be found to deny. The attainment of the highest success in surgery, however, does not lie in operative manipulations alone. As Sir John Bland-Sutton, F.R.C.S., Surgeon to the Middlesex Hospital, remarked in his stirring Address in Surgery delivered in Aberdeen last week, the surgeon is dependent upon many things—naturally upon histology; and he, like the physician, has also to acknowledge the aid given him by the findings of the clinical laboratory. The examination of the blood, for instance, is of supreme importance in determining the advisability of an operation for the removal of the spleen. Recent research in connection with the choroid plexuses must cause us to modify greatly our conceptions with regard to the function of the cerebral spinal fluid, which, according to Sir John Bland-Sutton, has been thereby transformed from that of a water-bed for the central nervous system to an actual "pool of Bethesda." Exactly upon what lines the "surgeon of the future" will work remains to be seen. To some extent he may even become an immunist, like his brother physician, but it is not unlikely that chemo-therapeutic means will influence his treatment, particularly in disorders of the nervous system. Dealing with the influence of sepsis upon malignant disease, especially of the large intestine, Sir John Bland-Sutton pointed out that the surgery of cancerous growths was greatly hindered by septic organisms. The comparison of an army of operators, dressers and nurses, all in a perfectly sterilised rig-out, to engage in the resection of a malignant growth of the colon, itself swarming with pyogenic organisms, to "killing fleas with bludgeons" may raise a smile, but nevertheless the incongruity of the situation must have often struck a critical onlooker. If some chemio-therapeutic agent, analogous to salvarsan, should ever be discovered which would be a specific for all pyogenic cocci, much of the surgeon's work would be simplified. One timely word of caution contained in the Address may be referred to—namely, the necessity for estimating all laboratory reports in the light of clinical experience. To pin one's faith to one without the other is only to court failure.

CURRENT TOPICS.

The Clinical Congress of North American Surgeons. The North American surgeons last week held their fifth Annual Clinical Congress in London. Their programme, needless to say, was full and varied from the social as well as the scientific point of view. One interesting experience was that of witnessing the skill of London surgeons in a variety of operations. Cancer cases were the chief object of study yesterday, and many skilful and instructive operations and demonstrations were seen. The visitors were extremely interested in Mr. S. G. Shattock's lecture at the Royal College of Surgeons on the origin and growth of tumours, in the course of which he propounded the theory that cancer is neither hereditary nor transmissible from one person to another, but may be transferred from one portion of the body to another. Mr. Sherren's operations for cancer at the London Hospital were spoken of in terms of high praise. In one case he removed practically the whole stomach and substituted for it the upper part of the intestine. A long series of operations performed by Mr. Spencer at Westminster Hospital, including operations for abdominal tumour, excision of cancer of the breast, jejunostomy for inoperable cancer of the cardiac half of the stomach and excision of cancer ring from bilocular stomach, were spoken of as really wonderful. It is not possible to review even briefly the field of work covered by the Congress, which will be closely followed by surgeons all over the world. To some extent the Congress has been overshadowed by the British Medical Association meeting going on in Aberdeen at the same time. In early issues our readers will have an opportunity of perusing some of the most prominent papers read at this notable gathering.

Cleverness. If a medical man is doing well we are sure to hear it said that he is clever. The users of the term are quite vague as to its significance, but they mean it as a compliment. Really it is far from that. Disease is not combated by a sophisticated cunning, nor has an assumption of breezy astuteness any
terrors for the weakest micro-organism. Our real weapon is knowledge; knowledge, and not cleverness, is the interest we receive from our toilsome grey-batter inventories. To the real man, red or white, no insult. It suggests a scariness, a puckish perversity, and a meritless excellence in mental window-dressing that we should not hanker after. We can say with equal dignity and truth that Wright knows something about vaccines, but to remark that Metchnikoff is clever at color-s is highly remiss of the word. Cleverness and application of efficiency tinged with a certain contempt. There are some people who are essentially clever—and no more. They are ingenious, quick and many-sided; but no one could call them geniuses or great. Just as almost any girl deserves the epithet pretty, while her worst enemy could not call her beautiful. The typical worker-doctor is rather a dreadful person. He knows his work, and has all the qualities of an expert salesman. His therapeuticities are down to the minute, and he is always in a hurry to use the latest cure while it is still efficacious. He usually has an eye to what people call "the main chance," and does a lot of good work of no lasting value. On the whole cleverness is a tinkling cymbal. It is nothing worth. It combines a shallow, hand-to-mouth, mentality, with three lines of Du Bartas, but it will never even change the pebbles of our puddly thought to anything at all resembling oriental pearls.

Oral Sepsis as a Cause of Death.

A distinct advance in the practical importance of oral sepsis as an established malady was last week registered by its appearance as a cause of death in the Southwark Coroner's Court. The septic condition of the teeth and sockets was the cause ascribed by Dr. Larkin for the death of Rosina Snelgrove, aged eight years. He said that she had lost permanent teeth, the sockets from which teeth had been extracted, and the gums were in a bad condition. The gums had entered the blood stream, and set up general blood-poisoning throughout the body. Dr. Larkin added that one of the most distinguished members of the medical profession died recently of precisely similar disease. In this instance the patient was a busy man, and had no time to attend to his teeth, and his illness was, like that of the deceased child, of short duration. The jury returned a verdict in accordance with the medical evidence.

Debt Certification.

We all of us have to sign debt certificates on occasion. Some of us take them calmly as of no more significance than the eternal "not fit to follow his employment" scripts that we endlessly issue. Others have, or make, time to think about them. They are occasionally depressing. The few ill-chosen words are all that is left of a good friend or a valuable chronic. They are the outward and visible sign of every little bit of hypocrisy and impurity which is within our mortal. At the annual meeting of the British Medical Association at Aberdeen, Sir Victor Horsley and others have been urging a reform in the matter of these and other certificates. We all know that at present they are almost valueless from a statistical standpoint. It may happen that debt certification is to some extent misleading, but have to be definite after death however we wavered while our patient was alive. There are many cases where we do not even fill up the certificates as we know we should. We do not wish to hurt the living so we magnify the dead. Of course, we do not put false certificates—such a thing is unthinkable—but, whilst avoiding saying that which is not, we omit to mention that which obviously is. We are encouraged to do so by the hopeless terminology to which we are confined. Sir Victor mentions that the Registrar-General's list of death include "hysteria," "neurasthenia," and "neuritis," and that in 1014 out of 500 deaths were attributed to neuritis. For "neuritis" cognoscenti read "alcohol." Venerable diseases, too, are almost always dodged. On the whole the statistics obtained from death certificates are nothing like as good as they might be, and under the present system it is too much to ask the average man to offend his patient where he need not. The solution of the difficulty is very clear. So clear that we are surprised at its suggestion. Sir Victor proposed the immediate institution of a confidential system of death certification. There is no reason against it. When one of the public is dead it is no concern of the others what terminological inexactitudes are applied to the manner of his exit.

Payment for Medical Certificates.

As inquest held last week at Sheffield throws a lurid light on the popular estimate of medical service. The friends of a deceased panel patient complained bitterly at an inquest of the conduct of a medical man in compelling payment for a death certificate. The jury returned a verdict of death from a "medical accident," i.e., disapproving of the doctor's action in charging a shilling for death certificates to such poor people simply on the ground of being private patients. This extraordinary comment illustrates somewhat vividly the attitude of the man in the street with regard to medical certification. So used is he to gratuitous service that he has come to regard this special form of assistance as a right as regards medical certificates of all kinds. It has often been pointed out in these columns that the State has exploited medical men for gratuitous service in a way that would not be tolerated in any other profession. What would the legal profession, with its multitudinous fees, say were a variety of responsibility signified documents of an absolutely indispensable legal nature to be demanded of them compulsorily without fee or reward? One of the ever-present annoyances of the honorary hospital physician or surgeon is the request for certificates by patients, who often draw sums of money on the strength of documents. Large sums do not go the lawyer without asserting that under no circumstance should any medical certificate be granted without a corresponding fee, and if the person to whom it is granted be unable to find the necessary amount, it should be paid by the body by whom the certificate is demanded, whether that be a private or a public organisation.

S.P.C.P.

The paternalism of the German Government is a thing of joy to many of us. It amuses us to think of the host of things we do that are "verbotten" to others. The idea of being fined for riding a bicycle without holding the handles gives us over to laughter which becomes Olympian when we remember that rescuers of drowning people have been indicted for bathing in forbidden waters. We feel so superior. We think that we are not as other men are, but free citizens of a free country. And we keep a look-out for instances of grandmitherly legislation on the Continent. According to the Chemist and Druggist, the Bavarian Government is keeping up the Empire's reputation. It has passed a law for the protection of plants. It forbids the pulling up of certain protected plants except by teachers and students of natural history and members of societies devoted
to the study of natural science, who may, through the instrumentality of a police permit, approach the authorised sacrifice. Of course, the definition of a student of natural history is rather difficult. So far it has been decided that chemists' apprentices are students, but the fully-qualified pharmacist is presumed to know all that there is to know, and is by no means to pluck the amaranthine flower. We wonder how the Government proposes to compete with the Boriforous infant. Is he to be made a "student of natural history," or is he merely protected by his tender years? We fear that a dare-devil race of daisy pickers will descend on Bavaria, and, with little children as accessories, will "run" protected herbage with the ease and frequency with which Irishmen import rifles. There will be trouble. Flower-pickers will have to seek a refuge before they pluck, and a course of botany and a dictionary of flowers will be adjuncts to every country ramble. Flowers will become unpopular. They will blush unseen and unsought. The seeking will be too risky. We can apostrophise with Milton: "O, fairest flower! No sooner blown but blasted."

The Sixth International Dental Congress.

This week the sixth International Dental Congress—the first ever held in this country—is being held in London under the presidency of Mr. J. Howard Mummery. About 2,000 dentists of all nationalities will attend the meetings. There will be ten sections, and among the papers read are those of Sir J. R. Godlee, upon "The General Effects upon the System which may be attributed to Toxemia of Oral Origin." Mr. Norman G. Bennett, president of the section of oral hygiene, will report on "The Effects of Dental Treatment on National Health and Physiology." Dr. J. F. Dowsley, of Boston, will describe the Forsyth Dental Infirmary for Children—an institution which has cost one million dollars, and will be opened in the autumn. An informal social meeting of the Congress took place at the Hotel Cecil on Monday evening and the Congress was formally opened by Mr. Herbert Samuel at the Central Hall, Westminster, on Tuesday, at 10 a.m. The social engagements included a reception by the Lord Mayor and Corporation at the Guildhall on Tuesday, at 8.30, an invitation banquet given by the Government on Wednesday, and a Congress banquet at the Anglo-American Exhibition on Thursday. The British Dental Association will give a reception at the Natural History Museum, South Kensington, on Thursday.

PERSONAL.

Dr. Kate Anne Platt has been appointed Principal of the new Queen Mary Medical College at Delhi.

Mr. G. Viner, M.D.Lond., F.R.C.S.Eng., has been appointed Assistant Surgeon to the Royal Westminster Ophthalmic Hospital.

Mr. A. W. Bonne, M.B., B.C.Cantab., F.R.C.S. Eng., has been appointed Obstetric Surgeon to Out-patients at St. Mary's Hospital.

Professor Paul Reclus, the eminent surgeon, who was largely instrumental in making general the use of cocaine as an anaesthetic in surgery, died in Paris on Wednesday last at the age of 67.

Professor J. C. Bose, of Calcutta, will deliver a lecture at the Royal Society of Medicine on October 30th, on "The Modification of Response in Plants under Action of Drugs," illustrated by experiments.

Dr. Fielden Briggs will preside at the annual meeting of the British Medical Graduates' Association to be held at the Earl's Court Hotel, Totham Wells, on Saturday next, August 5th, at 1.30.

The Duncan and Lalaee medals of the London School of Tropical Medicine have been won by Captain J. C. Munro, M.D. (Glasgow) of the Indian Medical Service, who passed the recent qualifying examination with distinction.

Dr. A. W. Neill, senior assistant at the Royal Edinburgh Asylum for the Insane, Edinburgh, has been appointed physician-superintendent of Warrndale Asylum, Oxford. Dr. Neill has been six and a half years on the staff of the Edinburgh Asylum.

A LARGE number of the members of the Committee of the Sunderland Royal Infirmary and friends recently gathered at the Infirmary Chapel to make a presentation to Dr. A. Bruce Low, one of the Honorary Physicians, who is leaving Sunderland for the South.

Among the distinguished foreign Surgeons present at the Congress of Clinical Surgery last week were Dr. John B. Murphy, of Chicago, Dr. Charles H. Mayo, of Rochester, Professor Schmiegelow, of Copenhagen, Professor König, of Freiburg, and many others of world-wide fame.

Prof. William Stephenson, Emeritus Professor of Midwifery in the University of Aberdeen, was presented last week with a handsome portrait of himself by Mr. C. Lindsay Smith, while another portrait by the same artist was handed over to the University to be hung in the portrait gallery.

The Madras Government has decided upon a close scientific investigation into the causation and prevention of the course of diabetes, and has appointed Dr. S. W. F. Power, a Melbourne doctor, who holds a Beit Fellowship, which carries with it £500 per annum, which will be increased by the Beit trustees to £400 per annum, while an anonymous native donor in Madras will supplement this with a similar payment, and will also pay for all the necessary equipment.

Athurst Hill, in the presence of a huge crowd, a memorial was last week unveiled as a spontaneous tribute of those among whom he did his life's work to the late Dr. I. J. Baker. The memorial bore the following inscription:—"He endeared himself to all who knew him by the uprightness of his character, his sympathy with the suffering, and especially by his kindness to the poor man. In affliction he was a spiritual adviser, he cheered the dying with his prayer and words of comfort. By his good deeds, he being dead, yet speaketh."

Of those who served in the Anglo-American Ambulance 40 years ago during those terrible days at Sedan, Paris, and Orleans, Dr. Charles F. Ryan, Glenlara, Tipperary, is one of the few survivors. He has only now received the Brevet and Decoration from the French Minister of War, bearing the seal of the Chancery of the Legion of Honour, May 7th, 1914. For his services to the wounded in the same campaign Dr. Ryan had conferred on him at the close of the war the German Military Cross of Louis H. of Bavaria, and also the Bronze Cross of the French Ambulance Society.
CLINICAL LECTURE
ON
ABDOMINAL TUBERCULOSIS. (a)

By EDMUND CAUTLEY, M.D.Cantab., F.R.C.P.Lond.,
Senior Physician in the Metropolitan Hospital and to the Belgrave Hospital for Children.

ABDOMINAL tuberculosis occurs at all ages, and is most common in children and young adults. About half the cases under the age of 15 years are from three to six years old. It may occur in the first year of life, but is comparatively rare before the third year, and very rarely as part of an acute military tuberculosis. Boys and girls are equally susceptible. The glands, intestines, or peritoneum may be affected, alone or in varying combinations.

Ulcration of the intestines is the least common type. It usually begins near the ileo-caecal valve, and occasionally is very extensive and distributed through both the small and large intestine. Anorexia and wasting are the earliest symptoms. Diarrhoea depends on the extent of the ulceration and on secondary ileo-colitis, the stools becoming offensive and containing mucus, pus, and sometimes blood. In a girl, aged 4 years, who had been ill for eleven months, the above symptoms were present, together with colicky abdominal pain, and enlargement of the liver. Nothing abnormal could be felt in the abdomen. After death numerous ulcers, many completely encircling the gut, were found in the small intestine; extensive ulceration of the caecum; and two large ulcers in the colon, which had given rise to considerable stricture. At the bases of the ulcers there was a little adherent peritonitis, matting together adjacent coils of gut. No caseous mesenteric or mediastinal glands were found, a notable point in view of the opinions held on the introduction of the bacillus via the alimentary tract. The primary focus was a caseous nodule in the upper lobe of the left lung. Constipation is not infrequent in these cases, although there may be extensive ulceration, and reflex vomiting is not uncommon.

Tuberculosis of the mesenteric glands is a much more frequent condition, often present without giving rise to symptoms and only recognised after death from some other disease. The name "tubes mesenterici" ought to be reserved for cases of limited type. And yet it is difficult to say whether a gland exists without obvious pathological change or ill-health, not being suspected until the peritonitis is involved. Sometimes enlarged glands are discovered during routine examination of the abdomen. The common situations are to the right of the umbilicus, above and below its horizontal level, and to the left of and below the umbilicus. As a rule the glands are hard, localised and movable. They must be distinguished from faeces, caseous masses, tumours, chronic appendicitis and subacute intussusception. In a very healthy girl of 15 years, who had lived on the East Coast all her life, there was found a definite lump in the right iliac region a little above the usual level of an appendix abscess. She had had a history of two or three attacks of "appendicitis," the last one about a fortnight previously. At the operation this lump was found to be due to tuberculous glands in such an advanced stage of degeneration that one broke down during handling. Both the glands and the appendix were removed, the latter showing marked evidence of old and recent inflammation, and recovery was uneventful. Had no operation been done it is practically certain that the softened gland would have required and caused caseous peritonitis. This is one of the sequelae of caseous mesenteric glands. More commonly they cause, dry up and calcify, giving rise to no further trouble. Sometimes they set up adhesive peritonitis. Many years ago I saw a man, who had previously been in hospital for ascites from which he had made a good recovery. He was feverish and had general bronchitis. I regarded the case as one of general tuberculosis in spite of the history of ascites and of heavy drinking. This was verified after death. In the abdomen were found two cheesy tuberculous masses and generalised adhesions. The liver gave no indication of alcoholic habits, and I had no doubt that the previous ascites was the result of tuberculous peritonitis.

In the diagnosis of tuberculous mesenteric glands importance may be attached to such signs as general ill-health, slight fever, anorexia, constipation, colicky pains and hepatic enlargement. Many of these symptoms are also present in intestinal dyspepsia, to which I shall refer later.

Acute military tuberculous of the peritonum may be a part of a general infection and give rise to no special localising signs. Sometimes acute peritonitis is due to acute tuberculosis of the peritonum alone and is indistinguishable from other types of infection. Thus a boy, aged 12 years old, was seized with vomiting and abdominal pain. On the third day he was almost moribund from toxemia and collapse, with a distended and tender belly. I regarded the case as one of acute pneumococcal peritonitis but, when the abdomen was opened, the peritonum was found studded with grey and yellow miliary tubercles. He made an uneventful recovery. Sometimes the acute outbreak occurs round the caecum and simulates appendicitis.

In distinguishing acute tuberculous peritonitis from other types we have certain facts of some assistance. Thus, pneumococcal peritonitis is more common in girls than boys and in half the cases is secondary. The onset is generally sudden, the temperature high, diarrhoea often present, perhaps hemoptysis, and leucocytosis is considerable. Sometimes the peritonitis is diffuse, severe, persistent and rapidly fatal. More often it quietens down in a few days, but diarrhoea persists, meteorism develops and an abscess forms. It used to be thought that an abdominal abscess discharging at the navel was almost invariably tuberculous. I believe such an abscess is often pneumococcal, and in one case I found it due to diverticulitis, resulting in fecal fistula. A pneumococcal abscess may be encysted, forming an abdominal empyema, in any part of the abdomen, usually below the level of the navel and generally discharging through the navel in 4-6 weeks. It may perforate the stomach, vagina or bladder.

Pneumococcal peritonitis is practically limited to the female sex, being due to an ascending infection.
via the Fallopian tubes. It is rare before four years of age, and vulvo-vaginitis is almost invariably present. In a localised form it causes salpingitis, which can be recognised on rectal examination. Fever, frequent micturition, alternating constipation and diarrhoea, and the usual signs of peritonitis, perhaps most marked in the lower segment of the abdomen, are present. Acute symptoms subside rapidly, for the vitality of the organism in the cellular tissues is small.

In new-born babies acute peritonitis is generally streptococcical in origin. At all ages appendicitis and perforative lesions must be carefully excluded. And the illness must be differentiated from typhoid fever, scarlet fever, and peritonitis secondary to tuberculosis, appendicitis, subacute peritonitis, suppurative peritonitis, external peritonitis, and abscesses are rather sequels of other types of peritonitis of the abdomen than primary conditions. They must be diagnosed from other cysts and tumours. In women the truth may be only arrived at by exploratory laparotomy.

**Prognosis.**—The outlook in tuberculosis of the abdomen depends on social position, age, sex, the type of the disease and partly on the extent. As long as it is limited to the abdomen the prognosis is fairly good, even in the caseous type and still more so in the adhesive and ascitic forms. The acute stage of the ascitic type lasts 4-8 weeks or more, and it then becomes adhesive. The adhesive variety is rarely fatal though it may last for a year or more. Sometimes in cases of intestinal obstruction, and general dissemination may occur. In one such case peritonitis and abdominal distension were severe. On opening the abdomen constricting bands were found and divided, but a few days later death ensued from tuberculous meningitis; and I think the vomiting and constipation were really due to this and not to obstruction. In a few cases of caseous peritonitis, in which all the intestines are matted together, it is quite common for the bowels to act normally. The chief bad signs are dissemination, intestinal ulceration, lung infection, pleurisy, obstruction, caseous masses, localised suppuration, and cutaneous haemorrhages; exacerbations with fever, vomiting, diarrhoea and rapid wasting. Relapses are not infrequent.

**In treatment,** primary attention must be paid to hygiene, nursing and diet. Bed is essential during acute stages and for a fortnight at least after fever has subsided. It is better to keep these patients under your own charge, if a decent home and nursing are available, rather than dismiss them to the country or seaside. Parents and relatives are quite to think fresh air is the all important element in treatment, whereas much more depends on careful feeding, nursing and medical treatment.

**Feed the patient on milk, peptonised if necessary, Benger's Food, for in its preparation partial digestion takes place, meat jellies, beef tea, beaten-up eggs, vegetable soups or fruit juices, raw bread, and milk. Avoid boiling, and first give bread or rusk and milk, during the acute stages, and for some time longer unless the stools are normal in character. Then add to the diet chicken or veal cream; pounded-up undercooked meat and mashed potato; fish and minced meat. Avoid all fermentative foods. Malted foods, malt sugar, and all other foods generally perishable. The diet must be highly nutritious and easily digestible, containing little waste matter. Milk must be given in moderation and is often unsuitable, forming large indigestible curds. If so, it must be diluted or partially predigested. Or some of the malted milks and dried milk foods can be given.**

Local and general measures for acute tuberculous peritonitis are those suitable for peritonitis from any cause—e.g., bandaging the abdomen for with absolute certainty that there is no tuberculous, for both conditions may be present in the same child, and the intestinal dyspepsia may be secondary to the tuberculosis. A negative von Pirquet reaction may be of some assistance. Yet the differential diagnosis is of grave importance, seeing that the treatment suitable for tuberculous disease often exaggerates the signs of intestinal dyspepsia, codliver oil and seaside air rarely being suitable. The "Coeliac Disease, or Belly Affection," occurs in infants under 2 years and is rare after 4 years of age, and is characterised by abdominal distension and white stools. It is also often mistaken for abdominal tuberculosis.
support, keeping pressure off, and applying bran poultices or ice-bags if they can be borne. Incision and drainage is necessary in a few cases. In the chronic ascitic type, and especially if there is any suspicion of purulent effusion, it is advisable to open the abdomen. Paracentesis is dangerous, for the gut may be adherent to the abdominal wall. Surgical measures are not as warmly advocated now as they were few years ago. Formerly the prognosis of this disease was regarded as very grave. Then it was found that in cases in which the abdomen was opened through a mistaken diagnosis of the condition as one of renal sarcoma, pyosalpinx, ovarian cyst, etc., recovery took place. It was consequently argued that the beneficial result was due to the operation, by letting in air or oxygen, by evacuating toxic fluids, or by altering the tension in the abdomen. Now it is realised that the prognosis is fairly good and that, apart from surgical intervention, patients make excellent recoveries.

The only sure operation for the removal of large ascitic effusions, which do not clear up under ordinary treatment, and for the evacuation of pus. If toxic ascitic fluid is let out it is rapidly replaced by a non-toxic fresh effusion, with considerable benefit. The removal of caseous masses is too speculative a procedure to recommend. If, on opening the abdomen for any other cause, breaking down tuberculous glands are discovered, I think they should be removed, although there is a little risk of setting up dissemination.

For the treatment of ordinary chronic cases I rely on inunction of the abdomen with a mixture of equal parts of belladonna and blue ointments and olive oil, spread on lint and bandaged on. Recently I have used iodex, an ointment containing 5 per cent. of iodine, with good effect. X-rays are injurious as they induce leucopenia. Internally I give iodide of potash, gr. 1/24, t.d.s., or tannin, or with codliver oil and malt. Cresoate, guaiacol and styracol are all useful for diarrhoea and tympanites. Bismuth and opium may be given for diarrhoea if there is little or no meteorism. It is usually due to erroneous diet or to ulceration. For constipation rely on codliver oil and malt, and careful feeding. If drugs are needed give calomel, sulphate of soda, or magnesium, or emetate, oil or glycerine. During convalescence, Nourry's wine containing iodine, gr. 1-5, and tannin, gr. 3, per oz., in doses of dr. i-v, with meals twice a day may be given.

Tuberculin has not proved in my hands of any certain value, and in some cases it has appeared distinctly injurious. I am convinced that, under careful treatment, the outlook is distinctly good, but that treatment must be persisted in steadily for a long time, and much attention given to minutiae, and especially to the digestibility and suitable character of diet.

NOTE.—A Clinical Lecture by a well-known teacher appears in each number of this Journal. The lecture for next week will be by Prof. Ed. Lalvel, M.D., of the Faculty of Medicine of Paris Subject: "Grave Surgical Decisions in Daily Practice."

ORIGINAL PAPERS.

RESULTS OF OPERATION (LARYNGO-FISSURE) FOR INTRINSIC CANCER OF THE LARYNX.

By PROFESSOR E. SCHMIEGEL, Copenhält.

LADIES AND GENTLEMEN.—Surgical treatment of intralaryngeal cancer gives exceedingly good results, especially when compared with those obtainable by surgical treatment of cancer in other internal organs.

On examining this fact we find it to be due to the peculiar manner in which intrinsic cancer of the larynx originates and spreads, as was originally pointed out by my friend Sir Felix Semon. It would be interesting historically to consider the development of the pathology, diagnosis and treatment of intrinsic cancer of the larynx, but lack of time forbids me doing so. You, no doubt, will permit me to state here in London, speaking to an assembly of prominent American and English surgeons, that, in my opinion, the whole of our present knowledge of the diagnosis and treatment of this disease is founded on the works of Semon and Batlin, who, towards the end of last century, entirely revolutionised our views with regard to the malignancy of intralaryngeal cancer. Before their day the surgical treatment of this disease had always been regarded as almost hopeless, but Semon showed us that the chief reason of this was, that the disease was always diagnosed too late, so that it was too far advanced to give any good operative result.

Having further learnt that intralaryngeal cancer in the great majority of cases appears as a primary cancer of the vocal cord, and therefore soon causes hoarseness, we have means of recognising the disease at an early stage of its development, while still limited to the vocal cord, and so of probable radical cure by removing the diseased vocal cord through a laryngoscope.

To illustrate the frequency of primary cancer of the vocal cord I wish to draw your attention to this table of 66 cases of intralaryngeal cancer which have come under my observation:—

<table>
<thead>
<tr>
<th>Table A.—Primary Seat of Intralaryngeal Cancer</th>
</tr>
</thead>
<tbody>
<tr>
<td>No specified localisation</td>
</tr>
<tr>
<td>Vocal cord</td>
</tr>
<tr>
<td>Sinus Morgagni</td>
</tr>
<tr>
<td>Arytenoid region</td>
</tr>
<tr>
<td>Epiglottis</td>
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<tr>
<td>Ventricular Band</td>
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</tbody>
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In the first 18 cases the primary site of the disease could not be localised as the tumour had extended too far into the larynx when first observed.

The table clearly shows that cancer of the interior of the larynx in by far the majority of cases originates as a growth of one vocal cord, generally in the central part of it, and that it can therefore be radically removed. If the disease, however, has extended to the anterior commissure the prognosis becomes more serious, as under these circumstances the thyrotomy cuts through the growth and may possibly be followed by a recurrence.

Those cancers of the larynx which do not paralyse the vocal cords have, on the contrary, a bad prognosis; firstly, because they very often are not discovered and taken in hand until they have spread so far that there is no possibility of a radical cure by means of a laryngoscope; secondly, because the extra-cordal-cancers are generally of a more soft medullary character, growing quickly and with greater tendency to involvement of the neighbouring lymphatic glands.
The only exceptions to this are the pedunculated adeno-carci-nomas which spring from the aryteno-epiglottic folds. Of these I have seen three cases which had a relatively good prognosis and could be treated endolaryngeally with favourable results.

Having made the diagnosis by means of laryngoscopic inspection, supported by microscopic examination of a portion removed through the mouth, one has to remove the growth as soon as possible by means of a laryngotomy.

This operation should be performed as indicated by Butlin and Semon who about 1890 inaugurated this treatment and proved that this comparatively safe operation was sufficient, if only performed soon enough.

I myself, chiefly following their instructions, have operated in the following manner:

The operation is always performed under general anesthesia. I begin with morphinum ether and make a low tracheotomy. Hann's Tampon-cannula is introduced and the narcosis is continued with chloroform. The thyroid cartilage having been divided and the interior of the larynx opened, I fill the pharynx with sterilised gauze introduced from below through the split larynx in order to prevent the saliva from descending and interfering with the scene of action. According to Semon the larynx is packed with gauze soaked in a 10 per cent. solution of cocaine, to which I add a few drops of a 1 per mille solution of adrenalin in order to make the mucous membrane of the larynx anaesthetic and bloodless. Then the neoplasia, together with the whole diseased vocal cord, is removed by means of knife and scissors.

All the diseased area having been removed and the bleeding stopped, we formerly filled the larynx with a tampon of Iodoform gauze, but after Butlin taught us to give up tamponading and to close the thyrotomy wound at once, the results of operation have been much better.

The patients are now able to swallow on the day of operation and can leave their bed a few days later. This, of course, is of the greatest importance in preventing complications in the lungs, specially in elderly people. My two eldest patients, respectively 71 and 74 years old, were able to leave their bed on the second day, and they are both alive and well, now at the age of 80 and 76 years.

Thyrotomy could only be performed in 33 of my cases treated up to 1912 as shown in the following table:

<table>
<thead>
<tr>
<th>(Extrinsic &amp; Intrinsic)</th>
<th>Cured</th>
<th>Died or Relapsed</th>
</tr>
</thead>
<tbody>
<tr>
<td>No treatment</td>
<td>10</td>
<td>0</td>
</tr>
<tr>
<td>Tracheotomy</td>
<td>8</td>
<td>0</td>
</tr>
<tr>
<td>Endolaryngeal removal</td>
<td>8</td>
<td>0</td>
</tr>
<tr>
<td>Thyrotomy</td>
<td>8</td>
<td>0</td>
</tr>
<tr>
<td>Subhyoid Pharyngotomy</td>
<td>5</td>
<td>1</td>
</tr>
<tr>
<td>Partial resection of the larynx</td>
<td>4</td>
<td>0</td>
</tr>
<tr>
<td>Total resection</td>
<td>70</td>
<td>20</td>
</tr>
</tbody>
</table>

The result of these 33 thyrotomies was that 28 patients survived the operation whilst 5 died from pneumonia, due chiefly to post-operative hemorrhage.

Amongst the 28 patients recurrence took place in 10 cases, whilst 18 are alive and well. These 18 had the carcinoma entirely limited to the vocal cord and the diagnosis was made at an early period of the disease—with only two exceptions. The first of these was a man aged 44 years (see Table D, No. 11), who had a cancer of the posterior wall of the larynx, and whom I was able to follow for three years after the operation, when I lost sight of him. The second was a man, aged 28, suffering from an epitheliosis of the left ventricular band, anterior commissure and the anterior part of the right ventricular band. This patient I operated on 14 years ago, and since then he has been on an expedition to the North Pole and is still alive and well.

The last 4 patients were operated in 1912 and have therefore only been under observation for about 2 years since the operation. But they were all cases of quite limited epitheliosis of the vocal cord and were operated so early that there is not much chance of recurrence.

Patient No. 7, a man aged 61, was operated in 1905 for a cancer of the vocal cord. During the following 7 years his larynx remained perfectly healthy, but he now has a quickly growing cancer in the throat requiring tracheotomy. Ought this to be considered as a recurrence or as an accidental cancerous infection of a larynx which has kept perfectly healthy for 7 years after operation? Personally I am inclined to look upon it as an accidental reinfection. In all the other cases of recurrence this took place within a year after the thyrotomy.

The functional result was exceedingly good in all cases. The voice was strong, generally sonorous, but in a few cases hoarse. The man aged 71 was operated on in 1905; I saw him last in 1913, he was then 79 years old and had a strong, healthy voice.

A clergyman aged 55 who was operated in 1866 fulfilled his duties for 8 years and preached every Sunday in two churches.

The two men, aged respectively 66 and 67 years, who were operated in 1912 are able to make speeches to large assemblies with a comparatively clear voice.

So as to get a broader basis of judgment as to the results of thyrotomy in cases of intrinsic cancer of the larynx I have combined in the following table my own experiences and those of F. Semon, Chiari and St. Clair Thomson. The results are as follows:

<p>| Table C.—Results of Operation by Laryngofissure. |
|-------------|-------|-------|-------|</p>
<table>
<thead>
<tr>
<th>Cased.</th>
<th>Case.</th>
<th>Cure</th>
<th>1-5 years</th>
<th>5-10 years</th>
<th>Between Death.</th>
<th>(years).</th>
</tr>
</thead>
<tbody>
<tr>
<td>Semon</td>
<td>24</td>
<td>18</td>
<td>4</td>
<td>1</td>
<td>3</td>
<td>1</td>
</tr>
<tr>
<td>Chiari</td>
<td>27</td>
<td>18</td>
<td>4</td>
<td>1</td>
<td>3</td>
<td>1</td>
</tr>
<tr>
<td>Shumaker</td>
<td>34</td>
<td>18</td>
<td>4</td>
<td>1</td>
<td>3</td>
<td>1</td>
</tr>
<tr>
<td>St. Clair Thomson</td>
<td>20</td>
<td>17</td>
<td>4</td>
<td>1</td>
<td>3</td>
<td>1</td>
</tr>
</tbody>
</table>

You see herefrom that of 92 operated patients 52 (= 56.5 per cent.) were cured for more than one year after the operation.

(1) Secondary operation of removal of larynx and now alive 5 years later.
(2) Died from other causes 15 months after laryngofissure.
THE SUTURE OF THE LEVATOR ANI MUSCLE IN PERINEORRHAPY OPERATIONS. (a)

By HENRY JELLETT, M.D. DUB., F.R.C.P.,
Master of the Rotunda Hospital, Dublin.

The selection of a subject which is suitable for discussion before this Congress is a matter of some difficulty, since matters which are of the highest interest to the general surgeon are not so necessarily to the general surgeon. At the same time, it is more likely that a specialist will be of interest to his hearers if he deals with a subject which for the moment is of interest to himself, and so I have selected an essentially gynaecological subject.

There are other reasons why I have selected this particular gynaecological subject. In the first place, although it is a generally accepted fact that the support furnished by the levator ani muscle, either with or without its investing fascia, is essential to the pelvic organs, none of the older methods of perineorrhaphy provides a means of such suture. In the second place, it is surprising how many of the best known modern gynaecologists are content to continue to practise these operations, because, and this is my third reason for my choice of subject, they consider, and in fact they are directly told that suture of the muscle, however essential it may be, is a difficult operation, and one not devoid of danger. I do not think that I need spend much time in defending my first reason, Lawson Tait's, Martin's, Hegar's, and Kelly's original operations all neglect to take the levator ani muscle into consideration. It is true that occasionally they may result in causing its suture, but this only occurs when the muscle is not far retracted, while when it is retracted, and when its suture is more imperative, they fail. As to my second reason, any gynaecologist who says that he is not aware that it is right, as well as I, and he can say whether his third reason is not also right, and whether the omission to suture the muscle is not the result of the idea that such suture is difficult,

Doderlein and Kronig, in the latest edition of their work on gynaecological operations, and Martin of the University of Kiel, in an important communication to the gynaecological surgeons, have strongly advocated the use of the levator ani muscle and fascia, and are largely responsible for perpetuating this idea. They, however, are apparently strong advocates of suture, and it seems a pity that their writings should rather tend to complicate the operation, and so to prevent its universal adoption.

I have practised systematic suture of the levator ani muscle for the past six or seven years, and I think I may say that I have used the muscle in every case in which I have performed perineorrhaphy during this period except where the muscle was absent or atrophied, but when I stated this fact at a discussion on the subject, I was told that I never sutured it. The reasons given for this statement were first, that Kronig showed how easy it was to suture it; secondly, that I did not regard the levator ani, and secondly, that Martin said that suture of the levator was a difficult operation involving an extensive dissection, whereas my operation was a simple and easy one. It is just because it is simple and easy that I take up the time of the Society with this paper, in which I desire to show, that, with the method of the point of union of the pubic and ischiad ramus, there are no anatomical difficulties in the way of muscle suture, and secondly, that there are no practical difficulties.

The structures which are involved in a perineorrhaphy operation from without inwards are as follows:

(1) Skin.
(2) Subcutaneous fascia.
(3) The constrictor vagina muscles, and the superficial transversus perinei muscle.
(4) The deep transversus perinei muscle.
(5) The levator ani muscle.
(6) The vaginal mucous membrane.

We may at once dismiss a number of these structures from consideration because their suture is a matter of surgical ease. A more careful regard of the subject has been devised. These are the skin and superficial fascia, the constrictor vagina and superficial transversus perinei muscle, and the vaginal mucous membrane. This leaves two muscles for consideration—the deep transversus perinei and the levator ani. The deep transversus perinei muscle rises from the pubic and ischiad ramus. As it approaches the middle line, it spreads out. A few of the most anterior fibres pass to the anterior wall of the vagina, and lie behind the urethra. The remaining fibres pass behind the vagina to the central point of the perineum (Thompson). A great deal of importance has been attached to this muscle by Kronig, who apparently considers it a structure which is sufficiently long both to afford support in cases of slight prolapse, and to be mistaken for the levator ani. In his description of perineorrhaphy as performed in cases of slight prolapse, he says that after the initial incision the fibres of the deep transversus can be seen, and their course demonstrated by traction. They lie over the pubo-rectal part of the levator muscle, and have often been mistaken for the latter.

"To prevent this mistake the diverging muscle bundles should be followed to the sides, the deep transversus perinei passes towards the ischiad tuberosity, while the levator ani passes forwards towards the pubis." He then goes on to show how this muscle can be sutured.

There are two points raised here with which I must deal at once. The first is that Kronig regards the deep transversus perinei as a structure which can not only be easily found, but which is strong enough to be used to reconstitute the pelvic floor. I should hesitate to say in the face of so eminent a surgeon the following words: "I do not regard this statement as correct, even though anatomists and one's own personal experience showed that they are incorrect, was it not that on an earlier page of the same article, Kronig himself places the import-
idence of the deep transversus perinei before us in a true light. Here Krönig definitely states that the deep transversus perinei in nullipare is as thick as the little finger, while in multipare, and the uterus prolonged, it is reduced to mere strands of muscle fibre. It is thus apparently possible that when one comes to perform a perineorrhaphy in the muscular nullipara, one may be able to find and to derive help from the deep transversus perinei.

The second point concerns the anatomy of the muscle, and that there is something radically wrong in Krönig's statements about it is shown by comparing his anatomical drawing of the deep transversus perinei with his drawing of the same muscle as exposed during operation. (Slides). It is difficult to conceive how a muscle possessing the anatomical relations shown in the first drawing could come into one position in which it is said by Krönig to be placed, while in the second drawing it is placed in such an attitude as to be out of all possible range of action as a muscle.

The part of the levator ani with which the gynaecologist is concerned rises from the back of the body of the pubis, along an oblique line which extends from the lowest limit of the symphysis upwards and outwards to the obturator canal, and also from the obturator fascia for a limited extent (Those backwardly to insert into the upper half of the vagina, about half an inch above the hymen, and then similarly at the side of the rectum to be inserted mainly into a median raphe between the anus and the tip of the coccyx. It has also apparently a slight insertion into the vaginal and rectal walls at the point at which it crosses the latter, and it is difficult to meet this part of the opposite side in the central point of the perineum. It has not, however, any considerable insertion into the perineum, and the union of its fibres which are produced in this region by operation is purely artificial, and in no way a reproduction of the condition of affairs existing before the operation. In the position in which it is seen high into the vagina of a nullipara, and then drawn down along one lateral wall exerting a slight outward pressure, it comes to rest on the upper surface of the muscle, the extent and relations of which can be readily ascertained. It will also be obvious that the main mass of the muscle pass backwards at each side of the pelvic canal in contact with a distinct separation between them. If a similar separation is made in a case of fairly extensive perineal laceration, the lateral masses of the muscle will still be felt, but the gap between them will be greatly increased, in consequence of their outward retraction. Further, if a similar examination is made in the case of a patient in whom suture of the muscle has been carried out, the upper border of the lateral masses will be obvious, and so will the fact that they actually meet one another in the middle line throughout the whole antero-posterior depth of the perineum. Lastly, if the muscle is exposed from below by the method which will be described later, and if it is caught in a forceps and drawn down, the finger in the vagina readily proves that the forceps is holding the muscle which forms the pelvic floor and no other. For this reason I have no hesitation in saying that it is impossible for Krönig to have, with the details of the operation to mistake the muscle for any other structure in the pelvic floor. Just as the possibility of mistaking a practically non-existent structure for the levator ani has been exaggerated, so has the difficulty of the operation and the extent of the dissection required. I cannot understand this latter exaggeration of the case that it exists, I quote a sentence from an article by Martin of Bunn's Klinic, in which he describes an operation that appears to have very few points of difference from the one I habitually practise. Martin writes:—If the fibres of the levator ani are to be brought into view, the connection between the pelvic fascia and the superficial diaphragmatic fascia must be divided. This, however, means a very deep dissection, and causes haemorrhage if a broad strip of the pubo-rectalis is laid bare, because one is working in the neighbourhood of the recto-vaginal venous plexus. When the muscle is approximated, the needle frequently pierces this plexus, and so causes emboli as Bunn has described.

I have criticised adversely from the standpoint of my own experience both Krönig's and Martin's efforts to attach difficulty and danger to the routine suture of the levator ani. There is, however, one disadvantage of a slight character to which they both allude, and which I think requires attention. I refer to the fact that the opposition of the muscle and its separate suture leads to the formation of dead spaces between the vaginal mucous membrane and the upper surface of the muscle. If these spaces are allowed to remain in a condition in which blood can accumulate in them, infection of the clot from the rectum is very liable to occur, and to convert the haematoma into a true abscess. Here, however, a very simple and essential method which I shall presently describe, of obliterating such spaces, and so of preventing the accumulation of blood in them.

Before describing the operation which I have evolved for myself, and which I habitually practise, I would like to say that the method of operation I should like to follow is the one which Krönig describes, for chronic lacerations for chronic lacerations have been performed at the Rotunda Hospital, in practically every one of which the levator ani has been sutured. In an occasional case, union of the muscle has been complete, in other cases—particularly in the early ones—a haematoma has formed, but there has never been a death, or even a patient whose condition gave rise to anxiety owing to the occurrence of emboli from punctured venous plexuses.

I should also like to say, in case the slides of the operation appear familiar to some of you, that the drawings from which they were made were just two and a half years ago for me from my operations, and that I take no responsibility for their resemblance to any other illustrations which have been drawn and have appeared since. Within the last two months I have had certain anatomical details in them slightly altered, as the levator muscle was placed at too superficial a level.
The essential features of the operation are as follows:—

1. The careful dissection of the necessary amount of vaginal mucous membrane of the rectum.

2. The exposure and suture of the separated levator ani muscles.

3. The careful approximation of the cut edges of the vaginal mucous membrane, in such a manner as to leave no projection or redundancy.

The operation is carried out as follows: The extent of the perineal tear is carefully determined, and its anterior edges are marked out by bullet forceps as shown. A third bullet forceps is applied to the perineal skin just behind the posterior edge of the tear. A pair of the right-handed pair of the lever and is by palpation through the mucous membrane of the vagina. An incision is then made from side to side along the line of junction of the skin and the vaginal mucous membrane. This incision cuts through the skin and any underlying scar tissue. A flap of vaginal wall is then dissected up to the underlying rectum. At its lowest point it is firmly held to the retractor and the sphincter ani by cicatricial bands, the result of the old cicatricial healing. As soon, however, as these have been cut through, the separation of the remainder of the flap by blunt dissection is an easy matter. The easiest method of dividing these bands with the scissors so as to avoid injuring the rectal wall or the vaginal mucous membrane is to make an incision down the side of the perineum, thus forming a triangular space, which is bounded laterally by the remains of the superficial vaginal and perineal muscles, and at a deeper level by the pubo-coccygeal fibres of the levator ani muscle while its floor is formed by the rectum. It is then an easy matter to catch the edges of the flap with clip forceps or dissecting forceps, and to divide them downwards until they meet in the middle line. If the separation and atrophy of the muscle is marked, then it may not be possible to draw the edges down sufficiently, but, in the great majority of cases, they can be brought into view as shown. Three or four interrupted sutures of catgut are then passed through the edges of the flap, and the sutures are then approximated in the middle line; for the present, however, they are left untied. The next step is to trim the vaginal flap into proper shape, so that, when the operation is complete, there may be no redundancy. The usual line of incision is shown, and the effect of the removal of redundant tissue. The cut edges of the flap are then brought together by a continuous catgut suture passed from above downwards, and ending at the vulvar orifice. This being done, the catgut sutures in the levator muscle may be tied. The last step consists in the introduction of silkworm gut sutures passed so as to close the skin edges of the perineal wound. These sutures are passed from side to side, and traverse the skin, the subcutaneous fat, the intermuscular septum, the muscular, and also the levator muscle so as to supplement the buried catgut sutures. The method of inserting them will be clearly seen in the illustration.

Sometimes during this procedure there may be haemorrhage from the hemorrhoidal vessels. Any bleeding vessel, if of large size, should be ligated by a clip, and tied, but, as a rule, the best method of stopping bleeding is by preceding rapidly with the operation.

I have mentioned the tendency there is to the formation of dead spaces between the vaginal mucous membrane and the upper surface of the levator ani, and, when necessary, of freeing the vaginal flap and the separation of the edges of the muscle from the sides of the vagina. The final step of the operation is directed towards the prevention of the accumulation of blood in such spaces, and is, in my opinion, an essential precaution. It consists in the firm plugging of the vagina with iodiform gauze. The plug must be applied most carefully, so as to avoid injury to the vaginal sutures, and in such a manner that it lies wholly above the muscle with the exception of the ends which hang out through the vulvar opening. It is quite impossible to introduce it satisfactorily by merely pushing it upwards through the narrowed orifice. The reconstituted perineum must be drawn carefully backwards by means of a narrow retractor passed into the vagina, so as to lie above the levator muscle, the retractor which I use for the purpose is known as Daven's vaginal retractor, and is made by Collin of Paris. Though intended as an anterior retractor, it possesses a blade which is set at just the correct angle to the handle to allow it to pull back the posterior vaginal wall and the muscle in the manner required for the insertion of the plug. By means of it it is possible to introduce a strip of gauze to such an extent that it becomes some five to six yards in length, in such a manner that, while the gauze expands the upper part of the vagina and keeps the posterior vaginal wall in close contact with the sutured muscle, it throws little or no strain on the sutured mucous membrane which lies below it.

I have described this step in detail because I attach very great importance to it, and because it is impossible to carry it out satisfactorily without a suitable appliance such as the retractor I mention.

The advantages of the foregoing operation are its ease and its rapidity. In an ordinary uncomplicated case it can be finished in less than ten minutes, and in the cases examined here in only a few minutes. The advantages of positive suture of the levator ani in perineorrhaphy operations are so obvious that they do not require to be mentioned, but to emphasise them I show four diagrams, which I constructed with fair accuracy from two cases of perineorrhaphy. The first pair of these show the condition of the perineum and the relations of the rectum and the vagina in a patient on whom I operated, and the other pair of the other perineorrhaphy operations had been performed. The external result was apparently excellent, but on passing the finger into the vagina, the perineum was found to consist of a thin shelf formed of skin and superficial fascia. A little further examination showed that the lateral masses of the levator ani muscle were retracted, but widely separated, lying in the position into which they had retracted as a result of the original laceration. The second pair of diagrams show the same points in a patient in whom the muscles had been suared and the operation carried out as I have described. The difference in the condition of the perineal body in these two cases is evident, and examination showed that the lateral masses of the levator met in the middle line. In fact, the shape of the perineum is practically that found in the nullipara, and the only difference is that the inner muscle edges meet in the middle line instead of merely sending a few fibres into the central tendon of the perineum.

I should like to sum up my conclusions briefly:—

1. Routine suture of the levator ani is an essential part of perineorrhaphy.

2. Routine suture is always practicable, except when the muscle is wanting owing to atrophy after injury. Such absence is very rare, and, when it occurs, it is impossible to reconstitute the perineum satisfactorily.

3. The exposure and suture of the levator ani is neither difficult nor dangerous.
THE RELATIONS OF CHEMISTRY TO MEDICINE. (a)

BY ARCHIBALD E. GARKOD, M.A., M.D.,
F.R.C.P., F.R.S.
Physician to St. Bartholomew's Hospital.

So complex is modern medicine, and so diverse are its aspects, that we cannot hope to attain to any comprehensive notion thereof if we regard it from any single point of view. We need to adopt, on the one hand, the standpoint of the human organism engaged in its unceasing struggle to ward off the assaults of disease, and, on the other hand, that of the agents of disease which are as incessantly striving to gain a foothold. The clinical worker whose task it is to diagnose the nature and seat of the malady, and to intervene in the interests of the patient, has his special outlook; and the pathologist, who studies the havoc worked by disease, has his. Again, we may contemplate the human organism as a whole, or as a complex structure built up of diverse organs and tissues, each with its assigned functions, or once again, as a nation of cell units endowed with manifold activities. Lastly, we have to picture each individual cell as a congeries of chemical molecules which are being continually pieced together and broken down by the agency of intracellular enzymes. Thus physician and physiologist, physiologist and pathologist, biologist, bacteriologist, and chemist, each looks out upon the field of medicine from his own standpoint, and to each it wears a different aspect. Only by the combination of the several mental pictures can a stereoscopic presentation be obtained.

Many of the early chemists were practitioners of medicine, and from the days of that eccentric genius who assumed the name of Paracelsus, and of van Helmont, the father of physiological chemistry, down to the earlier years of the nineteenth century, the chemical outlook was that most widely adopted by medical men. But in those earlier days chemistry itself was in far too embryonic a stage to lend much aid to the elucidation of the problems of disease, and, as time went on, the chemical outlook was abandoned to a large extent in favour of that afforded by the rapidly advancing study of morbid anatomy. Throughout the greater part of the last century morbid anatomy and histology held the field unchallenged; and they were justly entitled to do so in view of the progress made in the macroscopic and microscopic study of diseased structures, upon which was reared an imposing edifice of cellular pathology.

THE STUDY OF BIOCHEMISTRY.

Biochemistry presents itself under two aspects: a static, which is concerned with the study of chemical structure, and a dynamic, which deals with the chemical changes of which the living tissues are the seats. Thus may wander amongst the streets of some deserted city of the past, may study the fabric of its buildings—the stones, bricks, and mortar employed in their construction, and in this way may gain some knowledge of the uses for which the several buildings were designed. Just so the anatomist investigates the structure of the organs of the dead body, and the chemist, by his analyses, gains a minute insight into the molecular groupings of the materials of which its tissues are composed. Even in the dead city all is not still and at rest. The ancient walls are subject to weathering and decay, and gradually crumble under the influence of air and rain. Yet other changes are wrought by lowly forms of animal and vegetable life, which undermine the ruins and, in the end, bring about their downfall. So, too, in the dead body, destructive agencies are constantly at work until the dust returns to its dust again. Once more we may tread the streets of a city of to-day, may watch the movements of the crowds as they part the gathering and dispersal of groups of people. We may study the arrangements for the disposal of waste products, the ways in which food supplies are brought in, dealt with, and distributed. Or we may investigate the police arrangements, the sanitary services, and the various devices resorted to by the community for its protection.

The study of the human organism on such lines is the province of physiology, and it is to designate the sum total of the manifold chemical processes in action within the living organism, and which constitute its life, that the term 'metabolism' is employed.

But the chemical physiologist is far from sharing the opportunities afforded to our wayfarer. He is hardly permitted to set foot within the walls of the living city, and on that account his investigations are carried on under serious disadvantage. Determination of the balance of intake and output affords clear indication of the grosser chemical interchanges in the body, but the study of the intermediate stages is a far more difficult task, and only now are we beginning to gain an insight into the details of metabolism. Such knowledge of these details as we have acquired is largely based upon circumstantial rather than upon direct evidence. But here, as in other fields, pathology lends a double aid to physiology, and Nature's experiments and her mistakes afford, to him who is able to read them aright, insight into the methods of her orderly working.

THE ROLE OF ENZYMES.

It is believed that metabolic changes are wrought by specialised enzymes, many, if not all, of which are capable of reversed action. We may picture to ourselves the individual protein traction as handed on from enzyme to enzyme, each responsible for some particular step in the series of changes, until the series is completed and the specific protein has been built up, or the final excretory product has been reached. Thus are produced numbers of intermediate products which are subjected to further changes as soon as they come into existence, and which call to mind a moving staircase rather than a flight of steps. Most of these intermediate products are never met with in an examination of the excreta, or only when the further transformations which they naturally undergo are in some way arrested. Regarded from the chemical standpoint, each cell in the body is an individual member of a community, although, in all organisms however the simplest, the various cells are differentiated for the performance of special functions, and to that extent have sacrificed their individuality. Each
product of glandular activity bears witness to specialised metabolic processes in the cells by which it is produced.

In recent years we have gained some insight into the mechanisms by which regulation is effected, and of the importance in this connection of the internal secretions of glands, ductless and others. We see how disease of a gland which yields such a secretion may disturb the metabolic balance in the direction of excess or defect, and in so doing may influence growth and development. Such studies are profoundly modifying our conceptions of such anomalies as obesity and infantilism, and we are learning that the glands which may be classed together as members of a hormonopoietic system constitute a group of balanced regulators of metabolism, although it may be conceded that, in this connection, theory tends for the moment to outstrip established fact. However, the internal secretions are implements, rather than originators of control. The hormones themselves but chemical products of certain specialised cells, and the activities of the glands which produce them are themselves under the control of the vegetative nervous system, which transmits to them impulses in response to the chemical demands of the tissues. Thus, in a sense, the regulation of metabolism is automatic.

**Protective Mechanisms.**

The mechanisms of defence adopted by the body are of various kinds. Some are comparatively simple chemical reactions, as when free acids are neutralised by ammonia diverted from its ordinary path to the formation of urea; or when aromatic poisons are combined up with sulphates, and are excreted in harmless forms. But aromatic poisons are also combined with products of protein or carbohydrate metabolism, with the protein fraction glycine to form the harmless hippuric acid and its allies, or with glycocenic acid to form compound glycuronates. Other mechanisms are far less simple, and the very nature of the protective agents is beyond the ken of the chemist. These are the agents known as antitoxins, agglutinins, precipitins, oposonins, and the like.

Quite recently the researches of Adherhalden have opened up a new field of such studies by revealing the production of protective ferments, capable of destroying protein substances foreign to the organism. It would seem, indeed, that each constituent cell of the body brings into play its enzyme-forming powers to meet an emergency. It is a question of unusual interest whether or not these protective mechanisms have been evolved to meet the assaults of those toxic agencies to which the organism is specially exposed, or whether an entirely new mechanism can be devised, at any moment, to meet an unforeseen emergency. Evidence may be adduced in support of either hypothesis. The laws of chemistry are so invariable that, given certain conditions, definite reactions may be expected to occur. We are able to predict the formation of compounds which may never have existed previously, and to foretell their properties with some degree of accuracy. So we might expect that a given poison launched into a medium in which a number of metabolic products are present will combine with one or other of these. But in the human organism the conditions are far less simple than in the laboratory, and we are driven to suppose that enzyme action is concerned in the production of such compounds as hippuric acid or a compound glycuronate; and we may well imagine that, even when the requisite materials are forthcoming, combination may fail for lack of the required enzyme.

**Disorders of Metabolism.**

Diseases of the alimentary tract cause impairment of the intake of nutritive materials, and changes wrought, by the bacteria which inhabit the intestines, upon the intestinal contents, may result in the formation of poisonous products which undergo absorption, to the great detriment of the organism. When the kidneys are the seats of disease, the elimination of waste products—the hygiene of the tissues—is impaired, to a greater or less extent, and these products accumulate in the organism where they induce a chain of morbid effects which culminate in the stormy symptoms of uremia.

It is because disease of glands of internal secretion produces such profound disturbance in the chemical field that we have learnt to recognise the important part which they play as regulators of metabolism. We see how functional inactivity of the thyroid gland renders sluggish the metabolic processes as a whole, whereas its over-activity—if that be the correct interpretation of the phenomena of exophthalmic goitre—causes the metabolic fires to burn too brightly. We see also how a too active pituitary gland stimulates the organism to abnormal growth, whereas less of its functional activity brings in its train obesity and recessive infantilism. Phenomena of a like order result from diseases of the adrenal and pineal glands, and we are only beginning to learn how great a part variations in the secretion of adrenalin by the chromaffin tissues may play in connection with a number of maladies in which the adrenals themselves are not primarily implicated. Indeed, it may be said that all diseases, whether they affect the organism as a whole or whether their brunt be borne by single organs, bring about greater or less disturbance of metabolism. The field of chemical pathology is practically coextensive with the field of medicine.

In the case of many maladies, even of the more acute and graver ones, the chemical disturbances which they bring in their train are far less conspicuous than the structural changes. In others, again, the metabolic disorders occupy the fore front of the clinical picture, as is the case in those maladies which we are accustomed to group together under the collective name of "diabetes."

It is natural that the attention of chemical workers in medicine has always been directed to such "diseases of metabolism," and the problems which they present are still very far from solution.

**The "Deficiency" Diseases.**

Hitherto we have been considering what may be described as positive diseases, which result from attacks upon the organism by morbid agents introduced from without, but there remains to be considered a group of maladies which may be classed as negative, seeing that they have their origin in the withholding of some portion of the supplies which the organism derives from external sources, and upon which its well-being depends. The extreme example of such a
disease is starvation—a condition in which the body, being deprived of its food supplies, lives for a time upon its own fats and carbohydrates, and ultimately upon the proteins of its tissues. Minor degrees of the condition are induced by restriction of the intake below an adequate caloric value of proteins below the amount compatible with maintenance of nitrogen balance or by complete deprivation of carbohydrate foods.

Of much interest are certain maladies which result from dietetic shortcomings of far less obvious kinds—defects which cannot be estimated in terms of calorie value or nitrogen balance. It is becoming evident that a normal dietary must contain constituents of which we have hitherto taken no reckoning, just as the air which we breathe contains gases of the existence of which we had no inkling until recent years. The new study of vitamins and of the effects of a diet consisting of pure proteins, fats, and carbohydrates upon the growth of young animals, is beginning to throw light upon the nature of such factors, exogenous hormones, if I may so style them. That scurvy results from errors of diet has long been known, but the dietetic factor in the causation of beri-beri is of far more recent recognition.

It is not surprising that such diseases of defect, when once recognised as such, are far more readily amenable to treatment than many others. The missing factor supplies the specific remedy. Starvation is readily cured by food, and scurvy by a diet of fresh meat and vegetables, just as myxoedema yields to treatment by thyroid extract; but in all such cases continuous administration of the missing factor is essential for the continuance of well-being.

The Help of Chemistry in Therapeutics.

To turn to the field of therapeutics, there is no branch of treatment in which chemistry should help us more than in dietetics, but there is none in which we rely less upon the guidance of science, and in which the influence of tradition is so powerful. In so far as tradition embodies the accumulated experience of mankind, and of generations of sufferers from particular maladies, it is entitled to our fullest respect, and is sometimes our safest guide. But too often it rests upon the dicta of some teacher of the past, which have been repeated so frequently that they have assumed an authority to which they have no real claim. I am far from maintaining that our dietetic prescriptions must always have a scientific basis, for our knowledge does not suffice to render this possible. Indeed, in many branches of treatment, there is danger in setting up too rigid a standard. A prescription which aims at the attaining of some particular object, although based upon scientific reasoning, may fail because we are, not able to take into account all the conditions of the experiment. Not a few therapeutic measures have been introduced in deference to scientific reasoning which has since been shown to be unsound, and some of these—such is the irony of things—have nevertheless proved of real value.

There are scientific grounds for the belief that mankind habitually takes too much protein food than is required for the due nutrition of the tissues, and undoubtedly the amount taken habitually exceeds that required for the maintenance of nitrogen balance. As regards details of dietary, I would venture to assert that two-thirds of the restrictions imposed upon sufferers from particular maladies and no real justification in the teachings of science or of Bible. How contradictory are the directions given by different advisers to gouty patients as to details of dietary, and how few of them can be justified by argument when called into question!

Modern diagnostic methods enable us to recognise diseases of which our fathers never dreamed, and to detect the more familiar maladies in those early stages in which they are most amenable to control. So long as they are used in conjunction with the older clinical methods, and not merely as short cuts to diagnosis, they prove unqualified boons. Nor can it be questioned that the range of efficient treatment is being extended widely. But let us not forget how much we owe to the work done by our fathers with the less efficient methods at their disposal. We begin where they left off; the harvest which we are reaping they sowed; thanks to their advances we are able to advance yet further. If they knew less than we do, they had one great advantage over us, in that they had more time for thought.

THE SURGEON OF THE FUTURE. (a)

By SIR JOHN BLAND-SUTTON, F.R.C.S.,

Surgeon to the Middlesex Hospital.

The art of surgery is probably as ancient as the art of war, and is practised by warlike savages who have never been influenced by civilisation. The antagonistic callings of the soldier and the surgeon have been markedly modified by the progress of science. It is believed by many that the ingenuity exercised in the invention of methods for destroying life will make war impossible, and the discovery of the causes of diseases and the perfection of preventive medicine will render physicians and surgeons unnecessary. The belief in each instance is futile. The art of the surgeon will be required as long as civilisation endures; but their methods have undergone great changes, and greater are impending. Gunpowder revolutionised warfare; the discovery of anaesthetics and the invention of the microscope completely changed surgical methods. The enormous impetus which the discovery of anaesthetics gave to surgery threatened to extinguish it as an art, for post-operative suppuration and pyaemia became endemic plagues in all populous cities where the surgeon plied his craft. The utility of chloroform in the diagnosis of hysterical contractions, phantom tumours and spurious palsy would require a surgical anatomy even more complete than that of the present day, but it is not yet sufficiently appreciated. The surgery of the viscera is one of the remarkable extensions that followed the introduction of anaesthetics. Abdominal organs, such as the spleen and omentum were removed when extruded through accidental rents made by knives, spears, swords, scythes, sickles, and similar forms of violence. And its lost merit is to be appreciated. The surgery of the viscera is one of the remarkable extensions that followed the introduction of anaesthetics. Abdominal organs, such as the spleen and omentum were removed when extruded through accidental rents made by knives, spears, swords, scythes, sickles, and similar forms of violence. And its lost merit is to be appreciated.

The case of division was successfully performed in Roman times, and many a child, to use Shakespeare's phrase, "was from his mother's womb untimely ripp'd." This form of delivery has been effected by obstetricians of every time and place; by a patient on herself, and by the horn.

(a) Abstract of Address in Surgery delivered at the Annual Meeting of the British Medical Association, held at Aberdeen, July, 1914.
of a mad bull; in some instances mother and child survived. The success that followed this inartistic mode of delivery is instructive: forty years ago, Caesarean section had an alarming mortality, when performed by an unskilled operator, whilst the spayer and guillotine, in Mr. Liston's hands, was attended with almost invariable success. Lister railed at the riddle. To-day wounds made and closed in the course of a surgical operation unite with a certainty that can scarcely attract attention. Surgeons rarely pause to think what would happen were surgical wounds failed to heal. In the early days of abdominal surgery the incisions often failed to unite, and such patients frequently died. I shall later on place facts before you to show that failure of intestinal wounds to unite is one cause of the high mortality following operations for cancer of the colon. One of the most healthy intestines takes place quickly and perfectly.

**Surgery and the Microscope.**

It is usually described the remarkable progress of surgery to the discovery of anaesthesia and that perfection of methods designed to prevent wound infection, but we must not forget that most important was the invention of the microscope, without its assistance the minutiae which effect such great changes in organic and inorganic nature, and on it, so many varieties of infective diseases in man and plants, would have remained not only hidden but unsuspected. This important instrument of research, perfected by earnest workers mocked at as "brass and glass men," is now indispensable in clinical routine. Every improvement in the construction of the microscope has led to an increase in knowledge of the cause of disease. It has also become a means of popular instruction and amusement. Even embryologic processes are displayed to interested pleasure seekers on cinematographic films of "palaces" and schoolchildren are instructed in physiology, including the microscopic features of the blood. Disorders of the functions of the blood-forming organs, especially red marrow, and the significance of an excessive production of leucocytes has come to be thoroughly appreciated by surgeons that under certain conditions an excessive proportion of white corpuscles in the blood is a more emphatic sign to a surgical operation than sugar in the urine. It is in this direction that the increase of pathological knowledge, especially the form of it called clinical pathology, will influence operative surgery in the future. The light microscopic studies of the cord through the lumbar puncture acts as a megaphone to the surgeon when contemplating the removal of an enlarged spleen. The extirpation of a leucemic spleen is always followed by death, and this experience is crystallised in practice, for an abdominal tumour resembling a spleen always suggests a blood count.

**The Cerebro-Spinal Fluid in Surgery.**

Fifty years ago our knowledge regarding the physiology of the brain and spinal cord was of an elementary kind. It was the custom to teach that the cerebro-spinal fluid served as a watershed for the brain in order to preserve it from harmful concussions. In my student days this teleological explanation tickled my fancy, and I suggested to the lecturer on anatomy when the ethmoid of the skull of the cat, on this wise precaution of nature, that the explanation was absurd, for the relative bulk of brain and cerebro-spinal fluid resembled an ironclad in a duck pond. Now cerebro-spinal fluid is used as a medium for inducing temporary paralysing analgesia—a matter of no concern to the surgeon when he is called upon to operate in conditions where a general anaesthetic would be attended with unusual risks. The diagnostic importance of cerebro-spinal fluid obtained by lumbar puncture is not only great but its utility is increasing. Examination of samples of the cerebro-spinal fluid obtained by tapping the spinal theca is a routine in diagnosis.

In discussing influenzal meningitis, Flexner tells us that the fluid secreted by the choroid plexuses in infected monkeys contains an antiserum which escapes by the meningeal veins, and it may become possible to make use of this fluid to instill the blood by means of compounds injected into the cerebro-spinal fluid. Here is a method of specific therapy unsuspected in our wildest dreams: Science transforming the cerebro-spinal fluid into a pool of Bethesda! Enterprise surgeons are now devising methods by which this makes possible the intrathecal injection of salvarsan, in common with all arsenical compounds, irritate the spinal cord. To overcome this difficulty, salvarsanised serum obtained from the patient is injected into his cerebro-spinal fluid and tolerated. This is a good example of practical ingenuity. The results of surgical enterprise on cerebral tumours are unsatisfactory; the mortality is great and the cure of the patient of the disease is rare. The indefiniteness of gliomata formations makes them extremely unfavourable for operation, to say nothing of the difficulty in localising cerebral tumours in non-motor areas. It is probable that compounds will be discovered that can be injected into the cerebro-spinal fluid and cause gliomata to shrivel in an incomprehensible manner. Gliomas disappear under potassium iodide, mercury, or salvarsan, and thus abolish some of the most uncompromising operations of modern surgery.

**The Surgery of Malignant Growths.**

Investigations of the minute structure of morbid growths have been mainly useful in separating the so-called benign tumours from those which inevitably destroy life. Thirty years ago the two groups were regarded as distinct. It is true that types can be distinguished as innocent or malignant, but each genus of the so-called innocent group, with the exception of lipomas, contains species in which the histological features of malignancy shade away into those indicating malignancy. It is a matter of great importance when a declaration of malignancy entails the sacrifice of an organ or a limb. The horror patients entertain of malignant disease, and the stigma they think it imprints on the family reputation leads to willing submission when the surgeon offers operative treatment. It is an impression deeply ingrained in the profession that the presence of malignant disease justifies an operation, however extensive or dangerous, for its relief. Let us satisfy ourselves that surgical gambling with malignant disease is justified. There are two organs in the body often the seat of cancer and often attacked by surgeons—the uterus and colon, in connection with which this question may be fairly considered.

The results of removal of the uterus for cancer in its neck are by no means uniform even when the conditions are apparently favourable. The microscopic features of cancerous growths do not help in explaining variations in the clinical course of the disease. There are intrinsic and extrinsic factors concerned in estimating the malignancy of uterine cancer which have only recently been appreciated. Our predecessors in the art of surgery failed to recognise a remarkable alteration in the appearance of advanced malignant patients the subjects of advanced malignant
disease, which they expressed by the phrase cancerous cancer. This expression has a special relation to cancer, it is due to the entrance into the circulating blood of toxic substances secreted by the bacteria and cocci which colonise cancerous growths in exposed situations. The relation of bacteria to cancer is a matter of first-rate importance to the surgeon, and influences his work very materially. Inoperable cancers of the breast are sterile. Cancer of the tongue usually swarms with streptococci, and the neck of a uterus when cancerous is colonised by staphylococci, or streptococci, and the coli group. This led me to make bacteriological investigations and treatment postulating the removal of this large-intestinal flora. The results are not gratifying. Resections of the caecum, or portions of the colon, are attended with a high rate of mortality, and of those who survive operation early recurrence or dissemination is the rule. Surgeons know this, and in order to improve the results of operative treatment postulating investigation have been made on the distribution of the blood and lymph vessels of the colon. In spite of much admirable work and surgical enterprise, cancer of the large intestine is as obnoxious to the surgeon as hysterectomy for cancer of the neck of the uterus to the gynaecologist, and for the same reason—sepsis.

The radical method of dealing with cancer of the colon consists in free resection of the cancerous portion in favourable cases; this requires a complicated operation for the reanimation of the bowel, entailing a suture which must be not only watertight but gastight. One of the first requisites for the method of the neck of cancerous uterine to enter into consideration. Colle cancer sometimes leads to abscess when it is infected by the coli group. The frequency with which visceral cancer mimics inflammatory conditions and misleads physicians and surgeons alike is due to sepsis. The appreciation of the causes of failure in the surgical treatment of colorectal cancer should exercise some influence for good. It is by no means uncommon to see surgeons clad in sterilised overalls, gloves, caps, masks, and top boots resecting a cancerous segment of colon swarming with pyogenic microorganisms. This can only be described as surgical heresy. Some of our methods of finding bacteria in the course of an operation are almost as clumsy as attempts to kill fleas with bludgeons.

THE SURGEON OF THE FUTURE.

In pre-Listerian days the path to surgery lay through the dissecting-room. A thorough practical knowledge of the anatomy of man was and is indispensable to a sound surgeon. Many surgeons whose names are prominent in the history of surgery—from John Hunter to Ferguson—took it as a matter of course that all surgeons should have had an anatomy by dissection. Surgeons no longer act as anatomists nor conduct post-mortem examinations; the principles of antiseptic surgery forbid such occupations. The practical training in the dissecting-room and post-mortem room teaches men something of the condition of the body, but this is only the preparation of the student for the two books—the appreciation of tissue; this means, in plain terms, the power to recognise organs and tissues, normal and abnormal, at sight or by touch in the course of an operation. Surgeons are of two types, they are either craftsmen or biologists, and we can call them by these names because the variations in technique—metal plates, wires and screws for bones; or fancy methods of suturing wounds. Some expend their ingenuity on surgical cutlery and improve the knives and needles. The utility of a simple tool such as the clip forces is inestimable. In spite of much ingenuity among surgeons, an ideal ligature material awaits discovery. Clever contrivances like the laryngoscope, bronchoscope and cystoscope have revolutionised special branches of surgery. Another useful instrument, the osteoscope, requires for its successful use a surgeon with the instincts of the sword-swaller and the eye for a neck. This was the kind of my colleague, Alfred Johnson. I witnessed through the cystoscope a stone slowly extruded from the vesical orifice of the ureter.

The biological surgeon studies pathology in its broadest aspect, and investigates, in the laboratory, the problems of morbid anatomy and bacteriology. The diagnostic value of reports issued from the laboratory by the biologist and the bacteriologist, to be of value, must be estimated with the help of clinical experience. If the surgeon has had no experience in bacteriological methods he must accept the reports from the laboratory with the hopefulness of a patient swallowing physic compounded from a prescription he does not understand and which he is often unable to read.

The skill, ability and dexterity with which surgeons remove a kidney, the uterus, or perform extensive resection of the intestine, great and small, can be witnessed almost daily in the splendid hospitals of large cities, but surgical effort is handicapped by streptococci and the coli group, which are very resistant to chemotherapy. There is something more soothing in submitting septic morbid growths to what Ehrlich picturesquely terms a "bacteriological siege." The magical effects of salvarsan on the lesions of syphilis, acute and chronic, lead us to hope that this compound will assist in the elimination of cancer of the mouth and tongue, for in these situations cancer is often engrafted on chronic syphilitic lesions. It is reasonable to believe that within a few years surgeons will notice a marked decrease in the number of men with cancer of the lips, gum, tongue, and pharinx, and of women with cancer of the vulva. The extinction of these forms of cancer will relieve surgeons of some of the most distressing and unsatisfactory operations they are called upon to perform.

In regard to the cure of malignant disease, there is most hope in chemotherapy. In detecting the cause of cancer histology has proved a false dawn, but, like that peculiar light which precedes the dawn in the tropics, it is fascinating. We can tell how low the stars shall have to sink for the real dawn! We need not despair; the zeal, enthusiasm and acumen of laboratory workers fill us with the hope that the ideal of all practitioners of medicine and surgery is attainable—the control of all forms of infective disease.
SPECIAL REPORTS.

ROYAL FREE HOSPITAL.

VENTRAL HERNIA.—Mr. Willmott Evans operated on a gentleman who had a ventral hernia. The history was that three years ago she suffered from appendicitis, for which she had an operation at another hospital. An abscess had been present, for which drainage was employed. When the wound had healed a recurrence of this condition she had had two operations, but neither had resulted in a cure. On admission at a point about an inch and a half external to the outer margin of the right kidney, a small firm body about three inches long and a half where palpation showed that the greater part of the abdominal wall was absent. When the patient coughed a prominence appeared at this part. The patient having been anaesthetised, an incision was made about three inches long along the outer border of the hernia; the peritoneal cavity was opened and it was then found that the sac was adherent to the skin over the greater part of the hernia. With great care the bowel was separated from the attached skin; it was then returned into the abdomen and the scar of the skin was excised. The peritoneum was then united by a continuous silk stitch and then the insular planes were united in turn, in each case some omentum placed. External drainage was employed, to overlap that portion of the external oblique and its fascia which was in the wound. The skin was united with silk and the wound was dressed.

Mr. Willmott Evans says, although ventral hernia might result from a blow not damaging the skin, but weakening the abdominal wall by the rupture of some muscular fibres, yet in the majority of cases it was the result of a wound of the abdominal wall, either intentional as in an operation, or accidental. The great increase during the last twenty years in operations for appendicitis has unfortunately resulted in an increase in the number of ventral hernias. The operation for appendicitis is especially likely to lead to weakness of the abdominal wall if long lasting drainage has been employed; but even when drainage has been used a ventral hernia would appear in only a small proportion of the cases. A ventral hernia is almost unknown in cases in which the Battle incision has been used for the rectus muscle offers great resistance to the stretching of the scar. It is not at all uncommon to find some structure adherent to the hernia. This may be omentum or intestine, and the operation on such a structure requires to be done with great care; sometimes it is advisable to cover the bare patch in the wall of the bowel with a piece of omentum in order to prevent further adhesions forming. Overlapping the inadmissibility of different layers of fascia, and at the site of the hernia is of great value in preventing recurrence, and it is sometimes necessary to employ a filigree or a fascial transplant in cases where the abdominal wall is naturally weak or atrophic. The after treatment is not without importance: it is essential that no undue strain should be thrown on the abdominal wall until the tissues have become consolidated; therefore, when the bandages are discarded they must be replaced by an abdominal belt which should be worn for at least six months, or better, for a year after the operation. He thought it was hardly necessary to state that there was an essential difference between ventral hernia and umbilical hernia, as regards the treatment, but the same principle obtained that the layers of the anterior abdominal wall must overlap.

As to the subsequent history, the wound healed by first intention as the patient was able to leave the hospital after the operation wearing an abdominal belt, and when heard of some months later, no recurrence had taken place.

Six medical men, comprising the voluntary staff at the Barry Accident Hospital, have decided to tender their resignations to the District Council, and have given this week notice. The most serious consequence of this action was the engagement of a surgeon at £500 a year.

OPERATING THEATRES.

THE EIGHTY-SECOND ANNUAL MEETING OF THE BRITISH MEDICAL ASSOCIATION, HELD AT ABERDEEN, 1914.

(By Our Special Representative.)

SECOND ARTICLE.

GREETED with such a "Bon-accord" welcome as only Aberdeen could give, the eighty-second annual meeting of the Association have every reason to recollect their visit to the "Granite City" with pleasureableness feelings. The weather, if not brilliant, was kind, and the cool northerly breezes provided an invigorating tonic which made the meeting more suitable to those coming from the south. All the arrangements for the entertainment of visitors, and especially of the ladies, were excellently carried out, and much praise is due to the energy and forethought of Dr. T. Fraser, the Hon. Local Secretary, and to the various local committees for combining to render the 1914 meeting one of exceptional interest.

At the annual general meeting on the Tuesday afternoon, Sir Thomas Clifford Allbutt, K.C.B., M.A., F.R.S., Regius Professor of Medicine in the University of Cambridge, was introduced, and it was announced that the meeting in 1915 would be held in Cambridge. It has been decided to continue the Scottish office for the Association with a whole-time medical secretary, and upon a vote being taken at the representative meeting, Edinburgh was selected as the centre for this office.

RELIGIOUS SERVICES.

This year there were no less than three services arranged for the Association, of which the principal one of which, however, was that held at the West Parish Church of St. Nicholas (Church of Scotland), Aberdeen, at 9 a.m. on the Wednesday morning. Those attending this service were the Moderator of the General Assembly, the Right Reverend Dr. Baillie, and the Rt. Rev. Dr. John Gordon and Thomas Fraser. Selecting for his text St. Luke xxii., 27, "I am among you as He that serveth," the Rt. Rev. Dr. Anthony Mitchell, Bishop of Aberdeen and Orkney, from Rev. xxii., 2, "And the leaves of the tree were for the healing of the nations," he referred to the healing influences which proceeded impalpably from the highest self of the physician whose work called forth the finest qualities of the human soul, especially those of compassion, mercy, courage, and self-sacrifice.

The service for Roman Catholic members was held in St. Mary's Cathedral. After Mass was celebrated, the Rt. Rev. Dr. Menny, the Administrator of the Cathedral, preached the sermon from Ecclesiastes viii., 3, "The wise man of the generation to come give knowledge to men that He may be honoured in His wonders." He said that Aberdeen was proud to acknowledge the debt the Church owed to the illustrious Bishop Finlaystone, who established in their city the first chair of medicine in this country.

The President's Address.

The Music Hall in Union Street was crowded on Tuesday evening to hear the President's address. The proceedings were opened by Lord Provost Maitland, who welcomed the Association officially to Aberdeen.
After the foreign and colonial delegates had been received, gold medals of merit were presented to Mr. T. Jenner Verral, Chairman of the Representative Meeting, and to Dr. Edwin Rayner, Treasurer of the Association. Sir John Bland-Sutton delivered his presidential address on "The History of the Medical School of Aberdeen," full of interesting historical allusions, an abstract of which will be given in our columns next week.

THE ADDRESS IN MEDICINE.

The Mitchell Hall, Marischal College, was well filled on Thursday morning to hear the address in Medicine delivered by Dr. Archibald E. Garrod, M.D., F.R.C.P., F.R.S., Physician to St. Bartholomew's Hospital, who chose for his subject some phases in the history of medical science and art. He traced the growth of pathology, bacteriology and chemistry in its medical aspects and stated their practical bearing upon modern medical therapy. The address appears elsewhere in our columns (p. 147).

THE ADDRESS IN SURGERY.

This was delivered in the Marischal College on Friday at Midday by Sir John Bland-Sutton, F.R.C.S., Surgeon to the Middlesex Hospital, who, in dealing with "The Surgeon of the Future," spoke of "surgical gambling with malignant disease," and pointed to the salient impression that the presence of a cancerous growth in a patient requires an operation. He thought that the relationship between sepsis and cancer was an important matter for the surgeon. In regard to the cure of cancer he declared that the greatest hope lay in chemotherapy. Sir John Bland-Sutton made his audience laugh when he said that the surgeon who used the osophagoscope required for its successful use the instincts of the sword swallowers and the eye of a hawk. A full abstract of this most suggestive address appears on p. 149.

THE ANNUAL DINNER.

On the Thursday night, as is customary, the annual dinner of the Association was held at the Music Hall, Union Street. The company, which embraced 400 ladies and gentlemen, included the following guests of the President and members of the Association—Lord Provost Maitland; the Principal of the University, Rev. G. A. Smith, D.D., LL.D.; the Right Rev. Professor Nicol, Moderator of the Church of Scotland; the Right Rev. Dr. Chisholm, Bishop of Aberdeen; the Right Rev. Anthony Mitchell, Bishop of Aberdeen and Orkney; Rev. G. H. Donald, West Parish Church; Mr. J. E. Cramb, Lord Provost; Mr. John Fleming, Lord Provost; Mr. Irving, of Drum; Mr. Harvey Hall, President of the Society of Advocates; Rev. Ronald Douglas Duncan, Secretary of the Society of Advocates; Dr. John Strachan, Provost of Aberdeen Royal Infirmary; Mr. Ledingham, Chairman of the Royal Asylum Board; Mr. John Michie, H.M. Commissioner, Balmoral; Dr. J. A. Macdonald, Chairman of Council, B.M.A.; Mr. Edwin Rayner, Treasurer, B.M.A.; Mr. T. Jenner Verral, Chairman of Representative Meetings, B.M.A.; Dr. A. Cox, Medical Secretary, B.M.A.; and Mr. Guy Elliston, Financial Secretary, B.M.A.

After the loyal toasts had been duly honoured, Mr. T. J. Verral proposed "The City and University of Aberdeen." Speaking of the advantages of its university degrees, he said that those who knew best the Aberdeen born and bred must conclude that into his composition there have entered a considerable proportion of the far-damed local building material—polished granite. (Applause and laughter.)

Lord Provost Maitland and Professor G. Adam Smith, B.M.A., respectively presented to the City and University respectively, the toast of "The British Medical Association," which was delivered by Dr. Alexander Scott, of Glasgow, who dealt with the industrial aspect of alcoholism, and Mr. McAdam Eccles, who emphasized the need for special research into the question of the use of alcohol in the circulatory blood. Dr. Crichton Miller, and Mr. T. H. Bickerton (Liverpool), also spoke.

THE UNIVERSITY OF ABERDEEN.

The University authorities gave a reception on the Wednesday night in the Mitchell Hall of the magnificent Marischal College, which was attended by 3,200 members and their lady friends. A capital organ recital was contributed by Mr. J. M. Nisbet, and further music was provided by an excellent orchestra. Academic costume was worn by the majority of the guests.

On the Friday morning, the Senate of the University conferred the degree of LL.D. (honoris causa) upon Sir John Bland-Sutton, Dr. A. E. Garrod, of St. Bartholomew's Hospital, London, and Sir Victor Horsley (in absentia). Mr. T. Jenner Verral, Chairman of the Representative Meetings, and Mr. W. T. Hayward, of Australia. (To be continued.)
CORRESPONDENCE.

FROM OUR SPECIAL CORRESPONDENTS ABROAD.

GERMANY.

At the Hufeland Society, Hr. Strauss showed a number of preparations, amongst them a case of Ulcerous Proctosigmoiditis, a diverticulum of the sigmoid, carcinoma of the sigmoid flexure, affected with benign polypi at the same time, and a series of high-seated polypi which had led to the removal of the part of the gut by Hr. Ewald emphasised the importance of examining every rectal case with the rectoscope. If this were always done many errors of diagnosis would be avoided. It was important in using this that the rectum should be thoroughly cleansed beforehand. With this in view he always gave a purgative the night before and a rectal infusion from half an hour to an hour before the examination. He held this thorough cleansing to be quite necessary. In Hirschsprung's disease it was quite characteristic how easily the tube was introduced and the case with which the instrument could be moved about in the rectum. Hr. Hans Köhn remarked that multiple diverticula in the rectum were only to be met with in elderly people. Hr. Ewald claimed that diverticula were met with in the young, but they were long ones, whilst those met with in the aged were small from distasises in the muscular layers, which allowed the bowel to push through. Hr. Strauss observed that in proctogenous constipation he had recognised a distinct form of disease with distinct symptoms and etiology and requiring special treatment. This differed from that described by Hertz in one point in that Hertz, had attributed to it special features, as shown by the Röntgen rays. As the latter were not at all necessary, however, for diagnostic purposes, it was only a case of giving a neozazis of the sigmoid flexure, the case described by himself. It was not true that such conditions as he had described had been mentioned in literature, amongst others by Ewald, but before the appearance of the speaker's publications, a systematic analysis had been wanting. As preparation of the patient preliminary to the use of the endoscope he was of opinion that an enema given the night before was more suitable than an aperient, as by that the lower bowel was cleansed and further obscured by the enema above rendered evident that whenever he was about to use the endoscope and he suspected a possible wandering down of faecal matter he accompanied the washing out of the bowel by a dose of opium.

Recently there had been a case of stenosis of the sigmoid probably on a syphilitic foundation. The patient was a man, aged 60, who had suffered from lassitude for two years, who came in for operation in an acute stage, with a provisional diagnosis "carcinomatosus closure of the large intestine." The man died of peritonitis. The autopsy showed a long patch of thickening of the sigmoid commencing 3 cm. above the anus. Here was a long ulcer sharply defined with a smooth Black-Fredericks surface, undermined edges and reaching down to the muscular layer. There was also disease of the aorta in the commencing stage, an atrophic noma ulcer also in the abdominal aorta. Microscopic examination showed distinct thickening of the adventitia with lymphocytes and giant cells, also a median rent with round-celled infiltration. The whole had the appearance of syphilitic aortic sclerosis.

At the OtoLOGische Gesellschaft, Hr. Bruhl gave some account of the case of thinning of the ear.

EDUCATION OF DEAF AND HOULY.

At a meeting of the Committee of the Society of the deaf and dumb, a case of deafness was brought forward. It was a case among 3,304 children brought for examination, 258 were found suitable for the "hard of hearing" school.

General measures for management of children suffering from deafness, either total or partial, were first in the kindergarten, into which children were admitted at four years of age; the objects here were retention of power of speech when not altogether lost, for children with some remains of hearing power, efforts were made to increase and sharpen it, for the totally deaf the aim was to develop the natural voice, the deaf and dumb schools in which classes were formed according to the mental development. Continuation schools for the deaf and dumb in which trades and useful manual occupations were taught, the latter being fitted for domestic employments.

For the hard of hearing there were at present three institutions for these situated in the northern, central and southern parts. Although the hard of hearing schools were six schools, four schools was in process of erection in the north-west part of the city. It is proposed to build a continuation school for the hard of hearing also. For the hard of hearing in the municipal and private hospitals there were special classes held for them. The director of the deaf and dumb school gives special lectures to parents and relatives of the deaf and dumb as to home education of the deaf, and had a special consultation for advice in special cases.

AUSTRIA.

Vienna, Aug. 1st, 1914.

PATHOGENESIS OF QUINCKE's EDema.

At the recent meeting of the Gesellschaft für innere Medizin und Kinderheilkunde in Wien, Dr. P. Neudorff brought forward a communication which dealt with the problem of the "Pathogenesis of Quincke's Edema." The characteristic features of this clinical condition are: (1) Enlargement of the spleen, which is recognisable both by palpation and percussion; (2) intense urlobilinuria, with eventual appearance of blood urinuria; and (3) a general enlargement of the lymphatic system through the spleen, which is not so constant as that of the former; (4) peculiar properties displayed by the blood, such as increase of the hemoglobin constituent and ascent of the coloration index, immediately before the attack and during the period of the enlargement of the spleen; (5) the edema is caused by the sequestration of the blood-corpuscles from the circulation through the spleens and fat glands of the body. The second of the above-mentioned cardinal symptoms, that of urlobilinuria, is in close accordance with the pathological examination that we are dealing here with a condition of which the essential factor is a hemolytic process. Thus the presence of urlobilinuria could be readily accounted for by a relative functional insufficiency of the secretory organs of the liver, in particular of the biliary ducts, as the nerve material for the physiological formation of bilirubin, which is itself a direct result of an increased destruction of the blood corpuscles. The third characteristic of the condition in question could also be explained by a hemolytic process. An interesting and important result was procured by the data afforded by a daily systematic determination of the resistance of the erythrocytes. In the absence of the attack the minimal resistance was remarkably low, about 0.54.
during the attack it was found to be 0.4; and even increased further; the maximum resistance which had previously been considered the highest, was observed to fall to 0.34 after the onset of the attack. From these observations Dr. Nenda came to the conclusion that immediately on the development of the paroxysm the erythrocytes of very high resisting power rapidly underwent destruction, and it is probable, of course, a result of increased activity of the process of hemolysis. The ascent of the standard of minimal resistance is shown by the results of experimental research, and has also been confirmed by the experience which distinguishes us with many published data obtained in this way. Thus we have the fact of the increased resistance which follows the injection of blood deprived of colouring matter—and all these results point to the following explanation of the phenomena. As, with its resulting consequence of the development of hemoglobinuria, may be held to supply the true explanation of the increased resistance. The hemoglobin content of the serum during the paroxysm had been determined by Dr. Nenda in two instances. He would explain the characteristic external physical feature of Quincke's affection, that of acute circumscribed swelling, by a form of hydramma, which originated as a result of which we had the attack, and was clinically demonstrable from the condition of the urine and alvine evacuations, dryness of the mouth and feeling of thirst. He also pointed out the fact that an analysis of which produced a change of osmotic pressure in the interior of the vessels, has also a corresponding simultaneous effect in the surrounding tissues. Then as the resistance is not equal in the two cases, the resistance thus elevated is a matter of the area of resistance resistentia, through which the general transudative diathesis comes to find its opportunity for expression. Exogenous factors that produce a diminution of the powers of resistance of the various surrounding tissues, such as a sudden stroke or continuous heavy pressure, undoubtedly play also an important part under such conditions. Dr. Nenda had also noticed the occurrence of a retention of chlorides in the interstitial fluid which immediately preceded the attack. Thus the condition of acute circumscribed edema appeared to him as a symptom, while the disease proper—of which its presence furnished an indication—was a hemolytic process resulting from the presence of a poison.

FROM OUR SPECIAL CORRESPONDENTS AT HOME.

SCOTLAND.

VENEREAL DISEASE AND NOTIFICATION.

The Medical Officer of Health for Glasgow, Dr. Chalmers, has been giving supplementary evidence before the Royal Commission on Venereal Disease. He said that he was of opinion that no form of compulsory notification, whether for any group of persons or of cases, would effect its object. His view was that the public required not compulsion, but enlightenment. He had made no authoritative statement showing the danger to life in after years of syphilis contracted at an earlier period, and of the disastrous effect on children, would help to form an enlightened public opinion which would at least induce those who might contract the disease to seek effective treatment, even if it failed in the ultimate purpose of inducing them to avoid exposure to it. The main problem at the present time was the organisation of efficient diagnostic and treatment. 

CALEDONIAN MEDICAL SOCIETY.

This Society has been holding its annual meeting and dinner in Glasgow. Dr. I. T. Macachlan, the President, occupied the chair at both. At the dinner Sir David C. McVicar, in proposing the toast of the Society, said that he had found in their records a great deal of evidence of high culture in the medicine of the Highlands. He thought they were right in having a society which upheld Celtic medicine and the credit of the Celtic past of the population of Scotland. On the subject of Celtic medicine the Society had a large number of papers, which by themselves would have filled a large number of volumes. The Chairman, in responding, said that the Society was formed in 1878 by a small but enthusiastic band of medical students in Edinburgh. At the present moment the membership was nearly 700, scattered over Scotland, Ireland, and the Dominions across the sea. The Society was chiefly concerned with ancient Celtic literature regarding medicine and cognate subjects. Dr. Barlow, the President of the Royal Faculty of Physicians and Surgeons, gave the toast of "The Universities," to which Sir Hector Cameron responded.

MEDICAL BENEFIT IN PÄISLEY.

The insured population in Paisley is something over 34,000. On the panel there are 90 doctors and 76 chemists. The number on the doctors' lists varies from 5 to 3,213. Six have less than 500 patients each; seven have between 500 and 1,000; eight between 1,000 and 1,500; four between 1,500 and 2,000; three between 2,000 and 2,500; and one has 3,213. This would seem to show that one doctor has none. In regard to sanatorium benefit the current expenditure is, it is stated, at a higher rate than the previous year. A certain portion of the medical profession may be inclined in administering this benefit if the Committee is not to fall behind. For the year to 1st ult., there were 66 applications for sanatorium benefit, of which 64 were granted and 2 were, on medical grounds, refused.

THE PARASITIC CAUSATION OF DISEASE.

Dr. J. T. Macachlan, in his recent Presidential Address to the Caledonian Medical Society, dealt with the subject of the parasitic causation of disease. He stated that the parasitic pathogens of any given disease were discovered and their habits ascertained, they could be destroyed with as much certainty as the wild beasts of the forest. It was only a question of money and the appointment of expert men to devote their entire attention to such investigation. Dr. Macachlan advised men over 60 years of age who are possessed of sufficient funds to subscribe £50,000 as their best insurance policy, to the investigation of the parasite or parasites concerned in the causation of pneumonia, which was so fatal to elderly people. In his opinion, cancer would sooner or later disclose a parasitic origin. He appealed to the large cities to appoint at least one expert to devote his entire time to the elucidation of the cause of any single infectious disease, and he predicted the final annihilation of all infectious diseases that afflict humanity.

LETTERS TO THE EDITOR.

[We do not hold ourselves responsible for the opinions expressed by our Correspondents.]

IMPERIAL ASPECTS OF THE POPULATION QUESTION: THE DECAY OF FRANCE.

To the Editor of The Medical Press and Circular.

Sir,—My last letter ended with a brief reference to a lengthy dispatch from the correspondent dated the 8th, headed "Coloured Labour in France." The correspondent does not even distinctly allude to the obvious sound remedies that lie at hand; he merely records the facts that already several English and African firms are at work in the coalfields of the North and the vineyards of the South; and that, handicapped by a low birth-rate and high mortality, the population of France no longer suffices to meet the demands the country has made upon it by the increase of industrial development. He does not state that all the northern neighbours of France show an enormously greater birth-rate and a much lower death-rate. He does not point out that in France the workers are due, in large part, to the deliberate action virtually of the whole of the married couples; the other to the almost complete disregard of the scientific teachings which the whole of Western Europe, except France, is acting upon. Sanitation there is more than France remains at this present day in great part medieval in character. The correspondent then goes...
to show that the magnitude of the need for labour is well exemplified in the development of the newly opened Black Country of France on the German frontier.

The correspondent dwells upon the fact that the countryside population has been quite insufficient to take up the new industry. In the new German frontier villages, have become Italian. Throughout the coal districts, among the Belgian frontier, a similar state of affairs exists. Belgians, however, have taken the place of Italians, and in this way the following national element has been absorbed:—people, whom the correspondent considers can be called "medical treatment" it must fulfill two conditions—viz, (1) It must be intended to benefit the patient; (2) It must be done with the consent of the patient. Your readers will agree that in dealing with such a delicate matter as these regulations, to be satisfied in ordinary medical practice. The Committee does not consider that the mere infliction of pain is "torture," but holds that what constitutes "torture" is an object in view when the pain is inflicted. To take a simple example: no one would maintain that when a dentist pulls a tooth a he is inflicting "torture," though he may be causing severe pain. Everyone will, however, agree that if a Jew's tooth is pulled out in a country where those who his money is hidden, torture has been inflicted. The Committee maintains that forcible feeding is carried out to compel the prisoner to serve a sentence of imprisonment, and is continued until it is evident to the Home Office that it is safe to discharge the prisoner. Is your own argument, putting the present regulations, can be settled by the introduction on the large scale of North African natives, preferably Kabyles, who, in small numbers, have given great satisfaction.

In a previous letter I mentioned the scheme lately broached for augmentation of the French home army by drafts of Africans from their colonies, and pointed out that such a proposal resembles really like the proposal for an European winter campaign. In the event of a European war the French would need to reinforce all their African garrisons by troops from home, and this—was clearly seen when they were sent to the colonial enterprise. It would be difficult to imagine a conflict with Germany, and might alone render their position from the first hopeless. All these facts—the danger to the State primarily arising from the restriction of the birth-rate—have, as I showed in an earlier letter, been constantly urged upon their people by leading French statesmen. The effects upon the individual citizens, and upon the children when the family never on the average exceeds two, and the effects upon the race of a system of artificial selection of the wrong kind, have all been continually examined and thirsted before the eyes of Frenchmen by their men of letters and men of science. The teachings and exhortations have been made in vain, and the French peasant has refused to recognise anything himself in the nations of old that were led to decay and ruin by like causes. To some of these latter topics I may, with your permission, perhaps return.

I am, Sir, yours truly,
Henry Sewill,
Earlswood.
July 25th, 1914.

P.S.—It was by accident evidently that this letter did not appear along with that of "Neo-Malthusian" in your last issue, July 20th. I have previously dealt with some of the fallacies he enumerates, and shall hope to deal with the rest, if you will allow me, later on.—H. S.

July 30th.

FORCIBLE FEEDING.

To the Editor of The Medical Press and Circular.

Sir,—The leading article on "Forcible Feeding Protocols in your issue of July 22nd has been discussed by the Forcible Feeding (Committee on Personal). You say the question is begged by the use of the word "torture." The Committee is prepared to justify its use of that word. The term that is used by those in favour of forcible feeding is "Medical treatment." Consequently, if considered that the term "medical treatment" may not express all the conditions—viz, (1) It must be intended to benefit the patient; (2) It must be done with the consent of the patient. Your readers will agree that in dealing with such a delicate matter as these regulations, to be satisfied in ordinary medical practice. The Committee does not consider that the mere infliction of pain is "torture," but holds that what constitutes "torture" is an object in view when the pain is inflicted. To take a simple example: no one would maintain that when a dentist pulls a tooth a he is inflicting "torture," though he may be causing severe pain. Everyone will, however, agree that if a Jew's tooth is pulled out in a country where those who his money is hidden, torture has been inflicted. The Committee maintains that forcible feeding is carried out to compel the prisoner to serve a sentence of imprisonment, and is continued until it is evident to the Home Office that it is safe to discharge the prisoner. Is your own argument, putting the present regulations, can be settled by the introduction on the large scale of North African natives, preferably Kabyles, who, in small numbers, have given great satisfaction.

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July 30th.
OBITUARY.

JAMES DUNCAN FARQUHARSON, M.D., OF NEWCASTLE.

We regret to announce the death of Dr. James Duncan Farquharson, of Westgate Hill, Newcastle, on the 27th July. Deceased was one of the best known medical practitioners in the city, and had an extensive practice in the West End. He had been in failing health for some time. The news of his death came as a surprise to a wide circle of friends, by whom he was held in the highest esteem.

Dr. Farquharson was born at Perth on August 14th, 1858, the younger son of the late David Farquharson, a contractor in that borough. He studied medicine at Glasgow University, and in 1884 took the degrees of M.B. and C.M., and obtained first-class honours. At Glasgow University he was for two years his University boat. In later life he was particularly interested in hunting and fishing, but he always retained his interest in all forms of athletics. He was Surgeon-Major to the 1st Newcastle-on-Tyne Royal Garrison Artillery Volunteers. He was a keen student of local municipal affairs, and was at one time a member of the Newcastle Council, to which he was elected as the representative of the Arthur’s Hill Ward in 1897.

Dr. Farquharson was a Fellow of the British Gynaecological Society, and also a Fellow of the Edinburgh Obstetrical Society. He occupied the position of Secretary for some time to the Northumberland and Durham Medical Society, and was President of the Newcastle Scottish Association. Dr. Farquharson was married in 1902 to Miss Adeline Falder, the eldest daughter of Mr. Edward Crossley, of Barnborough Grange, Doncaster.

MEDICAL NEWS IN BRIEF.

Death from Acute Haemorrhagic Pancreatitis.

At a recent Sunderland inquest on the body of Haswell Thompson, aged seven, the medical evidence showed death was due to an uncommon disease. The father of deceased said the boy had always seemed healthy, and even on the morning of the day when death took place made no complaint. Deceased, he said, against his wishes used to go to the Scottia Engine Works and ask the men there for bread. Why he went witness could not say, for he got plenty of good food at home.

Dr. Anderson stated that when he saw the boy, about half an hour before death, he was in a state of collapse. The heart was, however, beating strongly, and witness was then unable to say what was the matter. The post-mortem which he and a colleague held later revealed that death was due to acute haemorrhagic pancreatitis. This was a rare disease, said the doctor, and the cause of it was not exactly known. In answer to the Coroner witness hazarded the opinion that there might have been set up by the eating of bad fruit or other unfit food.

A verdict of death from acute haemorrhagic pancreatitis was returned.

Successful Claim of Factory Worker for £25 Damages.

In the City of London Court last week, before Judge Atherley-Jones, K.C., and a jury, Daisy McShee, factory hand, 23, Clapham Junction, made a claim, through her father, under the Employers’ Liability Act against the Royal Petroleum Company, Ltd., St. Helen’s Court, to recover £25 as damages for personal injuries suffered while working for them.

The plaintiff alleged that on April 28th she entered the service of the defendants. It was her duty to assist in soldering with an acid or chloroform mixtures of motor-spirit, and her hands were poisoned by the acid which was used. She complained to the defendants’ foreman, who told her to get on with her work and not to think of it.

The defendants’ case was that the liquid which the plaintiff used was what was technically known as “killed,” was innocuous, and that Mr. Doughty, the defendants’ counsel, put some on his hands and lips, and found there was no danger in doing so.

The jury found a verdict for the plaintiff, and awarded £25 damages.

Death under Anæsthetic.

Mr. Clitterhouse Smith, Deputy Coroner, held an inquest at Brixton last week respecting the death of Mrs. Emily Mates, aged 59, a widow, of 12, St. Nicholas Road, Balham.

Dr. G. Grimmer, of Balham, said that, owing to deceased’s condition, the operation was absolutely necessary. A week previously she had been thoroughly examined, and found to be in a fit state to undergo the operation, which was not considered a serious one. Shortly before the operation deceased was again examined. Witness had no idea that the deceased would be able to administer the anæsthetic, and for a trained nurse to be present. Witness had only concluded the operation, which took from 30 to 35 minutes, when Dr. Nunn told him that deceased was unconscious, and that chloroform well. Just as the operation was finished, he noticed a change in deceased, and acquainted Dr. Grimmer at once.

Dr. J. D. Stubbs, of Tulse Hill, who had made a post-mortem examination, said that death was due to syncope, following the operation, while under the anæsthetic. Chloroform was the proper anæsthetic to use.

The jury returned a verdict in accordance with the medical evidence.

Royal College of Physicians of London.


Society of Apothecaries of London.

The following candidate passed the necessary examinations and has been granted the L.S.A. Diploma of the Society, entitled him to practise medicine, surgery, and midwifery:—G. B. Holland.
NOTICES TO CORRESPONDENTS. &c.

Correspondents requiring a reply in this column are particularly requested to make use of a Distinctive Signature (or initials), and to enclose a stamped, addressed envelope.

"Reader," "Subscriber," "Old Subscriber," etc. Much confusion will be avoided if attention is drawn to these pecuniary terms.

Reigning articles appearing in this Journal may be had at a reduced rate, providing authors give notice to the publisher or editor before the copy has been distributed. This should be done when returning proofs.

Owing to Bank Holiday there will be no Irish Supplement with this week's issue.

F. C. (Carlisle).—The address of the writer of the paper referred to is Nancy, France.

N. G. F. W. (Quebec).—The senior members of the staff of the Medical Journal were full of praise of the Irish hospitals and the surgeons mentioned by our correspondent, and not likely to be the damper. The answer to the question in the negative.

Iniquity.—The X-rays are a valuable means for confirming a diagnosis of cancer of the stomach. A recent authority has stated that in a hundred consecutive cases in 87 per cent. a definite diagnosis of the disease was established.

G. P. (York).—A recent suggestion in the treatment and prevention of bed sore is spousing the part with a 1 to 50 solution of creosote in alcohol.

County Surgeons.—The only dignified course to pursue is the purely scientific. Apart from and beyond that our correspondent would expose himself to retaliation, which would be harmful to his health.

SCIENTIFIC RESEARCH FOR THE LOCAL GOVERNMENT BOARD.

The President of the Local Government Board has authorised the following researches to be paid out of the annual grant voted by Parliament in aid of scientific research and the investigation of diseases respectively.

These are in addition to the investigations already announed.

1. An investigation in the details of the technique in carrying out Wassermann's reaction for the diagnosis of syphilis. The Army Council have consented to give Mr. Rufus Horrocks, M.R.C.S., the necessary assistance to carry on the research.

2. An investigation by Mr. H. J. Grauvink, in collaboration with the Board's pathological staff, of certain cutaneous tuberculous reactions, and the possible use of these reactions as an index of the presence and virulence of the disease. This work is being carried on in connection with the Royal Society of Medicine.

3. A continuation of the investigations of Drs. Twort and McIndoe on infantile paralysis, with special reference to the conditions governing the absorption of toxic substance from the alimentary canal.

A further investigation into the causes of still births by Drs. C. J. Lewis and Dale.

P. A. (Retford).—From some recent observations by Dr. D. J. Thomas, Medical Officer of Health of Stepney, it appears that pulmonary tuberculosis is more common among Jews than others, and that the Jews have a higher death-rate. The death-rate in this disease in Whitechapel last year was more than 1,000 in the rest of the borough.

T. H. (The Hague).—The matter was discussed at the recent Aberdeen meeting of the British Medical Association, when many speakers in the field of tuberculosis discussed the value of giving elementary instruction upon sex hygiene to older scholars.

J. T. S. (South Shields).—Our correspondent is advised not to accept any letter of our quills for the certificate and examination.

Dr. M. G. (Kent).—The symptoms are certainly suspicions of neumonia, but in the absence of any definite microscopic finding the diagnosis must remain for the while in abeyance. The Wassermann test, when the disease has been diagnosed, might throw further light upon the nature of the swellings.

Vacancies.

Hulme Dispensary, Dale Street, Stretford Road, Manchester.—House Surgeon. Salary £150 per annum, with apartments, attendance, etc. (Applications to Honorary Medical Officer.)

Certifying Factory Surgeon.—The Chief Inspector of Factories recommends the following appointment.—Gargrave (York).

Swanage General Hospital (106 beds).—House Surgeon. Salary £120 per annum, with board, washing, and attendance. (Applications to W. D. Hughes, Secretary.)

Surgeon, Manchester Infirmary.—Salary £175 per annum, with board, salary and duty, and appointment to Honorary Medical Officer. (Applications to W. P. Atkinson, M.R.C.S., L. M.D.)

Sheffield Royal Infirmary.—Surgeon, Assistant—Salary £125 per annum, with board and residence. (Applications to Mr. Frederick Gill, Secretary, H. Norfolk Row, Sheffield.)

Bolton Infirmary, Barrow.—House Medical Officer. Salary £120 per annum, with board and residence in the Infirmary. (Applications to E. Lambey Fisher, M.D., Secretary, Bolton Infirmary.)

Greenfield Infirmary.—Assistant Surgeon. Salary £120 per annum with residence, board and salary. (Applications to the Hon. Secretary.)

Nottingham General Dispensary.—Assistant Resident Surgeon. Salary £150 per annum with apartments, attendance, light, and fuel. (Applications to C. Cheesman, Secretary, 12 Low Pavement, Nottingham.)

West Riding of the County of York: Storthorpe Hall Asylum, Kirkburton, near Huddersfield.—Assistant Medical Officer. Salary £230 per annum, with furnished rooms, board, attendance, and washing. (Applications to the Medical Superintendent.)

Southwark Union, London.—Third Assistant Medical Officer. Salary £120 per annum, with board, lodging, and washing. (Applications to Mr. George Wood, Clerk, Union Offices, Old Kent Street, Blackfriars, S.E.)

Appointments.

Gladstone, George, M.R.S., B.S., London, Curator of the Museum at the Royal Free Hospital.


Mills, C. M., M.R.C.S., L.R.C.P., Honorary Assistant Medical Officer to St. Paul's Hospital for Skin and Genito-Urinary Diseases, Red Lion Square, London.

Nelson, A. W., M.D., Medical Officer, Assistant-Surgeon of the Naval Hospital, Greenwich.


Platt, C. W., M.B., B.S., London, Principal of the New Queen Mary Medical College at Delhi.

Savoyon, W. H., M.R.C.S., L.R.C.P., Medical Officer to the King Edward Memorial Hospital, Ealing.


Births.

Collingsford.—On July 31st, at "Goldcote," Goodurst, Kent, the wife of W. E. Collingsford, M.R.C.S., of a son.

Crawford.—On Sunday, July 31st, at 113 Albany Street, Regent's Park, N.W., Dr. and Mrs. J. C. Craig—a son.

Griggs.—On the 24th inst., atkinson House, New Abbey, Brixton, the wife of Hugh Gillies, M.R.C.P., of a daughter.

Harvey.—On August 1st, at "Brookside," Great Shelford, near Cambridge, the wife of Alfred Price Green, M.R.C.S., L.R.C.P., of a daughter.

Hussey.—On July 28th, at St. Mary's Church, Tynwald Park, St. Peter, Alfred Dunia, M.R.C.S., L.R.C.P., L.D.S., Surgeon and Physician to St. Thomas's Hospital, Down, of a son, to Eliza Beatrice, elder daughter of Frederick Taylor, of Guy's Cliff, Elmbank Road, Clifton, and Delphine S. Scott.

Murphy—Goodlife.—On July 30th, at Corpus Christi Church, Montreal, the wife of Dr. Francis Murphy, L.R.C.P., and E. S. Ed., of St. Paul's Norbury, S.W., to Ada Margaret, youngest daughter of the late W. F. Goodlife, Little House, Bound.

Marriages.

Belfast—Gealrath.—On July 29th, at Holy Trinity, Brompton, Joseph Dudley Be inefficient, M.D. of 60 Wimpole Street, Oxford Street, son of J. Be inefficient, of 71 St. Albans Street, Regent's Park, senior to Elvera Helen, elder daughter of Gustave C. E. Gealrath, Folkestone.

Bromley.—On July 29th, at Colney Heath Church, Herts, Trevor Lawrence Bomford, Capt. Indian Medical Service, eldest son of Capt. George Bomford, M.A., C.M.S., Poole, to Winifred Dora Greene, eldest daughter of Alfred Price Green, M.R.C.S., L.R.C.P., of Tooting Bec, S.W., of Tooting Bec, S.W., of St. Mary's Church, Tynwald Park, St. Peter, Alfred Dunia, M.R.C.S., L.R.C.P., L.D.S., Surgeon and Physician to St. Thomas's Hospital, Down, of a son, to Eliza Beatrice, elder daughter of Frederick Taylor, of Guy's Cliff, Elmbank Road, Clifton, and Delphine S. Scott.

Mrs.—Beach.—On July 30th, at Corpus Christi Church, Montreal, the wife of Joseph Dudley Be inefficient, M.D. of 60 Wimpole Street, Oxford Street, son of J. Be inefficient, of 71 St. Albans Street, Regent's Park, senior to Elvera Helen, elder daughter of Gustave C. E. Gealrath, Folkestone.

Deaths.

Bate.—On July 31st (suddenly, at Christchurch, Hants, Albert Brook Be inefficient, M.R.C.P., fifth son of the late Joseph Be inefficient, of Holdenhurst, Dursley, and 60 Wimpole Street, London, son of John Ross, Q.C., of Toronto, Ontario, and Ada Myers Ward, of 71 St. Albans Street, Regent's Park, senior to Elvera Helen, elder daughter of Gustave C. E. Gealrath, Folkestone.

Mrs.—Beach.—On July 30th, at Corpus Christi Church, Montreal, the wife of Joseph Dudley Be inefficient, M.D. of 60 Wimpole Street, Oxford Street, son of J. Be inefficient, of 71 St. Albans Street, Regent's Park, senior to Elvera Helen, elder daughter of Gustave C. E. Gealrath, Folkestone.

HULME DISPENSARY.

Dale Street, Stretford Road, Manchester.

WANTED A HOUSE SURGEON duly registered and fully qualified. Salary £150 per annum. Annual increase £10 to £20. Address, with examples, to once to Honorary Medical Secretary.

HUMBLE DISPENSARY.
Since the day of our last issue—seven brief days ago—history has been made at an unprecedented pace. At that time war had already been declared amongst four of the largest and several smaller Continental powers. For the protection of the honour and safety of the British empire and her friends our government declared war against Germany at 12.15 a.m. on the morning of Wednesday, the 5th August. That declaration has been followed by prompt and decisive action. The British army and navy have been mobilised; £100,000,000 was voted unanimously by Parliament; Lord Kitchener was appointed Secretary of State for War, and his request for 500,000 additional men in the army granted; portions of the country have been placed under martial law, and it has been resolved to send out an expeditionary force to the Continent. As might well be imagined, a warlike movement of this magnitude must shake the social structure more or less to its foundations. So far the nation has responded to the test with that cheerfulness and steady confidence which characterise the insular character in time of stress, and in this instance, stand recorded for ever in the vast rush of our countrymen of all ranks to join the colours and fight for King and country.

Is the Emperor William Sane? The fact that it should be possible for any single human being to hold at his mercy the lives and fortunes of many millions of his fellow-creatures in itself presents a standing satire upon the collective wisdom of the peoples of Europe. As to the Emperor himself his conduct has for many years past been that of a versatile, arrogant and eccentric man—obsessed by an exaggerated view of his own powers and his place in creation. His recent acts are of such a nature as to suggest that he has lost the higher mental control that constitutes sanity. To challenge Russia alone was to engage in a formidable task, but what can we think of the mental condition that has prompted him in addition to attack France and Belgium, to defy and to force the British nation into war, to say nothing of various other provocative acts in connection with the Triple Alliance. The picture of this one man engaging half Europe in mortal combat suggests the grandiose delusions and conduct of a man who in private life would probably be called upon to undergo a careful scrutiny of his mental condition.

So far as the medical profession is concerned the immediate effects of the war have been already profound and far-reaching. Under the army organisation methods of Lord Haldane a large number of medical men are liable to service in the Territorial Force, and many of them have been already called upon to join, while others may be ordered away at any moment. Many men on the staffs of the hospitals—both honorary and resident—have left for active service, and not a few of the huge general hospitals are left without adequate medical service, and in some instances patients have been sent back to their own homes so as to relieve the pressure upon the wards. Nurses have also been requisitioned, and as the war is on a large scale the extent and gravity of which is impossible to foretell, the property upon the medical profession in the United Kingdom is likely to continue for a long time. Not only is there an absolute shortage at the present moment in all classes of public and private medical practice, but the war is absorbing all the floating margin of qualified practitioners available, as well as senior medical students who are invited to join the Army and Navy as dressers. A large number of commissions—military and naval—are offered to medical men under 40 years of age.

The financial aspects of the war naturally present a serious problem. The credit system which governs the ordinary business transactions of the community is subjected to a severe strain by the disturbances consequent upon our International war. It is probable that our great grandchildren will have to stand the burden which is now forcibly thrust upon the present generation. It seems not unlikely that a great deal of loss will be inflicted upon the medical profession, both by reason of the service which they will in many instances loyally render to the State and, indirectly, by the lessened capacity for payment of fees by the community. The issue of one pound Bank of England notes is one of various precautions taken by Government to relieve financial tension. It is interesting to note that in the Napoleonic wars which culminated at Waterloo a century ago, notes were issued of the face value of one guinea, a sum that still survives in the customary fee of the physicians of our own day.

The Free Death Certificate. A coroner's jury at Sheffield recently put on record its views as to the probability upon medical men charging for a death certificate. Some interesting points were raised in the course of the inquiry. The inquest was held because of the vague nature of the statement as to
cause of death, which was returned as "syncope." The document thus filled in was accepted by the Registrar upon learning that deceased, a panel patient, had been under medical treatment for two weeks before death. The coroner's attention was drawn to the fact that, to the unsatisfactory nature of the medical attendance, an inquest was held, and it was shown by post-mortem evidence that deceased was in a late stage of Bright's disease. The coroner pointed out the unsatisfactory nature of the death certificate, as syncope or heart failure meant little or nothing in that connection. The medical man said that deceased lived in a single room with his wife, who was away at work all day. Deceased was in an indescribably dirty state, and never had his clothes off from the commencement of his illness to the day of his death. He urged deceased to go into the infirmary, where he could get proper nursing and attention, but his advice was not taken. Under these circumstances the calmness as the want of medical attention were practically dismissed by the coroner. As to the charge of one shilling for the death certificate, the person who paid it expressed his surprise that a fee of the kind was asked from a panel patient. Needless to say, the local coroner attests that he is to grant a death certificate without fee. A medical man has no right to demand it as a right, although there is nothing to prevent him asking for and accepting a fee for the service in question. It certainly is not usual to charge for a death certificate from persons in such a state of poverty as deceased.

A courageous Inquest.

The most striking point raised in the inquest is the fact that the coroner held it because the return of the cause of death was vague and unsatisfactory. His action we approve, as it seems tolerably clear that without some system of critical control of the kind it would be impossible for him to discharge his function of inquiry into unnatural deaths. In doing so, however, he has shown considerable courage, for the average coroner errs in the opposite direction, and holds as few inquests as possible. In that course he is prompted, naturally enough, according to his temperament and special environment, by considerations of a personal nature, and by the constant pressure he is under to save the ratepayer. There is much too, I think, of the kindliness of the practice of paying coroners pro rata with the number of inquests actually held—that is to say, from the point of view of public safety. Another fact of vital importance to the community is the acceptance by the local Registrar of a certificate of death filled in with so worthless a primary cause of death as syncope. It is obvious that such a certificate would cover murder, abortion, suicide, and a variety of other violent and unnatural deaths. It is high time that local Registrars were duly informed of the precise nature of their duties, and were kept to a proper standard of administration by a local coronet or some authority at Somerset House. Under present conditions the Registrars are innocent, but none the less powerful, friends and confederates to a whole host of quacks, charlatans and evil-doers of various kinds. In the particular inquest under notice it is clear that the acceptance of such a certificate as that challenged by the coroner provided a loophole for more than one kind of criminal or otherwise unnatural death.

Dr. Arthur James Milne, M.B., B.S., Aberd., has been appointed Assistant Medical Officer of Health for Johannesburg at a salary of £250 per annum, with an allowance of £15 per month towards the upkeep of a motor car.

LEADING ARTICLES.

LEADING ARTICLES.

THE MEDICAL PROFESSION AND THE WAR.

Another "page of the great book of war," happily closed to our ken for the last fourteen years, has been ruthlessly disclosed to view. It is scarcely more than a week ago that many members of the medical profession were quietly discussing in congress some of the problems incidental to their daily practice. Now all is changed, for the call to arms has resounded through the length and breadth of the land. Things have moved with such startling rapidity during the past week that large numbers of medical men have relinquished their ordinary work and taken up active service with the Forces to place their skill at the disposal of the sick and wounded. Many civilian practitioners and senior students have likewise offered their services, and to the credit of the rank and file of the profession be it said that every name upon the Medical Register stands for a personality that is willing to efface its own feelings and desires in responding to humanity's cry for help. Being prepared for emergencies at all times, the medical man who obeys the call to service is taken by surprise, less, perhaps, than any other member of the community, not even excepting the soldier. In one sense it cannot be called a surprise at all, for it matters comparatively little whether the patient be lying upon a stretcher, or prone upon the battle-field, or in a comfortable bed. The surgeon with the Forces is simply carrying on his ordinary life work, that of relieving pain and suffering, under different surroundings to those to which he is usually accustomed. This is neither the time nor the place to magnify the office of the medical man, but it may be mentioned as one further instance of his readiness to work without fee or reward that the practitioners upon the London panel have agreed to provide free treatment for the dependents of reservists who have been called upon to serve their King and country in this time of need. It is impossible yet to tell how great the demand may be for medical assistance, both at the front and also in the base hospitals, so that the likelihood of a further depletion in our ranks at home has to be faced. One suggestion has been made in view of the present emergency which seems to be quite practicable—namely, that all candidates who have recently failed in their final examination for medical degrees or diplomas should be re-examined at once in their weakest subjects, and, if they pass, be allowed to receive their qualifications; and also that all those candidates who failed by narrow margins, and who are anxious for active service, should be let through at once. All delay is dangerous in war, and no stone should be left unturned for a moment whereby the efficiency of the medical service may be increased. Past experience in warfare has demonstrated the importance of forethought and attention to detail in the matter of organisation and equipment. The medical apparatus of war, if more costly than
CURRENT TOPICS.

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War and the Social Sense.

Socrates once said that man was a generous animal. So he usually is—under compulsion. Our tendency seems to be that of units which have got together somehow and have then developed a psychic centrifugality. Each man tries to escape from the influence of his fellows as much as he can. The aim of everybody is "to live his own life," and the only established convention is unconventionality. It is true that the powers in being assault us in assembled abstracts and overwhelm us in outrages of classification pro forma, but the very might of their insipid coercion is the measure of our innate opposition. Our lives announce that we are individual with the universal corollary of injusticability. In these countries we have been learning to disrespect the law per se, and our ambi-

that of half a century ago, has the advantage of being more portable; and, further, the sick and wounded will benefit as a result of the practical application of recent scientific discoveries in medicine and surgery. It has been urged, and rightly so, that every man in the services who has not already submitted to anti-typhoid inoculation should be so protected at once, for there can be no doubt as to its power of producing immunity against one of the greatest scourges of armies in the field. Turning our attention once more to home matters, it is feared in many districts, owing to the shortage of medical men which will, necessarily, be experienced, that the poor will suffer in consequence. A little readjustment all round of medical appointments, together with the unsellish co-operation of local practitioners, will, no doubt, readily combine to render the present changed conditions easier to bear, and to smooth the lot of the sufferers at our own doors. Most, if not all, of the hospitals are fully alive to the exigencies of the situation, and are prepared to receive soldiers and sailors, wounded or invalided from active service, during the war. Many other buildings have also, we understand, been placed at the disposal of the Government or of the British Red Cross Society for a similar purpose. Ours is, we believe, a righteous cause, and justice is the rightful sovereign of the world. In the meantime our readers will wish God-speed to all medical men and nurses who have nobly placed their services at their country's disposal in the sacred cause of humanity. God Save the King!

HORMONES AND THEIR PHYSIOLOGICAL BEARINGS.

The discovery of those curious and interesting bodies, the hormones, has had much the same disturbing influence on current theories of organic life as that of radium on our conceptions of the physical constitution of the universe. Hormones, be it remarked, have been defined as "substances in solution which, conveyed from one organ to another through any of the liquid media of the body, effect a correlation between the activity of the organ of origin and the organ on which they exert their specific effect." The hormones, however, are bodies which are most satisfactorily observed in their effects, and one of the best known is secretin and its immediate predecessor pre-secretin. It was observed that the introduction of dilute hydrochloric acid into the digestive canal was followed by a remarkable increase of the secretion of pancreatic juice. Subsequently, Starling ascertained that this was not due to an "acid reflex," as suggested by Pavlov, but to the action of the acid on a previously unknown body to which the name secretin was applied. Secretin, as produced, is conveyed by the blood to the other digestive organs, in which it sets going certain functions. Now secretin is produced, apparently, when the acid contents of the stomach come into contact with the pylorus and duodenal walls; consequently, when the acid is deficient, the supply of secretin falls off, and the subsequent steps in digestion, lacking their normal stimulus, are imperfectly performed. This explains many previously obscure points in the rhythm of the organic functions. It was supposed, for instance, that the administration of hydrochloric acid, and substances such as meat extractives which excite the secretion of hydrochloric acid, assisted digestion merely by providing the acid medium required for pepsin to produce its maximum effects, but these data show that the influence of the acid is more far-reaching than this, since it not only regulates the propulsion of the gastric contents into the duodenum, but also unlashes the internal secretions which set the rest of the digestive machinery in movement. This fact is interesting in view of some observations made by Beveridge, of New York, in respect of the action of lactic bacilli on the production of secretin. Apart from a deficiency of acid the other causes interfering with the normal production of secretin are intestinal putrefaction, ulcer of the duodenum or pylorus, and any lesions involving the mucosa of the duodenum and upper part of the small intestine. It would seem, therefore, that the good effects which follow the lactic ferment treatment are due not only to the fact that it inhibits intestinal putrefaction, but in part also to acid stimulation of secretin production by the lactic acid, which is a normal product of these ferments—a sequence of events which opens up a wide field for observation. This suggests a fresh departure in functional therapy, for it seems probable that in the near future, instead of endeavouring to supply the particular ferment which we imagine to be lacking, we shall aim at isolating and utilising the soluble principles which unlock that particular function. It is by no means unlikely that the therapeutic effects of some of the ferments which are currently administered are, in part at any rate, due to a subtle influence exerted by them as hormones when absorbed into the blood current. The importance of this discovery is enhanced by the fact that the hormones do not appear to be specific to particular organisms, but are chemical stimuli acting on the particular function, or rather organ, whether in man or animals.
tion has been to live out our life as the light. Now we have changed. The trumpet has done that. The call to keep up our end at Armageddon has woken the social sense. The phenomenon is a psychologically interesting one. It is outside our experience to find the majority of men consciously and disinterestedly working for the common good, where that good clashes with their interests as individuals. That is the way of a man's making congratulation. The rapidity with which we have put away our differences—differences that a few short days ago seemed hopelessly irreconcilable—may make our everyday convictions seem somewhat insincere. That is the superficial view. We may be sincere about a cricket match but we can put away thoughts of rivalry when the moon comes; and so with greater issues. As men of science are citizens of the whole world, we must remember that though patriotism is great, humanity is greater. At this crisis our way is plain. We trust and believe that the interests of patriotism and of humanity are identical. Our way lies straight before us. We must tread it mightily.

The Hygienic Value of Paper.

It is hard to realise, in our advanced state of civilisation, the consequences of being deprived of what has, hitherto, been regarded as one of the necessities of life. The rumours of a shortage in the supply of paper to this country on account of the war causes one to reflect upon paper and paper-making itself. Not until 1858 was the art introduced into England, but it is only within recent times that the possibilities of paper as a material of some hygienic advantages have been recognised. In an interesting paper upon the subject read at the Congress of the Royal Sanitary Institute at Birmingham last month by Dr. S. Ridley, D.Sc., the use of paper is recommended for home articles in daily use which require frequent washing. It is suggested that such moveables as plates, cups, and even dustbins, should be made of paper and destroyed when soiled. The use of paper handkerchiefs has been advocated for consumptives for some time, and the paper serviette has come to stay. The ordinary housewife, we fear, would think twice before being beguiled into substituting paper blinds, curtains, table-covers, and towels in place of ordinary linen goods, sanctioned by custom and tradition. They might obviate danger of infection, being rendered non-inflammable they would be highly dangerous. The use of paper disinfesting bags containing formaldehyde, for dealing with infected clothes, etc., described by Dr. Munson, appears to solve some of the problems of domestic infection, whilst these receptacles are of service as emergency disinfectors for army use. If paper-kag cookey is not always practicable, there must be several ways in which the more extended use of paper should appeal to medical men and sanitarians on hygienic grounds.

Back to the Brand.

The Medical Officer points out that in some ways our ancient communities are merely copying unconsciously their forgotten ancestors. The idea of placing a distinctive sign on the dwellings of those suffering from an infectious disease has existed from time immemorial. The Jews of old did it, and in our own country, when the great epidemics of the black death and the plague swooped down, people were put to flight or were compulsionarily put on the doors of every stricken house. America has just learnt of the scheme and is adopting it with a touching and whole-hearted enthusiasm. Every State in the Union but nine has legalised "placarding." The circumstances of its use are vague and local, as is the exact manner of its issue and the principle is there. Is it a red and white placard or a yellow flag? No matter, the notice to all whom it may concern is branded on the building, and must not be removed till the sanitary authorities have poured their first libation to Lister. In some districts where the passion for information outweighs the citizen's fear of infection he may be the kind of infection he is to keep away from by the colour of the housing. But that is luxury. The fact remains that the United States have revived an old custom and have found it extremely valuable. In England the system is adopted only by a few districts, and we are not aware that it has been of any great benefit to those concerned. Still it is interesting to see a people which prides itself on its up-to-dateness enthusiastically resurrecting an old custom long given up by the generality of its originators.

Maternity and Child Welfare.

Much attention has been paid of late years to infant welfare work, both by local authorities and also by various private agencies. Hitherto the efforts of these bodies have been largely concerned with the child in the first year of its life, but there is no reason, of course, why their scope should not be considerably extended so as to embrace the whole period from before birth until the time when the child is entered upon self, si, and other happiness. The Local Government Board has recently issued a circular to county councils and sanitary authorities with regard to an estimate that has been laid before Parliament for a grant to be distributed by the Board in aid of the expenditure of local authorities in securing agencies in respect of institutions or other provision for maternity and child welfare. It is pointed out that more extended and systematic efforts are needed to deal with this matter, and that it is desirable to arrange for medical advice and, where necessary, treatment for expectant mothers and mothers after the child is born. In an accompanying memorandum it is suggested that a complete scheme should comprise certain elements each of which may be organised with special reference to infantile welfare. These include arrangements for the local supervision of midwives, an ante-natal and infant welfare hospital, or at least an ante-natal hospital, an infant nursery, and an accommodation for expectant mothers, a maternity hospital or beds at a hospital, in which complicated cases of pregnancy can receive treatment, in addition to such assistance as may be needed to ensure the mother having skilled and prompt attendance during confinement at home, or to send her to a suitable hospital. Finally, it is stated that provision should be made for the treatment of complications arising after parturition, for systematic advice and treatment of babies at a special clinic, and for the systematic home visitation of infants. The Board is willing to consider applications for grants in respect of any work falling within the scope of the above memorandum and it expresses its willingness to assist local authorities in the initiation of schemes or the extension of existing ones.

Smoking.

We die daily. Apparently the process is largely suicidal. We are always doing things we ought not to do, and we have forgotten are doing them for our own benefit. We eat, drink, and poison ourselves through our colon; drink, and line our arteries with lime; and are merry, with the most disastrous psychological results. And, of course, we smoke. We were always told it was bad for us. That is probably
why we ever wanted to do it. We are still being
told it is bad for us. Not in the simple downright
terms of our youth, but now it is the "lambent
pupillage of slow, low dry chat" that encourages
conviction. J. Pawinski has contributed a com-
prehensive study of the effects of tobacco on the
lung and bronchial tubes. He has shown that
the smoking of tobacco, whether to a moderate or
excessive extent, is injurious to health. In the
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M.B., B.C.
Cantab., F.R.C.S.Eng., has been appointed Hon.
Ophthalmic Surgeon to the Bristol Royal
Infirmary.
Mr. Edward Hugh Edwards Stack, M.B., B.C.
has been appointed Medical Superintendent of the
State Institution for Mental Defectives at Moss Side, Liverpool.
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Infirmary.
A young woman who has not menstruated for some time is seized with severe pain in the abdomen, turns pale, becomes faint, or even faints outright, and has a small, rapid pulse. If on exploring the abdomen we detect ill-defined resistance just above the pubes, and, on vaginal examination, a lax or uteri with an enlarged uterus, we can have little hesitation in making a diagnosis of uterine cancer. We are dealing with a case of ruptured tubal gestation accompanied by internal hemorrhage, calling for immediate surgical intervention.

Similarly, when a patient has been vomiting blood for some time, not in any great amount, but frequently repeated in spite of treatment, and recurring as soon as a return is made to ordinary food, reducing the patient to a state of extreme prostration, neither the physician nor the family have any hesitation. Anything rather than death from hunger.

Gastro-enterostomy, with or without resection of a gastric ulcer, is plainly indicated and commands assent.

Strangulated hernia comes into this self-same category. That is to say, the group of affections which call for instant surgical intervention.

But supposing we are dealing with a patient—1 mean a private patient, because the question virtually only arises in private practice—who presents a small ulcer of the tongue, say, the size of a bean, presenting the classical features of epiphelitis, viz., irregular margination and a greyish lustre covered with increasing debris, it is our duty to advise a radical operation, possibly accompanied by excision of the cervical glands, in fact, very extensive mutilation of the mouth and one or two big incisions in the neck. We shall have the greatest difficulty in getting the patient and his friends to act on our advice.

This is the sort of case which I propose to discuss, cases in which there appears to be a striking disproportion between the visible lesion and the gravity of the operation proposed for its removal. To begin with, the practitioner must be absolutely sure in his own mind that his diagnosis is sound and his prognosis correct. Then, too, it is well for the practitioner to imagine himself in the patient’s skin, so to speak; he must ask himself whether, under the circumstances, he would consent to undergo the operation he is advising. He need not feel hurt should his counsel be rejected, since, if he be sure of himself, he has only to wait patiently for the future to establish the correctness of his attitude. If he does not feel quite sure of himself, then no doubt he is justified in feeling uneasy, because the subsequent course of events may not bear him out. He must be sure of himself, because, should the operation not yield the hoped-for result, or should the patient fall victim to some operative incident, it is nearly always on the practitioner that the blame falls rather than on the surgeon.

Naturally, brought face to face with the prospect of a grave operation, the patient and her friends are but too likely to look round for a loophole of escape. Might they not try such and such a treatment first, seeing that it answered very well in the case of an acquaintance “suffering in the same way,” or the quasi-miraculous serum of which they have read so much in the papers. The well-advised practitioner will no shrug his shoulders and abruptly refuse to discuss these alternative methods. He must try and explain to persons, for the most part ignorant of medical matters, that in this particular instance the treatments they suggest cannot, and will not, answer his purpose, and in simple language he must do his best to explain why this is the case. If he himself is sure of his ground he can generally convince them of the necessity for the operation.

But let me refer to a few instances of cases calling for these grave decisions. A man between 40 and 50 years of age is seized with violent pain during the night in one eye; the pain radiates round about the orbit, in the forehead, over the corresponding half of the head, and soon becomes absolutely intolerable, while pari passu vision becomes dim. The conjunctiva is red, injected and edematous, the pupil dilated and sluggish, the iris dull, and the globe, on palpation, feels of wooden hardness. Obviously it is a case of glaucoma, and only prompt iridectomy can save the eye.

The patient is ready to consent to anything, so acute is the pain, but the family is often difficult to persuade, though, when given to understand that sight itself is threatened, they reluctantly acquiesce.

Mastoiditis is another condition in which grave decisions may have to be taken. Glaucoma menaces sight, but mastoiditis threatens life itself. A girl ten years of age has had running at the ear since an attack of typhoid fever at 6. There has been no pain to speak of until about a week ago, when she began to complain of tenderness behind the external auditory meatus coinciding with sudden arrest of the discharge. The pain tends to become worse and it radiates all over that side of the head, preventing sleep. Three days ago some swelling was first noticed behind the ear, the temperature goes up at night, and the little patient complains of feeling feverish.

When we examine the mastoid region it is seen to be red and somewhat swollen. The ear stands out rather more than usual, but the retro-auricular furrow is intact. Pressure on the mastoid prominence causes sharp pain. Evidently there is deeply-seated mastoid suppuration, and it must be opened up. Here we have only to point out that, if unchecked, it will go on to abscess of the brain, culminating in meningitis. Very seldom will the friends assume the responsibility of refusing an intervention.

The territory of the abdomen opens up a wide field to these disagreeable surprises. Chronic appendicitis, with its insidious onset, is the bane of this genus. The patient has been losing weight, he has become apathetic and displays a tendency to neurasthenia, his complexion is dull, earthy, his liver is somewhat enlarged and his conjunctiva are yellowish, the tongue is dirty and his appetite is poor. Of course, the patient and his friends only
too readily attribute these symptoms to overwork, to the need of a change of air, to "worry," but the practitioner, who finds nothing to account for the loss of flesh in the lungs, heart, or to the patient's antecedents, turns to the abdomen. Might it conceivably be a case of chronic appendicitis? The patient is quite certain that he has never had any pain in the right flank fossa associated with nausea or sickness. But pressure over MacBurney's point reveals some muscular rigidity; there is some tenderness to deep palpation. Stoop of the body is there chronic appendicitis. We have only to wait a while, visiting the patient at odd times, and if then we discover that there is still tenderness over the appendix and nowhere else, we may rely upon it that he is suffering from chronic appendicitis.

Now, just imagine the attitude of the family; they have asked you in just to advise as to diet in the case of a child whose stomach is upset. Instead of drawing up a dietary, you advise opening the abdomen. No wonder they protest! It will take a lot of explaining, especially as you are not in a position to assert that the danger is immediate, certain and inexorable. Still, it is your duty to insist.

While we are talking abdomen, there is another affection of an insidious type that deserves attention viz., chronic intestinal obstruction. The subject is generally one past middle life. He has been troubled for some time past with constipation, alternating with occasional attacks of diarrhea. The belly is distended and rather tender. At the present time there is no passage at all, and when he passed a little flatus, the pulse is rapid, but firm; the face is pale but not drawn. He has been sick once or twice, bringing up glairy or mucous vomit. He has been taking enemata and purgatives supplied by the local chemist, but all in vain. They are not positively anxious, but they recognise that the bowels must be cleansed to work, and so you are called in. But when, your examination over, you gravely suggest opening the abdomen as the only means of rescuing the patient from the jaws of death, when you invite them to choose between laparotomy, artificial anus, and enterostomy, well, it is for them a bolt from the blue. Your difficulty is increased by the fact that you yourself are in a position to be dogmatic. You do not know, and therefore cannot state, the exact nature of the obstruction nor the probable result of the intervention, apart from the mere relief of the obstruction. You are obliged to admit your uncertainty, but, all the same, you must insist on an operation.

The too, salpingitis; this, too, is a disease the only remedy for which causes many a woman much and dolorous surprise. I am, of course, not referring to the sudden, acute forms of salpingitis which, so to speak, throw the patient upon the operating table, but the slow, insidious forms which undermine the health, which render the sufferer a hopeless invalid subject to persistent discomfort, with intermissions, a condition which keeps her in bed, unable to walk or go up stairs, or, it may be, without serious abdominal pain. The patient loses flesh, menstruation is irregular and painful, digestion is upset, and her temper becomes uncertain and irritable. She longs on in hope that rest, injections and counter-irritation will get the better of her state, but you, the practitioner, know well enough that it is vain to pretend to get anything of the kind. Your knowledge tells you that there is a thickened cord, in all probability containing pus, which can only be got rid of in one way. You can detect its presence by digital exploration, and it is your duty to advise its removal. In nine cases out of ten you will meet with considerable resistance, but you must overcome it if your patient is not to fall a victim to neurasthenia and progressive organic depreciation, with the tomb as its goal.

But it is in certain forms of incipient cancer that the operation becomes of extreme urgency, and the operation must be severe to afford any reasonable prospect of durable success. In spite of recent discoveries, in spite of X-rays and radium, our duty is to advise a radical operation forthwith. Only too naturally the patient hesitates at the prospect of a severe, mutilating operation, but your duty admits of no compromise; it is all or nothing. You must not shrink from your duty; you must be frank, and, if necessary, brutal, for in your hands lies the patient's only hope of safety.

Unfortunately, there are certain forms of cancer in which, from no fault of the patient's, you come too late on the scene to be able to use your persuasive powers to advantage. Cancer of the uterine cervix, for instance, is not painful in its early stages, and by the time the symptoms command attention it may be too late.

It would be easy to prolong the list, but these few examples would show what responsibilities we are called upon to assume in the exercise of our profession. These grave decisions, in face of sometimes apparently trivial lesions, are not the least of the difficulties with which you will be confronted, and on your decision and firmness depend not only your own reputation, but the future of the patient.

Note.—A Clinical Lecture by a well-known teacher appears in each number of this Journal. The lecture for next week will be by Arthur E. Giles, M.D., B.Sc., F.R.C.S., Surgeon to the Chelsea Hospital for Women; Gynecologist to the Prince of Wales Hospital, Tottenham. Subject: "Diagnostic Aphorisms in Gynecology."

THE TREATMENT OF INOPERABLE CARCINOMA OF THE UTERUS BY APPLICATION OF HEAT. (a)

By J. F. PERCY, M.D.,
Galesburg, Illinois, U.S.A.

At the present time the treatment of cancer may be easily differentiated into two classes. The first of these is the operable, which applies almost wholly to early manifestations of the disease; and the second, the inoperable, which concerns us most at this time.

Inoperable carcinoma may be attacked through attempts to destroy the possible cause, by vaccines, toxins, serums, etc.; again, by attempts to change the pabulum by which the disease is permitted to progress, such as may be suggested by the theory advanced by Ehrlich, under the name of atrophemia. From the standpoint of the experimental laboratory, the above theories and the work based upon them widen our mental horizon, and stimulate our imagination regarding the whole field of cancer research; but we cannot apply them now, because their value is yet undetermined, and the particular pabulum, or food stuff, which Ehrlich presumes for growth, is not fully understood.

We do know, however, that the cancer cells can be destroyed by the same agents that will destroy

forms, the toxins of Coley and the vaccine of Otto Schmidt. The experiments of Bier (6) show that the intravenous injection of foreign defibrinated blood raises the body temperature, and this is true also of the use, in the same way, of colloids of gold, silver and copper. The observation of the older physicians, who noted the disappearance of malignant activity following infection by erysipelas, claims our interest in a new way. Pierre Delbert has confirmed the experiments of Vidal on the deleterious action of increased body temperature in mice.

Reduced to the simplest statement, our problem in inoperable cancer has always been two-fold: first, to get rid of the gross mass; second, to destroy the progressive metastases. The second point usually loses much of its significance in the overshadowing presence of the primary great mass. If what Vidal and others tell us is true, it is a rational procedure to attack these morbid masses with the aid of the method tending to raise the temperature of the whole body above 40 deg. C. (104 deg. F.) is impracticable, because dangerous. In addition, it is uncertain, and we cannot regulate it. We are compelled, then, to find some method more local in its application which will exert the greatest destructive process on the gross mass of cancer and that will produce at a minimum degree the normal connective tissue cells.

The only agents so far found worthy of consideration are hot air, hot water, steam, electro-coagulation, fulguration and actual cautery. Hot water, hot air and steam are shown by Doven to be of no practical value, because of their slight penetration. Electro-coagulation by its tissue effects will not produce anything of the kind of 5 to 8 cm. in two minutes. The rapidity of action, the difficulty of control of the electrode—the complicated apparatus necessarily, together with the refinement of technic and specialised judgment required of the operator, make this method impracticable in the treatment of the cavity carcinoma. The angi-Hart method of fulguration (7), i.e., the sparking from a high frequency current of high tension, after the surgical removal of the bulk of the mass, especially when superficial, is worthy of notice in this connection. In the hands of the originator, by preventing relapses, it has undoubtedly improved the statistics of operative methods in advanced cancer. In our own cases, however, such methods have been employed. Durig (8) and Grau, however, insist that the only beneficial result from fulguration is due alone to the heat, and not to any specific action on the tissue cells. It is only just to the originator of this method of using high frequency currents to state that he denies that this is the mode of action in his method. He insists that where heat is obtained in this way, it is due to the reduction in the length of the spark, replacing the tension by thermic effects, which is a mistaken use of fulguration.

The methods just enumerated, in the hands of their originators, have added much to our knowledge of cancer therapy. But the cases cannot be considered extirpation. The method is extensive, complicated and expensive. In addition, to be effective, it demands not only specialised knowledge, but a refinement of judgment that requires more than the average experience.

In the way of comparison, it has been my pleasure to suggest a practical method of applying heat which has none of the objections that can, with reason, be urged against the methods already enumerated. (a) The penetration of heat by this method can be definite, although perhaps crudely,
determined and regulated. Where the malignant process is at all accessible, this method has almost no limitations. The so-called apparatus is not only portable, but also inexpensive. I refer to the development of heat through a most efficient electric heating iron, which can be perfectly regulated by means of a rheostat, when applied to the involved tissue. With this electric heating iron and my water-cooled speculum, and the vaginal probe, maximum heat is obtained in the involved structures. More than this, the low degree of heat which my experiments show to be more effective than the intense heat already mentioned, can be maintained accurately. This low degree of heat does not burn up the cancerous mass, but merely makes it so hot that the hand of the surgeon, encased in a medium weight rubber glove, can hold it. When this degree of heat is reached and maintained for from ten to twenty minutes, the cancer cells are absolutely killed, while the normal tissue cells are not injured. The important thing is not to convert the pathohlogy into charcoal. The charcoal, or carbon, thus formed inhibits the further dissemination of the cancerous cells, but not beyond. More than this, when the pathology is converted into charcoal, drainage is prevented for a number of days. This permits of the absorption of a larger quantity of broken down cancer cells than the average of these patients can tolerate; and many of them die as a result of this mistaken method of applying heat. Carbonisation is produced by a cauterised point heated to a bright cherry red colour. Carbon inhibits the dissemination of heat. To overcome this, still greater degrees of heat are required, which are extremely difficult to control, endangering the rectum, the bladder and the ureters. In another publication (10) I have given the details of some experimental work which well illustrates the practical importance of this very important factor. The heating iron, when used through the water-cooled speculum, should not be hot enough to sear a pledge of white cotton, if laid on the heating iron even for half an hour. No smoke, no smell of burning tissues should issue from the speculum, as would occur if they were being destroyed. The external uterine wall should hear only a gentle simmer or bubbling, while the heating head is in the diseased mass.

My experimental work, and the operation itself, demonstrate that when this "cold iron" is applied to the affected tissues, not only is there much less destruction of normal cells, but a far greater dissemination of heat, sufficient to kill carcinoma. Cancer is destroyed when the temperature in the mass is raised to 50 deg. C.—55.5 deg. C. (122 deg. F.—131.9 deg. F.); while the vitality of normal tissues is not changed until the temperature exceeds 55 deg. C. to 60 deg. C. (131 deg. F. to 140 deg. F.). The basic idea, then, of this treatment—and this cannot be too often emphasised—is the production of a greater dissemination of heat in the gross primary mass of cancer. There is no other method, or technique, familiar to me that will influence in a destructive way so great an area of malignant tissue, with a minimum amount of harm to the uninvolved structures. This technique, in a tremendously effective way, destroys the primary malignant focus. With this accomplishment the newer methods—especially the X-ray—that have been shown to be of supreme value in the destruction of the small isolated foci, in or just outside of the pelvis, make a combination of effort in the management of these otherwise hopeless cases, most promising in its possibilities. From my experience, I am convinced that it is not always best to attempt to destroy, at one sitting, a large mass of carcinoma. These patients are rarely in the condition which invites local anaesthesia. The application of the heat, to a degree which devitalises the major part of the exuberant over-growth, and rids the patient of her local focus of mixed infection, produces within two weeks a surprisingly beneficial result. This is especially noticeable if cachexia has not been a marked symptom. A second, or even third application of heat is not only safer, unless the involved structures are small, but it gives the operator a much better opportunity to reach, finally, the outermost confines of the disease.

When my technique in the application of heat in these cases is decided upon, I would strongly advise against the use of the curette, or other operative measures, for the reason that the heat is distributed through the cellulitis of the pathological over-growth, which we wish to destroy. Heat does not encourage the extension of metastases, while the curette and knife do. Again, scar tissue is not formed after the use of the curette, but it is the usual sequel after the application of the heat; and I have yet to observe the redevelopment of cancer in a patient treated by this method. When the surgeon believes that a modern total hysterec tomy should be the operation of choice in the less extensive forms of uterine carcinoma, I know of no more rational procedure than the methods here outlined, which should precede the final operation, at least by three or four weeks. In a personal case, where this treatment was applied to an active, bleeding, vegetative-like mass, springing from the craterous edges of a practically destroyed cervix uteri, no evidence of carcinoma was found on serial section eight months afterwards, when the uterus and cervix were removed through the abdomen.

I shall leave the statistics of my results in the treatment of inoperable carcinoma for a future paper. All that may be said at this time is that I believe that a large number of cases, if not practically hopeless when first presenting themselves for treatment, will give approximately fifty per cent. remaining free from recurrence over five years. In addition, my work along this line convinces me that the limits of benefit to be obtained by the application of heat in inoperable carcinoma have not yet been reached.

I am working out a method by which the amount of heat entering both the pathological and normal tissues can be accurately gauged. With this, the degrees of heat in the tissues at various distances from the heating head can also be determined. This will make it more definite and accurately certain that the required temperature known to destroy cancer is entering the parts involved.

The management of complications, the most serious of which is the prevention of rather late hemorrhages, is a matter of importance. In fifty cases this sequel has followed in two private and in two clinic cases. Only one of these, a private case, has died from the hemorrhage. It will probably prove to be true that the uterine arteries, or, possibly even the internal iliacs, should be tied in every case immediately preceding the treatment by heat.

Mentioning these important problems growing out of the practical application of my method, I do not wish to be understood as minimising the great benefits which this technique has already given to a rather large number of otherwise hopeless cases of inoperable cancer of the cervix and body of the uterus; but rather to express the hope that further improvements which can only be made in the use of heat in cancer, a wider and wider application of this extremely valuable method may be found.
years and in different epidemics. In Germany peritonitis is less common than in America. Recent figures embracing 9,713 cases collected in England, Canada and the United States show that more than one-third of the deaths from typhoid were due to peritonitis. At Johns Hopkins Hospital there were 43 perfections in 1,500 cases, or 1 in 36. In the Pennsylvania Hospital there were 50 perfections in 1,948 cases, or 1 in 30. In the Royal Victoria Hospital, Montreal, there were 83 intestinal perfections in 2,917 cases, or 1 in 35 and two perfections of the gall-bladder. In the Montreal General Hospital there were 110 perfections in 2,494 cases, or 1 in 22.3 cases. In the Royal Victoria and Montreal General Hospitals it is sometimes quite impossible to admit all the cases of typhoid that apply. Only the more severe cases are taken in. Again, quite a number of cases are admitted after perforation has occurred.

In 15,221 collected cases there were 514 perforations, or about 1 in 31. Statistics show perforation to be more common in men than in women. The reason is not obvious. In children peritonitis is rarer than in adults.

PATHOGENESIS.

Chomel remarks "that the accident is sometimes the result of ulceration, sometimes of a true eschar, and sometimes it is produced by the distension of the intestine, causing the rupture of the tissue weakened by disease." In a specimen in the McGill Museum there are 10 perforations in the ascending colon and sigmoid, probably from distension. I have usually found the perforation near the base of a generally well-defined ulcer. In size it varies from a very small pinpoint hole to an opening the size of a lead pencil. Only rarely is it larger. It is always situated nearly directly opposite the mesenteric attachment.

While it is true that the perforation may occur at any point in the stomach, small or large intestine or in the appendix vermiformis, yet, fortunately for the patient and the surgeon, it is found somewhere in the terminal two feet of the ileum in an overwhelming majority of cases.

PROGNOSIS.

That a typhoid perforation not closed by the surgeon is always a fatal complication is as a rule a true statement. The only exceptions are those in which a perforation of the large bowel occurs between the layers of its mesenteric attachment. When this occurs an abscess develops, extra-peritoneally, and may subsequently be opened. In the single case in my series in which this occurred the fistula gradually healed. It is probable that all cases in which a perforation of the small intestine occurs into the peritoneal cavity prove fatal unless recognised and the opening closed. The duration of life after perforation in 134 cases collected by Fitz was as follows:

| Died on the first day | ... 37.3 per cent. |
| second day | ... 29.3 |
| in the first week | ... 83.4 |
| second week | ... 9 cases. |
| third week | ... 4 |
| in thirty days | ... 1 case. |
| thirty-eight days | ... 1 |

DIAGNOSIS.

It is easy to establish the fact that a considerable percentage of the mortality in typhoid is
due to perforation of the intestine, and also that a goodly number of these cases may be saved by early recognition of the lesion and its closure. The great difficulty is the diagnosis. To get the best results the accident must be recognised early and appropriate treatment be instituted promptly. Here is the great difficulty, the question of early diagnosis. Some of our standard text-books are misleading in their remarks on the diagnosis of typhoid perforation. If it will not be considered too presumptuous for a Colonial to criticise writers in the great educational centres of Great Britain, I would like to say that when a recent edition of Choyce's "Surgery" says that the symptoms that suggest perforation are the sudden onset of acute pain referred to the umbilicus or to the right lower half of the abdomen, with tenderness on pressure and muscular rigidity, most marked in the right lower quadrant of the abdomen, and that there is nausea and vomiting and other symptoms of acute infection, and when Howard in his "Practice of Surgery," issued this year, says the symptoms of typhoid perforation are sudden acute abdominal pain with collapse and fall in the temperature they fail to appreciate the difficulties that surround the question of the diagnosis of typhoid perforation. The occurrence of perforation is but seldom indicated by such well-marked, striking symptoms. Furthermore, a fatal peritonitis may develop in typhoid without any perforation discoverable at autopsy, as reported in the Munich autopsies and in various medical journals.

The first indication that a perforation has occurred is usually pain. It was present in 75 per cent. of this series of 83 cases and absent in 25 per cent. 75 per cent. of them had either sudden crampy pain or sudden persistent pain in the following regions mentioned in order of frequency: generalised, right lower quadrant, umbilical zone, left lower quadrant, epigastrium, and left hypochondrium. In 25 per cent. of these cases the pain was generalised or in the right or left lower quadrants. Often the pain will not be severe enough to impress upon the nurse the need of sending for the doctor unless she has been specially trained in a typhoid ward. An important point in the training of a typhoid nurse is to teach her to send for the intern whenever a typhoid patient complains of abdominal pain.

In 25 per cent. of cases not having pain at onset, the following conditions were found:—

In 11 per cent. toxemia obscured all signs.

4 per cent. the condition was obscured by severe concurrent hemorrhage.

4 per cent. were not diagnosed.

1 per cent. had chills.

2 per cent. had rigidity.

4 per cent. had vomiting.

In regard to time, 62 per cent. occurred at night and 38 per cent. in the daytime. 4 per cent. of the cases had definite profuse sweats immediately after the perforation.

The symptom that I would place second because of its constancy and significance is change of expression. The change of appearance in a majority of the cases was quite evident. 65 per cent. showed a very definite alteration, 28 per cent. a gradual change, and 7 per cent. no change. This change in appearance was manifested in a picture of suffering from pain, a sudden pallor,
Those who have seen many typhoid perforations will appreciate Fitz's statement that perforation of the intestine in typhoid fever may take place without any suggestive symptoms and that suggestive—even so-called characteristic—symptoms may occur without any perforation having taken place.

In the text-book perforations diagnosis is easy, but if we are to save a large percentage of these unfortunate patients we must detect the accident in its most insidious form.

Again, it is not necessarily a reflection on the diagnostic skill and sound judgment when the abdomen is opened after careful consideration of the symptoms present by two or three clinicians and no perforation is found. It would seem that this may happen occasionally if conscientious attempt is made to recognise perforation as soon as it occurs. One case is on record in which the abdomen was opened twice in the same patient without finding any perforation! The same abdomen was later opened a third time, the perforation found and the patient's life saved. We cannot always afford to wait in these cases until the diagnosis is absolutely definite and assured.

What symptoms call for immediate abdominal incision, or, rather, what are the minimum signs that may demand surgical intervention? Pain, persistent; definite change for the worse in the expression of the patient; tenderness either abdominal or rectal; rounding up of the abdomen; and increased resistance to pressure. If these symptoms are present, even if the temperature and pulse are not decidedly altered, nor vomiting present, the likelihood of a perforation is very great.

Local anaesthesia has very materially altered our attitude towards early operations. It is no longer necessary to administer a general anaesthetic. The abdomen can be quite well opened under local anaesthesia without causing the patient any pain whatever. The closing of a typhoid perforation is one of the simplest operations in surgery; one that can quite well be performed by anyone capable of carrying out a perfect surgical technique. A 1 per cent. solution of novocaine with the addition of two drops of adrenalin to the drachm is thoroughly satisfactory and may be used freely. Insert first the skin and subcutaneous tissues, then, with a short needle one inch long, penetrate the deeper muscular layers along the line of incision. Either a gridiron incision or one along the outer border of the right rectus answers admirably. The perforation is nearly always found in the terminal 12 or 24 inches of the ileum. It is very easily found. A couple of through and through sutures usually suffice to close the opening and then one or two rows of fine Lambert suture complete the operation on the intestine. The patient should always look for a second or possibly a third perforation. These are seldom found, but not uncommonly some of the ulcers in the neighbouring portion of the ileum will present a very thin, necrotic-looking base. It is a good practice to infold such with a single row of Lambert sutures as a precaution against further perforation occurring after the abdomen is closed. Resection of an ulcerated portion of intestine in typhoid is rarely indicated, and should be reserved for the skilled operator and unusually threatening cases.

When the abdomen is opened the presence of perforation is generally made clear by the presence of fluid, lymph, or the escape of a little gas. Should none of these evidences be observed, do not close the abdomen without examining at least the terminal two feet of the ileum. It may be that a small pin-head perforation is temporarily closed by a tag of omentum. I have in this condition been in the direst of cases. Of course, such cases give a most favourable prognosis.

The percentage of recoveries is gradually increasing. Von Layden in 1884 suggested that the only rational way of treating perforations of the stomach and intestines was surgical. In the same year Miculicz closed a typhoid perforation. The patient, a man, act. 40, recovered. Fourteen years later, Keen collected 83 cases with a recovery percentage of 19.36. In the Royal Victoria and Montreal General Hospitals, 710 perforations have been closed and 38 have recovered, or 27.14 per cent. These figures include the work of all the surgeons attached to the hospitals. The figures are not large, but I think they represent 38 lives saved. The other cases of perforation were not operated upon for three reasons, chiefly, viz., not diagnosed; desperate conditions that offered no chance of success; and refusal of patients, parents or guardian to allow any operation.

It is sometimes very discouraging, and, of my first six cases died and then I became ready to give up. I succeeded in saving my seventh case and from that time recoveries have occurred more and more frequently. From January, 1909, to June, 1914, I closed 22 typhoid perforations, and 11 recovered, or 50 per cent. An important point is to let the house staff feel that it is a reflection on their professional attainments to overlook a perforation. When once they really appreciate that fact cases are sent to the operating-room promptly.

THE TRANSMISSION OF FOOT AND MOUTH DISEASE TO MAN.

By Prof. E. Boismoreau, M.D.,
Of the Faculty of Medicine of Paris.

[Specially Reported for this Journal.]

It is perhaps not generally recognised that foot and mouth disease in animals is capable of transmission to human beings, and as I have happen to have had special opportunities of witnessing the supervision of the disease in man in the course of a widespread epidemic in animals I think it worth while to place the facts on record.

The epidemic started in 1912, and although certain precautions were enforced it spread far and wide, attaining its maximum intensity in July and August of that year. It was then that I met with cases in my practice and I cannot do better than reproduce my notes:

CASE I.—An infant, act. 15 months, was brought to me in August, 1912, on account of some difficulty in swallowing which led it to refuse food. Methodical inspection revealed nothing of any particular interest beyond a little bronchitis, but the rectal temperature was 105.8°F. Turning my attention to the buccal cavity I noticed at once that the gum, mucous membrane and tongue were the seat of a vesicular eruption, the vesicles being rounded in shape with a pink base. Some of them had ruptured, leaving tiny ulcers the floor of which was yellowish white. The ulcerated surfaces were very tender to the touch, the breath was very offensive, and the mucous membranes...
appeared to be thickened. I counted upwards of thirty of these vesicles. The submaxillary glands were slightly swollen and tender and the urine contained a trace of albumen.

I touched the ulcers with chloride of zinc and administered anti-diphtheritic serum by the mouth. Improvement set in the day after commencing the treatment and recovery ensued in four or five days.

The injection appeared to have been conveyed by milk from cows that had recently been suffering from foot and mouth disease, in spite of the fact, stoutly maintained by the mother, that the child had taken no milk that had not been boiled.

Case 2.—Man, 3t. 35, agricultural labourer, had been attending sick cattle, but had not drunk any milk. Temperature 100.8° F. Complained of headache with pain in the back and limbs. The mouth, dry to begin with, was now running (salivation) and he experienced some difficulty in swallowing. Exploration of the mouth showed a few characteristic vesicles on the tonsils with a little glandular enlargement under the lower jaw. Chlorate of potash internally and locally, was followed by improvement, but a few days later a small abscess formed at the left molar toe, which soon healed. The patient recovered without having been obliged to give up work.

The other cases were all very much the same, so I need not relate them in detail. My observations seem to me to justify the following conclusions:

1. Milk seems to be the vehicle of contagion, and it is evidently dangerous to take cow's milk in times of epidemic, even if the animals are apparently healthy unless it has been well boiled. In my first case, that of the infant, it will be noted that contamination took place before the animals displayed recognizable signs of disease.

2. Milk, however, is evidently not the only means of transmission, for in my second case the patient had not drunk any milk for a long time (French peasants as a rule right shy of milk). He no doubt contracted the disease by handling the cattle and eating his food with unwashed hands, the saliva and pus of sick animals being very contagious.

Symptoms.—The period of incubation would seem to be five or six days. There is a slight rise of temperature with dryness of the mouth followed by salivation and trilling disturbance of digestion. In the course of a few days we get aphthous stomatitis, which may undergo transformation into tonsillitis or aphthous stomatitis. Should the nature of the disease be overlooked or in the absence of adequate treatment, constitutional troubles may supervene a parathyphoid state, renal complications, sub-maxillary adenitis, &c.

It is at this stage that we meet with abscesses of the feet and hands which, however, in my own experience only occurred in one instance, though I have heard of graver cases in the neighbourhood.

Diagnosis.—Whenever foot and mouth disease is epidemic among cattle, we must be on the lookout for instances of contagion in man. In the earliest stage no diagnosis is possible, but as soon as aphthous stomatitis makes its appearance we have only to distinguish it from ulcerous stomatitis, thrush, syphilitic lesions, scurvy and diptheria.

In ulcerative stomatitis there is no true vesicle, merely a raising up of the epithelium by infiltrat

10. The subjacent tissues and the ulcer becomes visible on scraping away the epithelium. These lesions usually commence on the gums over the last molar teeth. Then, too, the lesions are much more extensive and deeper than in aphthous stomatitis (foot and mouth disease).

Thrush is recognized by features which are familiar to all of us—the little patches of milky-white, like flakes of coagulated milk, are quite different in appearance from the characteristic little ulcers covered with a thin layer of epithelium, met with in the disease under consideration.

There ought to be no difficulty in distinguishing it from syphilitic lesions which are well known to us and the same remark applies to mercurial stomatitis. In doubtful cases it may be advisable to treat the local lesions after instituting anti-syphilitic treatment. In the course of an epidemic no doubt can rise except in obviously syphilitic subjects, but the primary chancre and mucous patches hardly expose us to the risk of error. Apart from the constitutional symptoms of scurvy, the appearance of scorbatic gingivo-stomatitis is very characteristic, the wine-blue gum line, the ecchymoses and induration give their special stamp and the patient's aspect is quite different.

Diphtheria rarely limits itself to the buccal mucous membrane and the false membrane can readily be distinguished from the ulcerations met with in foot and mouth disease. In case of doubt bacteriological examination will settle the matter.

3. Acute tuberculosis of the pharynx or mouth is painful and is accompanied by intense dysphagia. The Leptotrix myosis is easily identified.

2. Should the manifestations be limited to the hands and feet diagnosis might be difficult in the absence of the characteristic stomatitis.

Foot and mouth disease in human beings does not seem to be a grave affection, but we must distinguish between its supervision in children and in adults. In the former it may give rise to serious constitutional disturbances. In my first case the infant's plight for twenty-four hours was most alarming. The gravity of the attack no doubt depends greatly upon the severity of the infection so that infants fed upon the unboiled milk of sick cows are liable to very serious manifestations.

Prophylaxis and Treatment.—Refuse all milk from a contaminated farm, and lest it should be imperfectly sterilised, do not advise boiling such milk for human consumption. An animal may be sickening for the disease without showing any outward and visible signs so that in presence of an epidemic they are all potentially dangerous. Farmers should be informed of the necessity for cleanliness in manipulating milk and for their own sake the sick animals should be carefully isolated from the healthy stock and the hands of attendants frequently washed in a 1 in 1,000 solution of oxycyanide of mercury. All manure to be burned or buried deeply after watering with a powerful antiseptic. In epidemic times we must beware of butter.

When foot and mouth disease occurs in human beings we must remember that it is apt to be much more severe in the young. Anti-diphtheritic serum by the mouth or by injection yields good results. The ulcers should be cauterised with chloride of zinc, 1 in 30, and the bowels kept open.
In adults, gargling with chlorate of potash or borax, frequent lavage of the mouth with diluted peroxide of hydrogen, either alone or associated with thymol.

There is one point to which I should like to call attention, viz., that the country doctor ought to have at any rate a nodding acquaintance with animal pathology in order that he may protect human beings from contagion. Foot and mouth disease by no means the only disease that is transmissible from animal to man; indeed, it seems to be one of the least disastrous.

THE MEDICAL HISTORY OF ABERDEEN. (a)
By SIR ALEXANDER OGSTON, K.C.V.O., M.D.,
Consulting Surgeon to the Aberdeen Royal Infirmary; Surgeon-in-Ordinary to H.M. the King in Scotland.

After leaving the physical conditions and general characteristics of the inhabitants of Aberdeen and district in the middle and latter part of the fifteenth century, Sir Alexander Ogston proceeded as follows:

Some time about the year 1481 there came to Aberdeen, in all probability by land, one who was destined to be the greatest benefactor, William Elphinstone. He had just been nominated to the bishopric of the diocese. It is difficult to reconcile the dates given by his biographers, but it must have been within a year or two of that time, and Elphinstone was a man approaching 60 years of age, when the churchmen, nobles, and citizens alike went in procession, with music, to meet him and do honour on the occasion to one whose advent they had greatly desired. We possess a portrait of him in King’s College in Old Aberdeen, which shows, I think, that he was a person of not more than medium height, with a sweet benevolent expression of face; his features indicating that he was a healthy man who had led a temperate life, and being unmarked by any lines that point, as do so many portraits of Scots of later period, to hardness or unscrupulousness, but showing thoughtfulness, earnestness, and goodness; altogether a beautiful character, in every respect coinciding with what we otherwise know of him. If one were to judge from the portrait alone, one would perhaps rather rank him among dreamers and visionaries, than among men of affairs.

Before he came to Aberdeen as its Bishop, Elphinstone had already occupied a post of high preferment in the diocese of Glasgow, and those were days which soon tested the characters of men, particularly of such as held high positions in the Church, both in England and Scotland. The ancient Church was being threatened, and the seeds of heresy were springing up in both countries. Hence the ecclesiastical dignitaries had found it expedient, in the beginning of the century, to burn the free-thinking James Ramsay at Perth, and only three years before Elphinstone was born the Bohemian convert Paul Craw was also burnt at the stake for his doctrines. Moreover, at the very date we speak of, the thirty “Lollards of Kyle” were already giving trouble, and a year or two later to be arranged before King James and Archbishop Blackadder, of Glasgow, on the charge of heresy, and probably they would have been burnt too had not the good-natured King turned the whole matter into a jest. It was indeed a thorny problem for the priesthood how to deal with such disturbing opinions, but the country doctor to the honour of Bishop Elphinstone that he sought what he believed to be the more excellent way to encounter heresy than by an auto da fe.

There are few beyond our walls who realise how magnificent a gift Elphinstone bestowed on Aberdeen and the North of Scotland when he founded our university, and there are few who appreciate the wisdom he displayed in his organisation. The bishop lived in an era of intellectual restlessness. From Italy and Germany, as we know, the “New Learning” was spreading, and altered ideas of morals and religion were being accepted in England and Scotland as the Middle Ages gave place to the Renaissance, but all that must have been familiar to Elphinstone, and he and the other prelates of the ancient Scottish Church much disquietude. The appropriate remedy was to be sought, so he believed, in a wider development of learning and the better instruction of the priesthood of his Church, while, if these objects were to be carried into effect, the establishment of a “Studium Generale,” or, in modern phrase, a university. Eighty years previously Bishop Wardlaw had been the means of founding such a place of study in St. Andrews, where it proved successful; but thirty-seven years after that Bishop Turnbull (or, according to Boece, Bishop Durnot) raised the college, where it had been less satisfactory. In the latter university Elphinstone himself had been a graduate in Arts as well as Rector, and he therefore possessed the knowledge requisite to avoid the errors which had caused it to be a comparative failure.

THE FOUNDATION OF KING’S COLLEGE.

As Lord Privy Seal to King James IV., he participated in his Sovereign’s most intimate councils, and there could hardly have been a ruler to whom the bishop might have applied with more hope of finding sympathy with his plans for the intellectual improvement of Aberdeen, and accordingly we find the King writing, in terms inspired doubtless by Elphinstone, to the Pope for his authority to found the university. Unfortunately, no traces of King James’s letter, or of any correspondence of Elphinstone with the Holy See, relating to the proposed creation of the university, now exist in the archives of the see; for they were likely have remained locked up, had that would have been instructive about the condition of Scotland. But what their terms were may be inferred from the wording of Alexander VI.’s Bull, which bears the date of February 4th, 1494. They are that Old Aberdeen was a centre of a district inhabited by ignorant and nearly savage men, many of whom were desirous of being taught, but were destitute of instructors, and were separated by dangerous and arduous ways from those who could impart knowledge, while it was nevertheless possessed of a good climate and fertile soil; and, finally, that, owing to unfavourable local conditions, the prelates and the people of the Church could hardly be carried on. Almost exactly a year later than this Bull, on February 5th, 1495, the Pope gave the first donation to the university of the revenues of the Hospital of St. Germanus in East Lothian, which had been attached to the diocese of St. Andrews, but had fallen into disuse, and these were to form an endowment for the maintenance of the three faculties most nearly connected with instruction in religion. Three weeks later still, armed with these documents, Elphinstone published his proclamation that the university was now established; and the date of this, February 25th,

(a) Abstract of Presidential Address delivered at the 32nd Annual Meeting of the British Medical Association, held in Aberdeen, July, 1914.
1496 is the real date of the birth of the University of Aberdeen.

At this point we pause to hold up to admiration the great wisdom of the bishop in respect to the study of medicine. Not a single university in the British Isles had, until this time, had an ordinary method to provide a faculty for them in a university. The bishop must have been personally acquainted with two of the Court physicians of his former master King James III. — namely, William Scheves, who flourished about 1472, and was acceptable to James on account of his knowledge of astrology; a reptile who schemed for the deposition of Bishop Graham of St. Andrews, successor to Kennedy, so effectually that he himself stepped into his shoes in 1478; and also his successor in the King's favour, Dr. Andrews, likewise an astrologer, in 1479, who, as it proved, lost his master both his life and kingdom by some pretense, and was the first to bring him against his brothers, the Earl of Mor, and Albany, the "father of chivalry." Whether or not Elphinstone was one of the small body of scholars who were acquainted with Greek, and knew or had heard of the writings of Hippocrates, Galen, and Avicenna, which were then beginning to be translated into Latin, or Continent, and to revive the science of medicine, but were unknown in Britain, we cannot pretend to say, though it seems probable enough. But his clear vision saw, what most of his contemporaries did not discern, that medicine, like other branches of knowledge, was likely to share the impetus received from the Greek Learning, and not only was a proviso introduced into the Bull founding the university that there should be a faculty "tam in Theologia ac iure Canonicorum et Civilibus, necnon Medicina et Artibus liberalibus quam quavis alia licta facultate," but he was so concerned about the interests of medicine that he procured from James, within a year of the inception of the university, a charter which, while repeating the Pope's injunctions about the teaching of theology, civil and canon law, medicine, and arts, gifted to God the Omnipotent, the most glorious Virgin Mary, all the Saints, the University, and to a graduate of medicine for 12s. yearly, thus supplying the deficiency in the Pope's endowment. From this charter, and the King's cooperation in founding the university, it came eventually to be called King's College, as Elphinstone had always wished it to be named.

Early Aberdeen Medical Worthies.

The medical seed which Elphinstone planted in his college did not at once spring up into full vegetation. It could not have been expected to do so under the conditions then prevailing. The English masters of medicine had not yet arisen; the scientific foundations on which modern medicine rests were not even begun to be laid. Linacre had not then introduced the works of the great Greek physicians into the profession in this country, and the great Harvey did not appear until a generation later. Physicians were barely more than herbalists, and surgeons than barbers. We have mentioned some of the positions attained to by those who added quackery and astrology to their healing functions; but for the honest practitioners knowledge, and their recompen
to small. I am indebted to our Public Librarian, Mr. G. M. Fraser, for information as to the status of doctors in Aberdeen about the time of Elphinstone.

In 1147 there was in the city an English physician of the name of John, but he does not appear to have found his practice very satisfactory, if one may judge from the solitary record of him which remains—that he sold his crofts beside the Stock-rud in the District. In 1478 there was the only Scotchman John de Ressivat, who was called Kileren, or for our shillings. The first "Physician," or Professor of Medicine, in the university was James Cuming, who before 1503 had been selected by Elphinstone and appointed to lecture on that subject. Elphinstone built him a house, as he did for the other professors, and we are told that it was one of his bishop's good offices that the city assisted in providing him with a more adequate salary than he received from King James's benefaction, for it is recorded that in the year 1501 the aldermen, bailiffs, council, and community consented to give him ten marks yearly, "ave and until the" promote him to a half of a rod's fishing in the Dee, free of entry money, he paying for it the usual rent, and engaging that he, his wife, children, and household, shall personally reside within the burgh, go and visit the sick, and show them his medicines, they paying for them, but the town is to pay nothing till Cuming has actually put it into practice.

From the evidence that Cuming was not a priest, but a regular medical graduate and a married man, with his patients to look after as well as his university duties. It does not detract from Elphinstone's merit in taking specific steps to ensure that medicine should have a due place in his university, that another Scotchman, "John Generale," entered into the profession than that in Aberdeen, should have had a similar authority to establish regular medical instruction conferred on it at its commencement. As early as 1413 St. Andrews had that right conceded to it in its Bull of Foundation; and possibly the licence for a Faculty of Medicine may have been a not unusual portion of the terms on which the Popes employed when bestowing their sanction on universities modelled on those of Paris and Bologna. Glasgow University, however, had no such privilege, only three faculties—Theology, Law and Arts—having been specified in its Bull.

The Foundation of Marischal College.

It may be interesting—and, at any rate, it enhances our appreciation of Elphinstone—to remark that when the second university of Aberdeen, that of Marischal College, was established a hundred years later, no provision was made in its Bull of Foundation. It was instituted under the same atmosphere of Calvinistic reform, and concerned itself more with religion and politics than with science. What we have said above regarding some of the many claims which Elphinstone has to be honoured is no more than a just tribute to the memory of a truly great man, whose marvellous wisdom and provision it is a duty to acknowledge; it is a tribute heartily paid by us all, whether we were alumni of King's or Marischal Universities, now happily fused into one. But here our brief sketch must close. Worthy to tell of the after-historians of the Aberdeen Universities and our medical school would demand greater eloquence than Nature has allotted to me, but a visit to the beautiful window in the Mitchell Hall of Marischal College will, I am sure, add an interest to your visit in this city, by calling to your minds a few of the names which are known wherever the English tongue is spoken, while there are others, and these not a few, whose memories are cherished by at least every well-informed inhabitant of this district, men whose deeds and works have been such that Scotland, and even
England, would be shorn of a portion of their glory were their names to be deleted from the rolls of fame of our common fatherland.

INTERNAL DERANGEMENTS OF THE KNEE.

BY ROBERT JONES, F.R.C.S.I. (Hon.), F.R.C.S.E.,
CH. LIVERPOOL
Lecturer on Orthopaedic Surgery, Liverpool University.

When your indefatigable and most persuasive secretary commanded me to deliver a short address before this distinguished and representative body of surgeons I was elated by the honour, but oppressed by the responsibility. Dr. Martin told me that all I had to do was to relate my experiences, both lengthy and authoritatively, upon any subject, and to show pictures. The said preceding I have, gentlemen, is that twenty years ago I could have been as dogmatic and authoritative as one wished—for at that time I was less conscious of the need of experience.

It is the subject of derangement of the knee joint because comparatively so little has been written about it in your own country, and this has always been a matter of great surprise to me, for your games, like our own, are rough, and we in England know to our cost that harm has been done from the outside, and very strenuous. I am credibly informed that the anatomy of their knee joints differs but little from our own, and I am forced to conclude either that their cartilages are more securely placed than ours or, which is most probable, that the condition is not so generally recognised as it should be. When I mention to you that I have explored the knee joint in search of mechanical derangement on considerably over 1,000 occasions, and that surgeons all over England are adding their experience and as I see are even allowing the anatomy of it; it seems perhaps appropriate that I should endeavour to place before you some practical points which may be helpful both in making clear the diagnosis and in simplifying the treatment.

The common derangement of the knee is injury to the internal semilunar cartilage. It occurs eight times as often as does injury to the external meniscus. The internal cartilage is more firmly fixed and in a position to give and take movement which requires the external, and in addition it bears a greater strain during the normal movements of the joints, often being thinned and frayed along its inner margin. The line of force is carried through the inner side of the knee in the normal relation of the femur to the tibia, while the abducted position of the foot, when exaggerated, produces outward rotation of the leg. The disproportion may be due to the shape of the internal anterior surface of the tibia, which is a direct strain on the semilunar, is greater than that of external rotation. It is well to remember how rarely the external cartilage is displaced, in view of the fact that displacement of the internal semilunar will at times give rise to symptoms on the outer side of the joint.

We must also remember that in nearly all cases the cartilage is displaced inwards, and on those rare occasions where the knee has been dislocated it is due to haemorrhage following a tear, a localised bruising of tissue or a buckling of cartilage, accompanied by effusion which gives rise to an irregular outline of the articular margin.

The most constant symptom of a displaced or fractured semilunar is a sudden inability to extend the knee. This generally comes on immediately after injury, but I have seen many cases where no story of large or long-continued displacement at the time of accident, although it has occurred at varying periods later. This may sometimes only appear so because of the difficulty an injured patient has in analysing his symptoms. Avoiding this fallacy, we may be assured that in an appreciable number of cases the locking is for the first time complained of long after the initial injury. This fact is important from its legal aspect. The most frequent cause of the displacement is fracture of the semilunar periodicular ligament while the knee is flexed and the tibia rotated outwards. In rare instances I have known a displacement to occur while the knee is fully extended. The force necessary to cause the derangement is only that which is sometimes transmitted to the limb accidentally, for the extension of the knee is painful over the site of displacement. I maintain that if an injured semilunar is rigidly treated after its initial displacement it is generally mild and it is best to belittle him—far much better chance than it does at any later period. If the reduction be immediate, efficient, and the limb be kept fully extended, there is every reason to hope for good union. The first displacement is not often accompanied by any synovial effusion, but if it is, however, must be absolute. All movements of the cartilage must be prevented until union of the torn structures is complete, and no lateral strain must be allowed until the lateral ligament, so often injured, has recovered its position. Sometimes reduction is of cutting a cartilage, but if no anastomosis be used I have always thought it wise to summon the assistance of the patient himself. I first fully flex his knee and rotate it inwards. I then tell him at the count of three to extend the limb as fully as possible by him by pressure from above. In this way he materially assists the surgeon and simplifies the reduction. I often in this way reduce displacements of several weeks' duration, and the reduction can usually be done in one attempt. If the displacement be slight, the patient usually knows definitely at once, and the surgeon, if wise, will abide by his verdict. If the patient tells you the cartilage is still out, he is generally right, and it is best to believe him. The knee should remain fully extended after reduction in all recent displacements. If the knee does not voluntarily remain completely extended, the displacement is not corrected. Such a joint, with a clear history of an injury, which has fully extended, the lateral ligament, should be treated by complete rest in full extension for four or five weeks. Instead of this the patient is usually allowed to get up and walk in a week or a fortnight. This is a grave mistake, and a mark of the highest ignorance in the management of the series of recurrences. The cartilages can only be retained in a fixed position when the limb is fully extended; they participate in all rotary and lateral movements of the joint; rest of the limb in the fully extended position is therefore indicated, and as long as the effusion lasts the patient should be recumbent. Prolonged effusion relaxes by elongation of all the protective structures of the joint; we should therefore aspirate if absorption be retarded. Elongation of the quadriceps is best observed in the patient in bed by the knee in the relaxed position, and I think the knee should be wrapped without flexing the joint. I am sorry to dwell so long upon the treatment of the initial lesion, but it is perhaps the most important point I have to suggest, and perhaps the most neglected. Unfortunately, many patients have been observed at the instigation of a hurried convalescence and the illusory fears of adhesions. They are only snares for the unwary. A little common sense should help us to realise that the best way to promote the healing of the cartilage is by rest, and not by occasional strain to promote its occasional strain. These arguments obviously do not avail us when dealing with recurring displacements.
When the patient is up we should guard his internal lateral ligament from the strain during walking by directing him to walk with his toe slightly turned in and his foot inverted. This is made easy by raising the heel of his boot a third of an inch on the inner side. This prevents the foot from shifting from the inner to the outer lateral ligament, just as it would do in an early case of knock-knee.

It is more common to see the case when the acute symptoms are over or when several recurrences have taken place, and the patient himself, a history, which is usually definite enough. First we hear of an injury—it may be severe or very slight—it usually refers to abduction of the foot, to flexion and external rotation of the tibia. Locking of the knee mark will usually occur, and if the patient is questioned he says he has been unable to move it or he has been unable to straighten it, and when locking has not occurred, a giving way or slipping is referred to. The story of a reduction makes the diagnosis complete. If the knee be examined a few weeks after the accident, the effusion will have done, but there is often pain on pressure over the internal lateral ligament and above the tibial margin over the anterior horn of the semilunar. Pain is frequently felt in front of the patella, and this is to be distinguished from the knee. At first still later stage recurrences and fresh effusions may have occurred, accompanied by locking of the joint, the pain on each occasion being capable of definite localisation. Locking is the most definite and the most frequent symptom of recurrence. All signs of doubt must remain. On exploring the knee one frequently finds a fractured or displaced semilunar where there has been no clear history of locking, but the discovery is made, if not with surprise, at least with a certain amount of satisfaction. One is only prepared to admit to a something yielding on the inner side of the knee which gives him a sense of insecurity. This may involve only a momentary inconvenience, or it may occasionally be accompanied by synovial thickening of the lining membrane. The only safe way is to be prepared to admit to it, merely giving him a sense of insecurity. However these symptoms may differ, the one constant fact should remain, namely, that the patient is always definitely clear that the sensation does not change from the accident. The various displacements are often said to be accompanied by a click.

There is no time to deal with the exceptional case which makes the story of the knee joint so fascinating. It is often too liable to be exaggerated by itself, and to be misused without an operation. Among such abnormal cases I have found the external cartilage on the inner side of the knee, and I have found the fractured end of an internal cartilage lying on the outer side just internal to the tibial tubercle. The two pieces of bone so split up that different segments of the same cartilage would become displaced at separate times, giving rise to distinctive symptoms. Frequently I have found two separate lesions, either of which would account for the symptoms, and unless both were rectified the operation might have failed. Sometimes fringes and lipoma and pedunculated semi-detached bodies have been present when I have expected a displaced cartilage, and I have sometimes even had to close my wounds. It may be that he feels something slipping in and out, merely giving him a sense of insecurity. Therefore these symptoms may differ, the one constant fact should remain, namely, that the patient is always definitely clear that the sensation does not change from the accident. The various displacements are often said to be accompanied by a click.

Although these surprises take place, the diagnosis of a dislocation is simply made. In combination with the matter in most cases. It is liable to be confused with certain pathological conditions, of which the most common are synovial fringes, loose bodies, lipoma, and extra-auricular osteoma.

The pain is greatest in their primary onset in synovial fringes; the pain is quite local and is not situated definitely in the internal lateral ligament. Locking in the joint is common, and effusion almost invariably follows each slipping. There is usually in the recurrent case a thickening on each side of the ligament of the patella due to hypertrophy of the post-patellar pad of fat. One may expect to find synovial fringes attached to a post-patellar pad in cases of recurrent slips. The synovial plexus of the knee where the pad is found thickened and where occasional twinges occur in front of the joint.

Loose bodies lock the knee sometimes, but usually only for a brief moment, and the symptoms, although sharp, are not acute. They can be manipulated, because, unless pedunculated, they can be isolated in different parts of the joint, although they usually have a favourite resting place. They can generally be demonstrated by radiating from an lipoma to lock the knee, but the symptoms they produce are rarely acute. They are often accompanied by painless effusions, and can generally be felt in the122714.

An ostoma can usually be detected by careful examination. It can be felt and radiographed. It is the means of locking a joint when a muscle or tendon slips over it, but the locking is never accompanied by effusion.

There is a type of knee which clicks on full extension, and whenever you place your finger the clicking seems immediately under it. This is sometimes due to a nodular condition of the anterior portion of the semilunar cartilage, which is driven into the joint. It is very curious to watch as the recurrence occurs. This condition is sometimes followed by acute symptoms, and I encourage it in all recurrent cases where a strenuous athletic life is a means of abnormal necessity. Operation is a positive necessity in the case of men who walk or run with moving machinery or stand in positions where a yielding knee may mean disaster. I have operated upon patients from twelve to sixty years; age, therefore, is no contraindication in such cases. They have usually operated after trying everything, with the knee flexed to right angles, so that it need not be further flexed during the operation. I have a very real dread of accidental infection of a knee joint, for it may mean the loss of a limb. Further, I consider a knee which has been the seat of one or several attacks susceptible to infection, and am therefore careful not to operate during the presence of effusion nor to move it during operation for fear of the ingress of air or dirt. The most convenient way is to have the limb hanging in flexion over the operating table. Some thicknesses of gauze, squeezed out of a solution of biniode of mercury, is wrapped round the joint, and the incision is made through the gauze. The cut edges of the skin are then fixed into the wound. In this position it is not necessary, excepting in very stout people, to make the incision longer than an inch and a half. The incision I now employ is near-transverse, commencing just behind the ligament of the patella, and traversing slightly above the tibial border, taking care to spare the internal lateral ligament from injury. I am often consulted by patients whose knees have remained weak after operation. In such cases it often appears that the surgeon has carried his incision a little back, and has thus damaged the lateral ligament. Pressure over the ligament often causes pain, the calcaneal in the ligament being stretched and tender—a condition which only requires complete rest and strain for a complete recovery to follow. Through the small incision an excellent view can be obtained of the joint, the interior of which is then inspected with the aid of retractors. The finder should never enter the joint. Neither the surgeon nor the assistant should touch the wound except with sterile instruments; the sutures for the capsule should be manipulated with forceps, the edges of the capsule being secured by a blanket stitch. The cartilage may be found in almost any conceivable position. The lines of fracture of the ligament must be nipped up and it may be detached anteriorly; it
may be turned inwards like a bucket handle with its convexity inwards. It may be nodular; the posterior part may be in front; the anterior portion may be loose and nodular; it may be attached at its extremiti-
ties and free along the whole part of its outer border; it may be firmly fixed with its inner border frayed and the other part in line. If the wound is over so or found quite loose as a separate body; it may look quite normal, but its moorings found loose, or the posterior part may be split, which can only be dis-
covered by detaching the anterior portion and draw-
ing the talus through the free part of the joint. An examination should be gentle, and it is made easier by the use of a small blunt hook. It is only necessary to remove the loose portion of cartilage if the re-
mainder be firmly attached. If it be decided not to remove, the cartilage, can be split, and should be taken to make the section without drawing upon the stump, otherwise it will be loosened and give rise to symp-
toms of recurrence. The capsule should not be closed until a search has been made for fringes, tabs, or other foreign matter. I always apply a tourniquet, never tie a vessel nor drain the wound. Effusion, if it occurs, is usually very trivial if the operation has been done gently. As no structures of any importance to the stability of the joint have been se-
ven, the knee is defined in ten to fourteen days, the joint being protected for another week. Loose bodies of whatever type should be removed. An endeavour should first be made to localise and fix them. This should be done immediately before an anter-
ior incision, when the patient's assistance can be ob-
tained if necessary. The patient's hands should be sterilised and he should wear a mask and rubber gloves, and when found the fixed body should be placed in the keeping of a reliable assistant, and the knee should be kept extended during this operation. These loose bodies are often found in connection with rheumatoid arthritis, and should be removed whenever practicable. This may involve splitting the patella longitudinally to obtain a view of the interior of the joint. Loose bodies are frequently found at the back of the joint, and obstruct flexion and sometimes extension. They cannot be effec-
tively removed by an anterior incision, and, after they have been removed, the patient's assistance can be ob-
tained if necessary. The narrow communication between the anterior and post portions of the joint prevents them from travelling if they should prove of any size, therefore their removal is not difficult. An incision is made through the patellar cartilage, to obtain a view of the inner part of the joint, and the knee is then drawn outwards and to the outer side, and usually the loose bodies can be felt through the capsule. This route has also been described by my friends Brackett and Osgood. I have many times operated upon joints that became locked in flexion by the action of muscles or tendons over exostoses around the knee. The slice shows such a case. The patient, a good athlete, was frequently pulled up when running with a pain at the back of his joint, which I ascribed to an external semilunar. The knee shows a case of exostoses, which obstructed the vastus. When removed it was found to be surrounded by a bursa containing fibrous masses. This is usually a sequel of several operations, such cases as up which I have operated. The patient usually gives the history of a slipping at the back of the knee joint, which takes place only during unusual or active exercises. The knee sometimes completely locks and the derangement is immediately difficult to reduce, the symptoms usually not being severe, merely a sense of discomfort and slight slipping. The patient falls, gets up again and feels the back of his knees and then goes on with his game. Sometimes it is the big toe which is cramped, the patient feels the hamstrings, and in one instance I removed a peduncu-
lar exostosis, which frequently became enmeshed with the inner head of the gastrocnemius. Here you see an osteoma, which ceased to trouble us at all after the knee was fixed. I have operated on occasions to obstruct the sartorius. The next plate shows a flattened osteoma, which gave rise to symptoms suggestive of an injured semilunar, really due to its contact with the sartorius and semitendi-
 nosus, and the osteoma shown in the next slide caused the patient no inconvenience until it was removed. More rarely derangements may arise from sharp exostoses over the adductor tubercle, as shown on the following slide.

The diagnosis of such cases is easily made. They can be felt by the finger and demonstrated by the X-ray.

These cases are only a few of a large number which prove the part osteoma may take in disarranging the mechanism of the knee. Osteomata are so often found causing no symptoms that their evil conduct may sometimes be overlooked.

There are two conditions to which I would make a brief reference, as they give rise to very considerable disability: I allude to rupture of the crucial liga-

tment and fractures of the tibial spines. The dia-
gnosis of ruptured crucials is simple if we remember their function.

The anterior crucial ligament is tense when the knee is fully extended, and prevents the tibia from being displaced forwards on the femur. The posterior crucial ligament is tense in complete flexion, and prevents the tibia from being displaced backwards on the femur.

Both ligaments check inward rotation of the tibia. Hence, if after an injury of the knee the tibia can be displaced backwards or forwards or rotated inwards or outwards in the extended position, an injury of one or both crucial ligaments may be assumed.

If in the extended position the tibia cannot be dis-
placed forward, it may be assumed that the anterior crucial ligament is not torn.

If the tibia cannot be displaced backwards when the knee is flexed, the posterior crucial ligament is not ruptured.

The diagnosis, therefore, of ruptured crucials is not difficult, only in the instance of those cases of abnormal length due to elongation or destruction of the ligaments associated with long continued flexion into the joint or with changes associated with Charcot's disease. A large experience of the dislocation of joints gives me the authority to state that if injuries resulting in ruptured crucials be treated by rest to the joint for several weeks an excellent recovery will usually re-
sult. It is therefore wise to attempt their restora-
tion by operative means.

Ruptured crucials of the tibial spines, of which I have seen many cases, may or may not be associ-
ated with rupture of the crucials. The most constant sign of this fracture is an obstruction to full extension. The block feels like a definite bony ob-
struction, and is quite different from the blocking, which occurs when a dislocated semilunar or a synovial fringe is nipped. If the spine be fractured and the knee is prevented from full extension, then with the knee flexed over the table end the patella should be split longitudinally, the incision being carried a suffi-
cient length to allow the split portions to be drawn laterally over the condyles. The patellar pad should then be removed, together with the spine and any fibrous masses that obstruct. A good deal of blocking should be present an operation is not needed, and the knee should be treated by rest and fixation in full extension.

Mr. President, ladies and gentlemen, I feel that I have placed these elusive injuries of the knee before you in so condensed and hurried a manner as to rob a fascinating subject of its charm. If this be so, I claim your kind indulgence. The lesions are probably much more common than we are usually led to believe, and suggest, but if by good fortune the clinical suggestions I have offered you should prove of practical use, I shall feel more than ever grateful for this privilege of addressing you.

Dr. JAMES NEIL, M.D., formerly Medical Superin-
tendent of the Warrneford Mental Hospital, Oxford, left estate of the gross value of £6,000.
OPERATING THEATRES.

ROYAL FREE HOSPITAL.

TUBERCULOUS PERITONITIS.—Mr. Wilmott Evans operated on a child, aged 12, who had been admitted for distension of the abdomen. The girl had been well until 8 months before, when she had suffered from irregular attacks of diarrhoea, accompanied by some abdominal pain. She had wasted, but after a time the abdomen began to increase in size, though the diarrhoea had ceased. On admission, she was seen to be small for her age, badly nourished, and the abdomen was much swollen. On percussion, there was dullness in the flanks and above the pubes nearly to the umbilicus, but the remainder of the abdomen was resonant. There was no evidence of any pulmonary tuberculosis. A diagnosis of tuberculous peritonitis was made. She was kept under observation, and the distension of the abdomen slowly increased, causing her some discomfort. It was determined to operate.

The abdomen was opened by a median incision about two inches below the umbilicus. When the peritoneum was opened it was seen to be thickly studded with tubercle and the small intestine which presented in the wound was similarly affected. About a pint and a half of fluid was evacuated; it was clear, but contained straw-coloured lymph. As the tubercle fluid was coming away the peritoneum was sewn up with silk, the fascia drawn together, and the skin sutured. The wound was dressed with aseptic gauze, and the patient returned to bed.

Mr. Evans said that tuberculous peritonitis might arise in two ways: in one form the inflammation spreads from a tuberculous ulcer of the small intestine through the intestinal wall; usually the involved peritoneum is another pectoralis, and the general peritoneal cavity is not affected; but it may happen that some leakage occurs so that tubercle bacilli gain access to the general peritoneal cavity, giving rise to tuberculous peritonitis. True perforation of a tuberculous ulcer of the intestine very rarely occurs. Secondly, and this he considered is the more common way, tuberculous peritonitis may be set up by the bursting of a tuberculous mesenteric gland. When this happens tubercle bacilli are widely scattered all over the peritoneum, and immeasurable tubercles form. The surgical treatment of this condition, he pointed out, arose from the successful result of opening the abdomen in a case of tuberculous peritonitis. A case of laparotomy and a laparotomy was a case, where the diagnosis was uncertain, but finding that tuberculous peritonitis was present he did nothing more, simply closing the abdomen. To his surprise the patient recovered, and this case is noted in an individual case. Mr. Evans remarked, whether a laparotomy will do any good, but a successful result follows in so many cases that it is always advisable to do it, unless some distinct contra-indication be present. It is sufficient to make a small opening into the peritoneal cavity to evacuate any fluid that freely comes away, and then to close the abdomen. It is important not to employ drainage; it does no good, and may lead to peritoneal infection. In a few cases, if the operation is carried out and a laparotomy is made, one or two months later may succeed. In cases in which it appears to be desirable, laparotomy may be performed under local anesthesia. While there can be no doubt as to the success of laparotomy in cases of tuberculous peritonitis, there is much doubt as to the mechanism by which the improvement is brought about. Possibly the operation causes a local leucocytosis which leads to obstruction of the tubercle bacilli, possibly that the circulation of the peritoneal cavity and its contents may be disturbed so that absorption takes place. It must be admitted that these explanations are hardly satisfactory.

The medical history of the case was that additional effusion occurred soon after the operation, but this was soon absorbed, and the patient was able to leave the hospital about a month later in a greatly improved condition.

SPECIAL REPORTS.

THE EIGHTY-SECOND ANNUAL MEETING OF THE BRITISH MEDICAL ASSOCIATION, HELD AT ABERDEEN, 1914.

(By Our Special Representative.)

THIRD ARTICLE.

THE WORK OF THE SECTIONS.

SECTION OF ANATOMY AND PHYSIOLOGY.

A great many papers were read in this section dealing with the development and physiology of the heart. Dr. D. Ley Macfarlane (Glasgow) reported on the bird's and the reptilian heart. Dr. Strickland Goodall (London) read a communication on "Some Instrumental Variations in the Human Electrocardiogram." Dr. E. S. Edie read a paper on some experimental work on the action of enzymes.

SECTION OF DERMATOLOGY AND SYphilis.

Dr. Norman Walker (Edinburgh) opened a discussion on the first day on "The Need for more Method in the Conflict with Lupus and Ringworm," followed by Dr. Alfred Eddowes, President, Drs. Goldwin Telford, PH. D., William J. Winfield, Hume, Winibred Williams, Green and Menachen. On the second day a joint meeting was held with the Section of Naval and Military Medicine and Surgery, when a discussion took place on "The Modern Treatment of Syphilis," in which Mr. J. H. Roseiough, Colonel T. W. Gibbard, K.H.S., Major L. W. Harrison, and Dr. J. C. McWalter, among others, took part. On the Friday various interesting papers were read.

SECTION OF DISEASES OF CHILDREN, INCLUDING ORTHOPEDICS.

On the first day Mr. T. H. Openshaw introduced a discussion on "Congenital Dislocation of the Hip." The view was put forward that treatment should be begun as soon as the diagnosis is made. A discussion on the thymus gland in its clinical aspects was opened by Dr. Archibald Garrod on the Thursday. Among the interesting papers read on the last day were "Lyme Salts in Children's Diseases," by Dr. J. C. McWalter (Dublin); and two by Mr. Paul B. Roth on the treatment of torticollis and lateral curvature of the spine.

SECTION OF ELECTRO-THERAPEUTICS AND RADIOLOGY.

Professor Leduc of Nantes, whose work on ionisation is so well known, gave an account of his experiments regarding the galvanisation of the brain. Some interesting papers were read on the effects of high frequency currents, and the comparative value of X-rays and radium in the treatment of malignant growths. On the Friday a joint discussion was held with the foregoing section on "The Diagnosis of Chronic Pulmonary Tuberculosis in Infancy and Childhood," in which Drs. D. B. Lees, Clive Riviere, and Ironside Bruce, among others, took part.

SECTION OF GYNECOLOGY AND OBSTETRICS.

A discussion took place on the Wednesday on the treatment of fibromyomata, opened by Dr. Archibald Donald (Manchester), followed by Professor Gauss (Freiburg). On the next morning Dr. Henry Jellett (Dublin) introduced the subject of "The Management of Pregnancy and Labour in Contracted Pelvis." The last day was occupied by the reading of papers and a "Drug Treatment of Dysmenorrhoea," by Dr. J. C. McWalter; "Acidosis and the Nitrogen Particles in Pregnancy," by Dr. H. Leith Murray, and one on contractile pelvis, by Dr. D. Shannon.

SECTION OF LARYNGOLOGY, RHINOLOGY, AND ENT.

A discussion took place on the first day on "The Treatment of Inoperable Growths of the Nose and Throat," in which Mr. W. D. Hamner, and Drs. W. Hill and J. M. Macintyre, among others, took part. On the following Thursday Dr. A. A. Gray introduced the subject of otosclerosis and various cases submitted during the previous week, and on the following morning Sir William Milligan (Manchester) demonstrated a new form of extending broncho-esophagoscope.
MEDICAL SOCIETY.

Considerable interest was shown, naturally, in the proceedings of this section, which was presided over by Dr. J. Gordon (Aberdeen). Dr. A. K. Chalmers, M.O., H., Glasgow, opened a discussion on “The Relief of Pain in the Trenches,” in the absence of Dr. G. Robertson (Edinburgh). He pleaded for freer opportunities for the diagnosis of these diseases, and he thought that the Government should assist local authorities, financially in the matter of equipment. Dr. H. H. Mills (Kensington) expressed his belief that the desirability of imparting instruction on sex hygiene to scholars. On the Thursday Sir John Collie opened a discussion on “A State Medical Service,” and a symposium. He said that the condition under which the medical work was carried on under the panel system was, in many cases, not medical practice, but commercialism of the worst type. Dr. H. H. Mills (Kensington) thought that the suggestion of mapping the military precision into brigades and battalions each with its medical officer was against our national characteristics. A separate discussion took place on “Medical Certification following Wound injury in regard to the University and Ministry, which was opened by Mr. C. Sandeman, K.C., and followed by Drs. A. C. Farquharson (Cork), and J. C. McVail (Glasgow). On the last day Dr. Leslie Mackenzie (Edinburgh) opened a discussion on “The Training of the State towards the Early Environment of the Child,” followed by Drs. J. Caravel and T. Dewar.

SECTION OF MEDICINE.

Dr. Harry Campbell (London) introduced a discussion on “Headache,” followed by Dr. C. O. Harker and others. Dr. J. S. McIndoe (Glascow) read a paper on “Splenection in relation to the Treatment of Anaemia.” On the following day Dr. Rist (Paris) opened a discussion on “Thoracic Pneumothorax and Thoracic Evisceration.” After the combined discussion already mentioned as taking place on the last morning with the Section of Diseases of Children, various papers were read, among which may be mentioned that by Dr. D. D. Brown (Harro- gate) on rheumatoid arthritis and that by Dr. W. Haig (Glasgow) on the rapid relief of acute hantigo by manipulation and active movement.

SECTION OF NAVAL AND MILITARY MEDICINE AND SURGERY.

On the first day a discussion was opened on the treatment of wounded in naval warfare by Fleet-Surgeon D. Walter Hewitt, R.N. The subject of “Gangrene in War” was introduced by Captain C. M. Page, R.A.M.C. (S.R.), while the treatment of venereal diseases, and soldiers in civil life was discussed by Lieut.-Col. E. M. Wilson, C.B., C.M.G., D.S.O., R.A.M.C. (R.P.). On the next day the combined discussion took place on syphilis as mentioned above, followed by one on “Common Allments of Camp” introduced by Captain C. Johnson, M.B., R.A.M.C. (T.F.). Staff-Surgeon G. M. Levick, R.N., gave an interesting illustrated lecture on the experiences of the Northern Party of Captain Scott’s expedition; Section of Naval and Military Medicine and Psychologic Medicine. A discussion was opened by Dr. F. W. Mott, F.R.S., on “Diagnosis and Treatment of Parienymastyhous Syphilis.” On the next day Dr. C. G. Jung (Zurich) introduced the subject of the psychopathology of psycho-pathology. The last day was given over to papers which included one on “Anger in its Medico-Psychological Aspect,” by Dr. J. B. Hyclop, and one on “The Psychic Factor in Insomnia,” by Dr. Critchon Miller.

SECTION OF OPHTHALMIC.

Mr. E. F. Maddox (Bournemouth) opened a discussion on the choice of a cataract operation. The next day a discussion on a case of facial paralysis with paralysis of light reflex and near vision, introduced by Mr. J. Herbert Parsons (London). Dr. Maitland Ramsay (Glasgow) opened a discussion on the last morning on the teaching of opthalmology to medical students.

SECTION OF PATHOLOGY AND BACTERIOLOGY.

The President, Dr. W. S. Lazarus-Barlow (London) opened a discussion on “The Action of Radiation on Cells and Fluids.” Dr. Carl Brown introduced the question of the bio-chemistry of immunity reactions, followed by Drs. H. K. H. Alexander and Mr. H. Mackenzie Wallace. On the next day a joint discussion took place with the Section of Pharmacology on “The Pathology of Heart Function,” opened by Dr. J. F. E. Leveson (London), followed by Dr. T. G. Barr and Dr. G. M. C. Glaxton. On the Friday Dr. W. J. C. M. H. D. B. Macrae introduced the subject of “The Importance of Variability among Bacteria and Its Bearing on Diagnosis.”

SECTION OF PHARMACOLOGY, THERAPEUTICS AND DIETETICS.

Professor J. T. Cash (Aberdeen), who presided, advocated the use of the metric system in prescribing, with a view of bringing laboratory and clinical work into closer relation. Dr. J. M. Fortescue Brickdale (Bristol) opened a discussion on “Recent Advances in the Relationship between Chemical Constitution and Pharmacological Activity.” The last day was occupied with a discussion on the pharmacology and therapeutics of the animal extracts exclusive of thyroid extract, in which Prof. Noel Paton and Dr. O. F. Greenbaum took part. Dr. Chowry Muthiu (Wales) read a paper on diet in the treatment of pulmonary tuberculosis.

SECTION OF STATE MEDICINE AND MEDICAL REFORM.

Professor Matthew Hay (Aberdeen), the President, in his introductory remarks, thought that our changed attitude with regard to the criminal betokened a great advance in medical jurisprudence. Sir Victor Horsley then opened a discussion on death certification, and Dr. F. H. Bruce (Dundee), Dr. J. C. Dunboy (Register House, Edinburgh), Dr. F. E. Wynne (Wigan), and others, had spoken, the following resolution was moved and adopted—“That the British Medical Association reaffirms its opinion that extensive reforms in the administration of national statistics of life and death are urgently needed, especially the immediate institution of a confidential system of death certification, and the Association therefore calls on the Government to introduce legislation to effect this essential change in the public health service.” Dr. J. C. McWalter (Dublin) read a paper on “Legal Investigation of Cause of Death, with Suggestions for Reform.” Numerous other papers on medicolegal problems health subjects occupied the rest of the programme.

SECTION OF SURGERY.

In spite of the fact that this section was overshadowed by the Clinical Congress of Surgeons of North America, held in London at the same time, much good work was done. A discussion took place on the first day on “Pharmacology and Treatment of Carcinoma of the Tongue,” opened by Mr. W. G. Spencer (London). Professor J. K. Jamieson and Mr. J. F. Dobson (Leeds) read a paper on the lymphatics of the tongue. On the next day Mr. Robert Jones (Liverpool) opened a discussion on the surgical treatment of arthritic deformities. On the Friday Mr. H. M. W. Gray (Aberdeen) introduced the subject of “Anoel-Association, or the Evolution of the Shockless Operation.” Many valuable papers were read in this section, which space forbids us to enumerate.

SECTION OF TROPICAL MEDICINE.

Fleet-Surgeon P. W. Bassett Smith, C.B., R.N., opened a discussion on Kala-azar and allied conditions, followed by Professor V. Gabbi (Rome), Dr. P. H. Bahr (Cevoni), and others, Dr. A. A. F. MacCanon (Egypt) read a note on a new antimalarial. On the Thursday, Col. King, C.I.E., I.M.S., opened a discussion on “The Education and Position of the Sanitarian in the Tropics.” The last day was occupied by the reading of papers and by a discussion on the treatment of syphilis and the surgical treatment of collits and post-dysenteric conditions.

(The topic continued.)
ROYAL COMMISSION ON VENEREAL DISEASES.

Mr. Pugin Meldon, Senior Surgeon at the Westmorland Infirmary, Appleby, gave evidence before the Commission as the representative of the Joint Committee appointed by the Royal College of Physicians of Ireland, the Apothecaries' Hall, Ireland, the School of Medicine at Trinity College, Dublin, and the National University of Ireland, with a view to laying stress on the point that the difficulty in dealing with venereal disease arose from the social stigma attaching to those suffering from it. This stigma was certainly a hindrance to early diagnosis and treatment, and therefore desirable that the treatment of the general class of venereal disease patients should be expedited. The treatment of the treatment of the general class of venereal disease patients special dispensaries and hospitals or special laboratories for diagnosis. As regards diagnosis, it was essential that clinical methods should be supplemented by the aid of the pathological laboratory, and arrangements should be made for the free diagnosis of venereal disease at the laboratories in the Pathological Departments of the Universities and Medical schools.

With regard to treatment, the Committee were of opinion that one cause which operated very extensively in deterring people from obtaining proper treatment was the penalisation of venereal disease. Expenses incurred in seeking a physician or other dismissing from their employment persons who were found to be suffering from these diseases, or refusing them leave for the purpose of treatment. The result was that these persons either endeavoured to treat themselves on the non-penalising method of course or sought a physician when the disease was far enough advanced that they were unable to do their work. So long as this penalisation persisted, it was impossible seriously to suggest any scheme of notification, and therefore desirable that some method of penalisation be given. Similar consideration led the Committee to suggest that the Insurance Act should be amended so as to make it impossible to withhold sick pay and disablemen for venereal disease.

Mr. Macleod Yearns, Senior Surgeon to the Royal Ear Hospital, stated that in his opinion syphilis and its concomitants was as severe amongst children of the poor as it was when he started practice as an auricular surgeon twenty-one years ago. He had found that amongst children there were far more cases of manifest congenital syphilis among the poor than among the better class. He attributed to the fact that in the latter the disease was recognised earlier and therefore treated earlier. Among the poorer syphilis very often went untreated, and this was especially the case with children. As showing the number of children with congenital syphilic deafness appearing after birth with sufficient severity to necessitate special education, he referred to records he had kept in connection with work at special deaf schools. Of the 84 children (42 boys and 42 girls) examined during a period of seven years, 61, or 72·7 per cent., were deaf from congenital syphilis. The frequency of defects in excess of the male, the relative percentages being: boys 40·4, girls 9·6.

Dr. James Galloway, Senior Physician to Charing Cross Hospital, stated that recent experience gained in dealing with venereal diseases in Army and Navy greatly encouraged the expectation that these diseases might, if favourable conditions were obtained, be prevented and their evil consequences diminished in the general population. He did not think that compulsory measures of believing registration and treatment were likely to lead to satisfactory results. In dealing with the general community, it was necessary that all efforts to cure and prevent the disease in any given position, and adhesions in cases, should be strictly voluntary, with the willing consent of the sufferers and by the sympathetic co-operation of the rest of the community. Social stigmata should so far as possible be removed from those under treatment. It should be strongly impressed upon the public that large numbers of persons suffered from venereal disease through no fault of their own. All hospitals willing to undertake the treatment of venereal diseases in their early or acute stages should be encouraged to do so. If this were done facilities would immediately be at hand for the greater number of patients. It was especially desirable that hospitals with medical schools should undertake the treatment of these diseases in a general scheme of dealing with these matters that would meet the community. Opportunity would thus be provided for the instruction of medical students in the recognition and treatment of venereal diseases in a way which had been impossible in the past. He also thought that the cost involved in the treatment of these diseases on a large scale would be considerable, and as the proper treatment and eradication of the diseases was a matter affecting the general health of the whole community, it was proper that the expense should be met by local authorities or by the State.

REPORT OF THE HOMES FOR INEBRIATES ASSOCIATION.

(a)

The report of the Medical Superintendent of the Dalrymple House contains a good deal of interesting information concerning the treatment of sufferers from alcoholism and drug habits. 57 patients were admitted during the year under review, 42 under the "private patients," and 21 under the Inebriates Act. The difficulty in treating the former class is due to its optimism. Most people object to signing away their liberty, and all the same are too eager for recovery and precipitation of their own judgment of the complete rehabilitation of their self-control. The aim of the Medical Superintendent is to cure the cases with the least discomfort to themselves. Alcoholism, as a past, is treated as 'do or die,' which figure certainly shows a proportion of success that is most encouraging to those of us who are daily brought face to face with the awful results of overindulgence in alcohol, and similar suicidal habits.

CORRESPONDENCE.

FROM OUR SPECIAL CORRESPONDENTS ABROAD.

GERMANY.

Berlin, Aug. 2nd, 1914.

At the Gesellschaft für Psychiatrische und Nervenkrankheiten, Dr. Kramer related a case resembling Paralysis Agitans.

The patient was a man, aged 58, who had always been in good health. Two years ago, he became deaf. The disease began ten years ago, and for the last five years he had been incapacitated from work. Gradually a slowness and difficulty had come on for all movements of the body, the voice became soft, and speech slow. He could not perform even the simplest acts. Occasionally he attempted to raise himself from a stooping position and had a tendency to fall backwards. All symptoms had gradually become worse. Objectively the remarkable thing was that the entire body was drawn forward, the mask-like expression of the features, slowness and difficulty of performing all bodily movements. There was, moreover, a prolonged interval between the closure of the eyelids, a tendency to tremor in any given position, and ataxia; also a tendency to ataxia and not infrequently ataxia. These symptoms corresponded to paralysis agitans, but there was no tremor nor rigidity of the muscles; it was only when the head was being

moved passively that there was any resistance. The pupils reacted to light. The Wassermann reaction of the blood was positive. The movements of the eyes were also slow, and there was slight nystagmus. When the eyes were moved slowly he got a wider range of movement than when they were moved rapidly. The movements of the mouth were more extended than the voluntary ones, but they were still below the normal. There was no amблиопия. The remainder of the nerve functions, also the electrical excitability, were normal; the mental condition was also normal. The temperature was 100 F. Practically, the case was one either of atypical paralysis agitans or a localised affection due to arteriosclerosis or syphilis that had a localisation corresponding to that of paralysis agitans. In any case the presence of rigidity was remarkable after so many years. The case showed that the disturbance of movement of paralysis agitans was an independent symptom, and had nothing to do with stiffness of the muscles. Mr. Maza said he had had a similar case in which all movements of the eyes were performed slowly. That case was one of Friedrich's disease probably. The same symptom had been observed by Westphal in a case of pseudo-sclerosis.

In a case of caloric irritation of the vestibuher the following curious condition was observed: Some seconds after syringing out with from one to two litres of water at a temperature of 20° C, with the head held erect was so far that the patient could not move the eyes to the left beyond the middle line, whilst movements to the right were performed with the usual pathologico sluggishness. If the ear was washed at a temperature of 42° there was a momentary disturbance of movement towards the side that was being syringed. These disturbances were greater when cool water was being made use of for the syringing.

At the Verein für Innere Medizin, Dr. Falk spoke on the Treatment of Tetanus Neonatorum. During a period of four months the speaker had seen three cases of the disease at the Kinderkrankenhaus. He had treated all three with injections of magnesium sulphate (8 to 25 per cent.). The paralyzing action he combated by calcium chloride. All children recovered. The magnesium had the effect of controlling the spasms.

Dr. Finkelstein said that the duration of the disease was not shortened, but the great advantage gained was saving of the patients from attacks of spasm during which children died often.

Dr. Czerny asked whether tetanus neonatorum was an infective disease.

Dr. Falk, in reply, said that the magnesium sulphate must be given in full doses, but one had to be careful not to cause paralysis, if given too late the convulsions were not prevented.

At the Verein für Innere Medizin, Dr. Bieling gave a communication on the Action of Extracts of the Endocervical Glands on the Tissue Changes of Rachitic Infant.

Various glands with an internal secretion, he said, had an effect on the growth of bone. In the first rank, the anterior lobe of the hypophysis, the parathyroid, the sexual glands, and in young animals the thymus. He had also seen that of phosphorus substances by injecting them into rachitic children. When he injected every day 0.5 c.c.m. of a 10 per cent. extract of the parathyroid of the sheep both lime and phosphorus were retained, whilst retention was much lowered when the injections were suspended. Growth was influenced by injection of the thymus extract of the calf. When extract of the anterior lobe of the hypophysis was given there was diminished retention of lime, but injection of phosphorus substances by injecting them into the children did not have this effect. The thymus extract would appear extract of the parathyroid was of great importance as regarded the growth of bone.

Dr. Oswald Meyer said he had seen recovery take place in a case of spasmophillia after the use of parathyroid extract.

Dr. Langstein counselled caution in arriving at conclusions regarding the value of these substances.

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HUNGARY.

Budapest, Aug. 10th, 1914.

The Heart in Rheumatism in Children.

Dr. Benes and Desnever say that even the apparently mildest rheumatism in a child does not cause the slightest appreciable symptoms, may yet entail heart trouble, possibly fatal. This is accepted as a matter of course in acute articular rheumatism, in which the deviation of a joint, but it is not generally known that a slight attack of rheumatism with merely vague pains, or none at all, may be followed after a few weeks or months by a slight pain in the precordial region and dyspnoea. The heart beat is then often rapid and there may be evidences of old mitral insufficiency and recent pericardial friction sounds. The liver is slightly enlarged, the base of the lungs congested and the child is pale and languid, without appetite. Under rest in bed, ice to the heart, digitalis and the salicylates the symptoms subside and all seems well after four or five days. If the temperature is taken, however, it will be found a little above normal, and after a few days this syndrome occurs, to subside and return again. This alternation of symptoms is characteristic of the affection in question. No one imaging anything is seriously wrong until the terminal phase develops with the development of all the symptoms, vomiting and haemoptysis and the Cushing sign, without signs at any time of true asystolia, dropy or oedema. They have encountered twelve cases of this malignant rheumatic heart disease in children and discuss its characteristic features and the importance of vigorous salicylic medication in every case of rheumatism in a child, no matter how apparently mild, and the physician should watch over the heart afterwards. Every tachycardia, every pain in the heart region, with or without a Cushing sign, must be regarded as signs of serious trouble, especially when there is accentuation of the second pulmonal sound. This latter indicates not only the participation of the pericardium but also that the patient is not yet in the precordial regions, therefore, the physician advocates subcutaneous injections of sodium salicylate in twice the amount of water. From 2 to 5 gm. of this solution can be injected at one point without inducing a local reaction. Digitalis also relieves; the children with the affection seem to display a special tolerance for digitalis and the symptoms improve under it.

Diagnosis of Enlarged Thymus in Young Children.

Dr. Deak analyses the symptoms and signs suggesting hyperfunction of the thymus gland, being sometimes being that it is sometimes extremely difficult to distinguish between an unduly enlarged thymus and enlarged tracheobronchial glands as the cause of dyspnoea. He gives the details of twenty-one cases (twelve girls and nine boys) in which various points involved, including two in which he was certain that the thymus was hypertrophied, but an operation revealed atrophy of this gland, the enlarged tracheobronchial glands being responsible for the trouble. The special features of enlargement of the tracheobronchial glands are a history of measles, bronchitis or bronchopneumonia, the general lack of dulness over the manubrium, and difficulty in breath- ing which is more serious on inspiration, while the chest is retracted during inspiration, mainly in the lower portion, the depression occurring, if it occurs at all, simultaneously in the epigastrum, the lower sternum region and the hypochondrium on each side. The heart shadow is often above the transverse groove resulting from this form of retraction. Sometimes the groove curves up on each side, so that the chest above bulges spherically, while the retraction portends between the lungs on the sides. Röntgenography shows the normal chest with a shadow like a long necked bottle, while with enlarged thymus the shadow is irregular, with a protrusion just below the neck of the bottle on one side. The outline is smooth and the shadow even. With swollen lymph-nodes in the anterior mediastinum, the upper part of the shadow is as normal, but below it spreads out irregularly generally
on the right side of the shadow of the heart, the pro-
trusions small and round or finger-shaped, sloping
downward, and surrounded by several shadows with a circular outline, while the depth of the shadow may vary from that of the heart, being either lighter or darker.

FROM OUR SPECIAL CORRESPONDENTS AT HOME.

SCOTLAND.

PROFESSORSHIP OF PATHOLOGY AT ABERDEEN.

The King has been pleased, on the recommendation of the Secretary for Scotland, to appoint Dr. Shennan, M.D., F.R.C.S.E., as Regius Professor of Pathology in the University of Aberdeen. Dr. Shennan is at present pathologist to the Royal Infirmary, Edinburgh, and has been engaged in teaching the subject almost since his graduation in 1890. He has worked in the pathological and bacteriological laboratories of London, Copenhagen and Munich. He has made a number of important contributions to our knowledge of tuberculous, particularly in the lungs, and his appointment is looked on as a well-deserved recognition of the work he has done.

BALDWIN INSTITUTION FOR MENTAL DEFECTIVES.

In the annual report of this well-known Scottish institution for the treatment of mental defect the changes, and the need for increased accommodation for defectives, which are foreshadowed by the passing of the Mental Defectives Act are referred to, but at present lack of capital has prevented the carrying out of the structural changes. It has lately, however, been found possible to carry into effect a desirable reform, and to separate completely from one another the children who are capable of being taught, and those who cannot. During the year 25 boys and 17 girls were admitted, and 12 boys and 13 girls discharged, the total inmates being 208. The hope is expressed that when the District Board of Control assumes the reins the present unsatisfactory state of matters—the sending of children too late, and their withdrawal without any provision being made for their future—will cease. For the rest, the report, and the opinions of the Lunacy Commissioners appended thereto, show that the Institution is doing its work in a satisfactory manner and is endeavouring during the transitional period to meet all the demands which the future may have in store.

EDINBURGH POST-GRADUATE COURSES.

Owing to the occurrence of the war, it has been decided not to hold the post-graduate courses in Edinburgh this year. The proximity of the North and East of Scotland to the North Sea, and the prospect of the various hospitals in the neighbourhood being drawn upon for military purposes, together with the general difficulty of business renders this decision regrettable necessity. It is felt that under the existing circumstances the post-graduate courses would not have been up to their previous standard, even as regards attendance or the quality of the work done, and it has therefore been thought better to allow them to remain in abeyance for this year.

LETTERS TO THE EDITOR.

[We do not hold ourselves responsible for the opinions expressed by our Correspondents.]

FORCIBLE FEEDING.

To the Editor of The Medical Press and Circular.

Sir,—I am loath to be at dispute with such distinguished champions of the militant suffragette as Sir Victor Horsley and the Hon. Secretary of the "Forcible Feeding Protest Committee." I should like to be allowed to ask these gentlemen, or any other whom it may concern, this very simple question: What do those who are opposed to so-called forcible feeding propose to substitute in lieu thereof in the event of a militant suffragette attempting to commit suicide by starvation? It is obvious on the face of this question that the prison officials cannot permit deliberate suicide without efforts to arrest a prisoner in the act, otherwise they would be necessary in law to a criminal act, hence they are driven to the insistence of taking food or forcible feeding.

On the other hand it seems equally clear that no law indemnifying the prison officials from responsibility, as was a law in England in 1914, could consistently be brought in so long as suicide is a felony or a criminal act, because under such circumstances the law, as it now stands, would be treating suicide as a criminal offence in one direction, and to all intents and purposes legalising it in another.

If, therefore, the suggestion of Sir Victor Horsley, the Bishop of London, and others, were adopted—that is to say, the entire dispensation or abrogation of forcible feeding, a militant suffragist would—as indeed they are for the most part now—be set free to commit another crime possibly more atrocious and drastically than the original crime, well knowing the immediate penalty could not be inflicted by the force of law. 

In conclusion, Sir, it is my answer to all this to say: "Then cast in your vote." This is merely evading the question of forcible feeding, and reverting to a political question which does not concern a medical journal. The entrenchment of women has nothing to do with either Sir Victor Horsley (so I understand him), with forcible feeding. On the other hand, it is essentially a medico-legal question, and as such I venture to intrude on your columns.

I am, Sir, yours truly,
CLEMENT H. SEES, M.R.C.S.
5, Chancotbury Road. August 7th, 1914.

NEO-MALTHUSIANISM.

To the Editor of The Medical Press and Circular.

Sir,—Since my last letter appeared activity has been given to a whole mass of factors bearing upon the international position of our peoples, the results of which have been touched upon in my previous communications. The book must be therefore closed upon these theories for the present; it would be grossly unseemly to discuss them at this moment, but there seems no reason why many of the principles included in what is styled "Neo-Malthusianism" should not be examined with advantage and propriety. It would be a great gain at the outset if we were clearly and explicitly informed of the Neo-Malthusianism. With my knowledge I can only interpret it as the cult of a doctrine which avows that most of the evils of the world can speedily be put an end to by a narrow limitation of the population. "Neo-Malthusian" charges me with "taking a limited view of the matter." He thinks "I am imbued with the idea of imperial domain both for France and England." This passage may serve as a fair sample of Neo-Malthusian's style throughout. It is vague; a solid statement is difficult to discover anywhere. Where does he really mean, for example, by "imperial domain"? He declares "that more important than the welfare of France or of England is the welfare of the world." The propagation of the Patagonians, Zulus, and the stationary backward races of the East is as important as that of the progressive peoples of the West. There is a passage in one of Charles Kingsley's books—it is quoted in the recently published life of Florence Nightingale—in which he points out the empty vast domains in British Colonies, and pleads for population of these territories by what he eloquently demonstrates is the finest race on earth—the Anglo-Saxon. He writes of the waste of infantile life in his time to neglect of sanitation alone; shows how the diseases keeping up the death-rate are mainly preventable, and
argues for the rearing of our broods by known methods in fixed and well-selected localities from which they may be distributed. We should not, indeed, be ashamed if our colonies be the nucleus of the future world. The world has already become the family of man, and the future history of mankind is to be written in purely geographical terms. The conditions under which we live and our economic institutions should be planned on a geographical basis, just as the plans of our cities, with the growth of the population and the rapid application of scientific knowledge, have become largely dependent upon the geographical conditions.

The conclusion of the essay is that the world is now a single unit, and that our common interests and ambitions should be based upon this fact. The thesis that our colonies may be the nucleus of the future world is supported by arguments that the conditions under which we live and our economic institutions should be planned on a geographical basis.

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MEDICAL NEWS IN BRIEF.

A Tuberculosis Dispensary for the City.

The Local Government Board has approved the establishment, under the National Insurance Act, of the proposed tuberculous dispensary at St. Bartholomew's Hospital for a period expiring on October 31st, 1915. It is expected that the dispensary will be opened on November 1st, probably not without some ceremonial, though nothing has yet been definitely decided on that point. The Corporation, it is understood, has arranged to subsidise this interesting experiment for one year at an estimated annual expenditure of £500 to £700.

Royal Dublin Society.

We are asked by the Council of the Royal Dublin Society to announce that, in consequence of the present national emergency, and the occupation of the Society's premises at Balls Bridge by the military authorities, the Autumn Horse Show and the Art Industries Exhibition announced to be held on August 24th to 28th must be abandoned.

The Metropolitan Hospital Sunday Fund.

This Council of the Metropolitan Hospital Sunday Fund has last week under the presidency of Sir William Church. The sum of £291,457, the total of the fund for the year, was allocated in awards to 253 institutions, being less than last year. Of the total sum 4½ per cent. was appropriated to the purchase of surgical appliances and 24 per cent. for district nursing associations. Sir William Church was elected to represent the Fund on a committee which is dealing with the coordination of district nursing institutions.

Among the proposals recommended by the Committee of Distribution and approved by the Council for the year 1914 may be mentioned the following General Hospitals:—Charing Cross Hospital, £1,080; French Hospital, London, £2,250; Northern Central Hospital, £1,205; Guy's Hospital, £1,692; Hampstead and North-Western London Hospital, £712; Italian Hospital, £205; Kensington General Hospital, £570; King's College Hospital, £4,145; London Fever Hospital, £1,507; Phillips's Memorial Homoeopathic Hospital, £143; London Temperance Hospital, £608; Metropolitan Hospital, £1,707; Mildmay Homeopathic Hospital, £530; Walthamstow Hospital, £250; Miller Hospital and Royal Kent Dispensary, £54; Poplar Hospital, £537; Prince of Wales's General Hospital, £292; Royal Free Hospital, £1,276; St. George's Hospital, £2,041; SS. John and Elizabeth Hospital, £448; St. John's Hospital, £675; Lewisham, £221; St. Mary's Hospital, £1,875; St. Thomas's Hospital, £478; Seamen's Hospital Society, £1,400; The Middlesex Hospital and Convalescent Home, £2,461; St. George's; £1,830; Walthamstow, etc., Hospital, £140; Woodwharf, Bollingbrooke Hospital, £317; West Ham Hospital, £500; West London Hospital, £1,131; Westminster Hospital, £1,603.

Conjoint Board of England.


New Diplomas in Public Health.

NOTICES TO CORRESPONDENTS, &c.

Correspondents requiring a reply in this column are particularly requested to insert their names and addresses. No letter should be sent unless the action of the Committee is required, and to avoid the practice of signing themselves "Respectfully, "the name of the author shall be given. Such confusion will be spared by attention to this rule.

Original Articles or Letters intended for publication should be sent to the Editor only, and should be accompanied by the name and address of the writer, not necessarily for publication, but as an indication of identity, as the case may require.

Inquiries—Reprints of articles appearing in this Journal can be had at a reduced rate, providing authors give notice to the Editor that they do not wish to prevent the distribution of their papers. This should be done when returning proofs.

DR. CHRISTOPHER ADDISON'S APPOINTMENT.

It was announced in the Liverpool Western Mail on July 31 that Dr. Christopher Addison, M.D., has been appointed Parliamentary Secretary to the Board of Education at Westminster.

The Metropolitan Asylums Board.

It is announced that the Metropolitan Asylums Board have raised the salaries of their medical staff by £20 a year in the case of the majority, with sums ranging between £30 and £70 in the case of senior officers.

Tuberculous Milk.

In America experience has decided that one-third of the milk supply comes from tuberculous cows, in which 5% per cent. show clinical disease. The cow is a very important animal in the demand for attention and inquiry in this country. The significance of the contagion is seen, and the control of such tuberculous infected milk must be consummated, which compels local sanitary authorities to take a comprehensive line of action.

H. T. M. (Swindon).—The cause of science and particularly of research must, necessarily, receive a severe check through the war. No germ may be used, can, of course, reach those shores for some time to come.

The New "British Pharmacopoeia." The General Medical Council has announced that the publication of the new edition of the "Pharmacopoeia" has been indefinitely postponed in view of the war and other changes.

Workmen's Compensation Act, 1906.

The Home Secretary gives notice that in consequence of the deaths of Dr. C. T. Vichell, one of the Medical Referees for Carlby and Hiley County Courts, and of Dr. J. R. Robertson, Medical Referee for the Shetland District of Caithness, Orkney, and Shetland, the appointments held by them are now vacant. Applications for the posts should be addressed to the Private Secretary, Home Office, Whitehall, S.W., and should reach him not later than the 30th August, 1914.

L. S. A. (Hertford).—The use of perchloride of iron was advocated some time ago for raising the blood. It cannot be said to be superior to iodine when employed as soon as the disease is recognised, but wherever possible radiotherapy is to be preferred.

Apostles' Hall of Ireland.

Correspondents are reminded that a fresh address for the apostles' hall of Ireland, with reference to supplying temporary surgeons for the Army and Navy in the existing national emergency, the apostles' hall have decided to hold a special qualifying examination on August 19th. Inducting candidates should communicate at once with the Registrar, Apostles' Hall, 40 Mary Street, Dublin.

Foreign Correspondence.

The usual letter of our French correspondent has not reached us this week. The letter of our Austrian correspondent came to hand as we were "at press" too late for our present issue; it is held over for our next.

Vacancies.

Certificate Factory Surgeons.—The Chief Inspector of Factories announces the following vacant appointments:—Dutable (Beds.), £200 per annum. Hulme Dispensary, Dale Street, Stretford Road, Manchester.—House Surgeon, Salary £150 per annum, Applications to Honorary Medical Secretary.

Ref. E. W. Ashton, Morningside.—Assistant Physician, Salary £150 per annum, Applications, with full particulars, to the Medical Superintendent.

Lancashire Education Office.—Two Assistant School Medical Officers. Salary commencing at £200, rising to £250 per annum, Applications to the Lancashire Education Office, to the Town Clerk of Municipal boroughs. (See advert.)

Cornwall County Asylum, Bodmin.—Junior Assistant Medical Officer. Salary £150 per annum, Applications to Medical Superintendent, Cornwall County Asylum, Bodmin, (See advert.)

County Asylum, Whittingham, Preston, Lancashire.—Assistant Medical Officer. Salary £250 per annum, with board, furnished apartments, &c. Applications to the Medical Superintendent, (See advert.)

HULME DISPENSARY, DALE STREET, STRETFORD ROAD, MANCHESTER.

WANTED a HOUSE SURGEON duly registered and fully qualified. Salary £250 per annum. Annual increase of £25 per annum, Applications, with testimonials, at once to Honorary Medical Secretary.

Appointments.

DEBURY, PENNOX, L.R.C.P., L.R.C.S., I.M.R., Medical Superintendent, Royal Cornwall County Asylum, Bodmin.

GIBSON, E. W., M.C., M.C., Royal Medical and Dental Staff, Hospital for Inebriates, Banbury.

GIBSON, J. A., M.D., C.M., Medical Officer of Health of East Coast.

HINCH, CHARLES T. W., M.R.C.S., L.R.C.P.Lond., House Surgeon, Royal Dental Hospital, London.

SIME, EDWARD RICHARD EDWARDS, M.B., B.Ch., F.R.C.S., Education Officer, Royal Infirmary, Hull.

STACEY, W. G., M.R.C.S., L.R.C.P.Lond., Medical Superintendent of the State Institution for Mental Defectives at Moss Side, Liverpool.

Deaths.

ADAMS.—On August 7th, at Zürich, Switzerland, Henri Amédée, civil engineer, son of the late Louis Auguste Amédée, of Neuchâtel, to Alice Maud Dodd, M.B., B.S., eldest daughter of Arthur and Alice Dodd, of Fairlight, Redhill, Surrey.

BARKER.—On August 7th, at 51 Fourth Avenue, Hove, the wife of Roderic Arthur Clapham, M.A., M.D., of a daughter.

BELSHAW.—On July 14th, at Coimbatore, Southern India, the wife of Major Henry Belshaw, C.I.E., of Chesterton, Shropshire.

BRADLEY.—On August 1st, at 49 George Street, Portman Square, W., the wife of G. A. Aaron, M.A., M.B., M.R.C.S., of, of.

FRANKS.—On August 6th, at St. Oswin's, Upper Norwood, the wife of William Frankes, M.R.C.S., L.R.C.P., of.


Marriages.

ALLAN.—On August 20th, at Zurich, Switzerland, Henri Amédée, civil engineer, son of the late Louis Auguste Amédée, of Neuchâtel, to Alice Maud Dodd, M.B., B.S., eldest daughter of Arthur and Alice Dodd, of Fairlight, Redhill, Surrey.

BARKER.—On August 7th, at St. Peter's Church, Chichester, Captain R. E. Seymour-Swaby, M.S., second son of the Rev. R. H. Swaby, Chaplain of the 82nd (2nd South Lancashire) and 8th (Coldstream) Regiment, to Miss Sewell, of Jerusalem, and Mrs. Sewell, of Sutton Very Warmister, Wilts, to Dorothy, youngest daughter of the late William Town and Mrs. Dean, of Chichester.
To assert that disease claims a greater number of victims among armies in the field than injuries sustained in actual warfare is merely to state that which history records and past experience confirms. Since the fighting strength of troops is in direct proportion to their powers of physical endurance, the need for insisting upon the observance of the principles of military hygiene becomes paramount. We are glad to note that a memorandum upon the importance of early resort to antityphoid inoculation has recently been issued by the War Office. The risk of infection by uninfected typhoid carriers must always be reckoned with when large bodies of men are massed together in camp and are exposed to contact with the inhabitants of a country in which typhoid fever may be present. As a means of further safeguarding the health of our troops, it is understood that a new unit has been formed by the Royal Army Medical Corps, under the title of the Sanitation Corps. Consisting of one hundred trained officers and men, the new unit is to be entrusted with the special duty of testing food supplies and water, more especially with a view to the detection of poison, and they will also take charge of all sanitary arrangements. The prompt disinfection and removal of organic refuse and the adequate supply of pure food and water can best be carried out by officers specially versed in the science and art of military sanitation.

**Open-air Hospitals for the Wounded.**

Among the numerous offers of help received by the War Office in the shape of housing accommodation for the sick and wounded are many buildings such as schools, dwelling-houses, church institutes, etc. However much one may appreciate the generosity of the donors, it is obvious that the construction of many of these buildings is most ill-adapted for the reception of patients. As Professor Robert Sandlau has pointed out in a recent letter to the Times, an abundance of light and fresh air are a sine qua non in the treatment of the sick and wounded. These essentials are not always conspicuous even in modern buildings, unless they have been specially designed, while in many more ancient habitations they are so lacking as to render them wholly unsuitable receptacles for the sick. Professor Sandlau’s condemnation of the policy of “converting” buildings not intended to serve as hospitals, and his plea for a greater use of balconies and the erection of sheds in public parks, are based upon a sound recognition of the value of open-air in the treatment, not only of consumption, but also of diseases and injuries the results of war. Needless expense and damage to property may both be avoided by the putting up of temporary open-air hospitals in convenient situations. The managers of those hospitals that are fortunate enough to possess gardens or balconies attached to wards know full well their value in reducing the average length of stay of in-patients, whilst institutions deprived of these accessories to convalescence are correspondingly handicapped.

**Hospital Routine in War Time.**

Since so many of the visiting and resident staffs of the voluntary hospitals have either been called away or have offered themselves for active service with the Forces, some re-arrangement of the ordinary routine of hospital life must necessarily follow. In some cases out-patients are being discouraged, only urgent cases being received as casualties. At one large provincial infirmary the out-patients’ waiting-hall has been converted into a sick ward, the patients themselves being asked to attend at an adjacent public dispensary. As a large number of hospitals have agreed to place a certain number of their beds at the disposal of the War Office the view has been expressed in some quarters that the claims of the poor in the immediate vicinity of the institutions in question will suffer in consequence. It should be stated at once, in justice to the hospital authorities and in the interests of the public, that every possible means will be taken to prevent the infliction of any hardships upon the regular clientele, so to speak, of the civil hospitals. Under ordinary circumstances a number of incurable cases are admitted to general hospitals for short periods for teaching purposes or for the trial of some new therapeutic method. There are also certain surgical cases in which the postponement of an operation for a few weeks, or even months, will not prejudice the health of the patient. Here are two classes of cases, therefore, that need not be admitted when the exigencies of war demand bed space for the treatment of the sick and wounded in action.

**A Little Extra Squeezing of Beds.**

The Doctor’s may be legitimately allowed in an occasion of emergency such as may arise at any moment, though in times of peace any overcrowding would, of course, be justly condemned by a watchful medical superintendent. Not only in his capacity as a hospital physician or surgeon is the civilian-medical practitioner directly affected by the war. In many other ways his practice is influenced, whether this be of a consulting, cash, or panel character. At a special meeting of the South Western Branch of the British Medical Association held at Exeter the other day, the need was discussed for approaching the
military authorities with a view to the consideration of the question of locomotion for medical men, as if their horses or motor-cars were requisitioned for service medical work in certain districts would come to a standstill. We understand that the Association itself has made no move in this respect to the War Office, urging that medical practitioners’ horses and cars, especially in country districts, should not be taken by the military authorities, except as a last resource. It is of the greatest importance that all delays in providing medical assistance to sick persons should be avoided, particularly at the present time when the hands of most medical men are extra full. It is gratifying, therefore, to learn that the Army Council has issued orders to the effect that where possible the horses, and in all cases the motor-cars, of country practitioners should not be requisitioned.

SEVERAL of the Universities and other examining bodies have risen Unqualified to the occasion and have announced Help, that they are prepared to hold a special final examination to enable candidates who have completed their medical training to qualify as soon as possible, so that they can offer for active service. In all directions offers of help, free or at cost, have been announced for the dependants of Regulars or Reservists or even for the men themselves at the various general and special hospitals. It is not surprising to find that the unqualified person, seeing an opening for self-advertisement, has edged his way to the front, for in the Daily Graphic, dated August 19th, we read that a certain Mr. Frank Matthews, the well-known bone and joint specialist, offers his services to the military authorities . . . either at his surgery in Charing Cross Road or at the military bases. Mr. Matthews will hold himself in readiness to be at the command of the authorities at a moment’s notice.” Since we have failed to find the name of this enterprising gentleman in the Medical Register, we may presume that the authorities will politely ignore his offers of “assistance.” Bones and joints are too important parts of our anatomy to be trifled with, much less to be “treated” when out of gear by anyone not in possession of a registrable medical qualification. Perhaps the General Medical Council may have something to say in the matter. The camp-follower in medicine is always a person to be regarded with mistrust and to be kept at a respectful distance.

LEADING ARTICLES.

IS CANCER INFECTIOUS?

Those members of the public who have been induced to favour the Times as their daily newspaper, by its reduction in price, must have been struck by the similarity which its columns bear to another journal of the same group, under the same proprietorship. The policy of the editors of the journals concerned seems to be, that having once published an article assuming a particular position, to ensure that no opportunity is afforded the public, in their columns, of learning the other side of the question, beyond meeting the demands of immediate journalistic expediency. This policy may be considered in the trivial matters of ordinary life; even if it amuses the more discerning of the readers of the journals concerned, the public are not likely to suffer from its practice. The case, however, is very different when questions of medical importance are similarly dealt with. By this means the public are liable to be much misled; to form opinions which are erroneous, or to adopt popular notions, which are opposed to scientific teaching. In this respect, we think, the editor of the Times has been unwise in leading the readers of that journal to suppose that cancer is infectious. Some weeks ago the Times published an article dealing with the question of so-called cancer houses. The impression conveyed by that article was the scientifically absurd one that houses in which multiple cases of cancer occurred were the locales of cancer infection. Then followed the usual correspondence in support of that view, and a very few on the other side were published in which its absurdity was portrayed. In short, the editor having made himself responsible, as a layman, for the assertion that cancer was probably infectious, avoided himself of his position to maintain it, despite the evil consequences which the assumption of that belief would be liable to create in the minds of his readers. A very grievous result has now probably followed. Naturally, it has been argued, if houses can become the source of cancerous infection, why not persons who are suffering from cancer? That is to say, the effect of the dissemination of this unproved doctrine has probably already led to serious aggravation of the misery of the victims of incurable cancer who are now liable to be regarded askance and avoided as though they were suffering from some deadly infectious disease.

Until the germ of cancer has been definitely isolated, if, indeed, it be caused by a micro-organism at all, we are not in a position to say deliberately whether malignant disease be infectious or not. Recent research would appear to favour the view that there is no danger whatsoever of infection, but the public, unfortunately, will scarcely be satisfied with a mere expression of opinion, even though this emanate from a high scientific authority. Thus does a leading lay journal, in attempting to discuss matters of medical concern, become the medium of the dissemination of misconception and errors of fact the absorption of which by the public mind is calculated to be productive of an inconceivable amount of mischief. The fact that the Times should have raised the question of cancer houses at all only emphasises once again the need which exists in this country for an inquiry into the subject of cancer by a Royal Commission. The director of the Cancer Research Fund has always strenuously opposed this suggestion. He has now a concrete example of the inexpediency of his opposition. Public opinion could not avail itself against the considered and weighty report of a Royal Commission, but public opinion has been created in favour of the infectivity of cancer and cancer houses, a subject which the commission would have very properly and naturally dealt with, and nothing
THE TREATMENT OF LEG ULCER.

At a visit to the casualty, surgical, or dermatological department of any large hospital one may generally come across several cases of ulcer of the leg of all grades of severity. The treatment of these lesions always seems more or less of a reproach to medical science, for it is mostly handicapped by the fact that the patients are seldom able to rest the limb. The ambulant treatment, therefore, of an ulcerated leg, be it varicose or of an uncertain origin, presents a clinical problem which is not easy of solution. If syphilis be the cause of the ulcer the treatment is somewhat easier, for in the face of modern specific remedies few syphilitic ulcers refuse to heal. It is the large, indolent and sloughing ulcers, with evidences of deficient nutrition and impaired vitality, that sometimes prove a veritable bugbear to the practitioner. From time to time the appearance of a new drug or method which promises to promote rapid cicatrization is hailed with delight, only to fall into disuse after trial. It may be that sufficient attention is not paid to the technique of the application, especially to the preparation of the base of the ulcer first, for it is little use applying any healing agent in the presence of active suppuration. It has been said that most, if not all, ulcers of the legs will disappear after prolonged rest in bed and ordinary cleanliness, and there is a good deal of truth in the assertion. But the practitioner will seldom be able to enforce such a period of rest, for the majority of cases of ulcerated legs occurs in working folk who have to be up and about. The most he can do is to strap the ulcer, or apply a zine-gelatin-paste with bandaging of the whole limb. If he wax enthusiastic over one of the newer cell-proliferants he frequently has his ardour dampened by the complaint of the patient of the pain and irritation produced thereby. When the use of certain aniline dyes, notably scarlet red and fuchsins, came into vogue for the treatment of leg ulcer, it was thought that at last the perfect remedy had been discovered. Similarly, with the discovery of allantoin in the root of the common comfrey, our hopes were once more raised. It must be admitted, however, that the use of these remedies, intelligently applied, having due regard for individual idiosyncrasy, has constituted some advance, if slight, in the therapeutics of leg ulcer. The whole subject has been ably reviewed by Dr. A. Ravogli (a) in a paper read before the Section of Dermatology at the Sixty-Fifth Annual Session of the American Medical Association, at Atlantic City, N. J., in June last. The typical stages of ulceration are divided into those of necrosis, sloughing and repairation, and upon these periods depends the selection of the treatment. In the first stage the application of pastes is regarded as judicious, weak solutions of sodium bicarbonate or bichromate being preferred. The use of nascent oxygen, ichthyol, or boric ointment is to be preferred in the second stage, while the process of repairation must be carefully watched over, all young granulations being protected from infection and irritation, so that excessive proliferation may not occur. The practice of massage or of the division of the cutaneous nerves surrounding the ulcer, after the manner of Nussbaum, may be advisable to assist the final process of healing. At the same time, the internal treatment of associated morbid conditions cannot be dispensed with. Provided that every indication for treatment be duly recognised and suitably met, there is no reason why the treatment of chronic leg ulcer should not be placed upon a more satisfactory footing than it has hitherto been.

CURRENT TOPICS.

The Profession in Ireland and the War.

It is impossible as yet to foresee to what extent the ordinary conditions of professional life in Ireland are going to be affected by the war. Comparatively few medical men in that country are connected with the Territorial Forces, though many have promised their services to one or other of the two bodies of Volunteers. If the Volunteers are organised and taken over by the Crown the services of these gentlemen will doubtless be required. In the meantime nearly all the young qualified men in the country have offered themselves for active service, though up to the present few have been called. There is, indeed, some discontent among these young men at the fact that those who personally offered themselves at the War Office have been selected in priority to those who, in obedience to instructions, handed in their names at Dublin Castle. There is little doubt, however, that in time they will all be wanted. Their departure will inevitably cause some difficulty in the working of the hospitals, as most capable and spirited young practitioners will prefer the chance of service in the field to the comparatively hum-drum routine of a house surgeon's work. The several licensing bodies are, it is true, endeavouring to meet the unusual demand by holding special final examinations. Perhaps a more serious inconvenience to the hospitals is caused by the calling in the hospital reserves, and the volunteering for service of nurses who were not in the reserve. In another way, the sudden demand for training in first aid and home nursing work is affecting medical practitioners. Classes are being rapidly formed, and an appeal has been made by the St. John Ambulance Association to the members of the staffs of the Dublin hospitals to

assist by giving lectures in first aid, home nursing, and ambulance work. So great is the interest in such work at present that there is a danger that many persons, whether or physicians or students or surgical or nursing work, will join the classes and prove a hindrance to really effective progress. We notice that certain of the Dublin hospitals are accepting a limited number of young women for work in the wards for periods of training of a few weeks. The wisdom of such a course is open to question.

The Results of the Friedmann Treatment.

It is only within the past few months that it is possible to form an opinion of the results of the treatment of tuberculosis carried out in America by Friedmann early last year. Dr. Maimheimer, of New York, has recently (a) published a note on the present condition of eighteen patients treated under his supervision by Friedmann. The results are certainly not encouraging. In no less than seven cases abscesses developed at the site of injection. Of the entire number of patients three were lost sight of, and three are known to be dead. Of the others who are still under observation, in seven the disease progressed and in five the condition is unchanged. It is obvious that the results are not any better than might have been expected without the use of any special form of treatment. The occurrence of abscesses as the direct result of inoculation in so high a proportion of cases is distinctly disquieting, and the claim of Friedmann's that his vaccine is innocuous, judged by results, therefore, there does not seem to be any further justification for the use of Friedmann's preparation, and, as he has refused to divulge the secret of its manufacture, we are prevented from forming any opinion as to the possibility of eliminating the evil results.

The Healing Power of Nature.

Such is the mystery of human existence that the supreme efforts of art and science, combined for the relief of the physical woes of mankind, are powerless to influence the processes of disease, unless they act in accordance with or otherwise assist the operations of Nature. This mighty hidden factor is directly under observation and in certain conditions, for Nature is quick to resent any interference with her methods and plans, and she wreaks fierce vengeance, long-delayed, perhaps, but nevertheless unrelenting, upon the too self-reliant practitioner who has left her out of his reckoning. In spite of her sternness, Nature is in most cases a sure, if a slow, healer. There are those in the present day who claim loudly for "Nature study" and "Nature cures," unmindful of the fact that the most successful physicians, teachers, and philosophers are those who, consciously or unwittingly, follow Nature's principles and imitate her methods. It was a happy thought that inspired Dr. J. Arthur Thomson, K.B., the Professor of Natural History of the University of Aberdeen, to select for his "Popular Lecture" delivered at the recent annual meeting of the British Medical Association at Aberdeen the subject of the "Six Medicatrix Nature." Full of the most interesting and instructive biological allusions, Dr. Thomson's able discourse fully vindicated the propriety of delivering a scientific address to which laymen are invited as well as medical men. We all, professional men and laymen alike, and especially theformer, need to be reminded of the healing power of Nature, particularly in the way in which she ministers to our minds, only too often distracted by the wear and tear of modern civilization, by steadying and enriching our lives with beautiful impressions.

Summer Drinks.

In the summer time all men's fancies turn to thoughts of liquid refreshment. By which statement we do not mean to imply the unwholesomeness of cool imbibitions in other seasons of the year, but in the summer the call of the cup becomes insistent. Now there is a vast but often unrecognized difference between liquids and drinks. Liquids for our present purpose are the fluid essences of our physiology. Drinks are something more. They usually lack the crude ordinariness of necessity which is replaced by qualities appealing alike to our conscious senses and aesthetic attention. They may be divided into two classes, those which contain alcohol and those which are supposed not to be in this category. The first class is easily dealt with. It consists of wines, diluted spirits, and the various beers. Its qualities are familiar and its consumption immense. The second class is vaguer and more variegated. Probably one of the chief reasons for the admittedly too great consumption of alcohol is the non-existence of a non-alcoholic beverage that is worth drinking. One would think that a pleasant drink with some character and a few real qualities, which are not situated in the present day, it is the least little, glass of artificial drinks are terrible. They consist mostly of sugar and CO₂ in solution with clovey, pungent or bitter flavouring. A few sips make a full man, not a happy, satisfied man, but an aerated one with his attention centred on his distended epigastrium. It must be bad for him, but that does not affect the retailers. "Minerals," are cheap, handy, and show a large margin of profit, and the public seems to demand effervescence. CO₂ tickles its palate and temporarily increases its flow of saliva. In a short time it wants another bottle. That is why we live in a time of effervescent bibularity.

Medical Journalism in Australia.

The appearance of the first number of the Medical Journal of Australia, dated July 4th, betokens the incorporation of the Australasian Medical Gazette and the Australian Medical Journal as the one official journal of the Australian branches of the British Medical Association. Union is strength, and there can be no doubt that the result of the amalgamation of the two journals above-mentioned will be a concentration, as well as a conservation, of energy and a considerable gain to the members of the British Medical Association in Australia. Under the able editorship of Dr. H. W. Armit, who is well known in London medico-literary circles, the journal has promised well. And it need not fear that their representative journal will not faithfully reflect the progress of scientific medicine or fail to give a decisive lead in matters of medico-political importance. In the leading article of the new issue we read that "a scientific journal is not judged according to its standard of literary excellence. It is purposeful—it sets the mark of the thing—which is paramount; the form of expression is subsidiary." Only to the chosen few is it given to clothe crude scientific facts in the attractive literary garb of a Ruskin. Nevertheless, we venture to assert that the style of our medical journals, regarded as a whole, is in no wise inferior to that
of other technical periodicals. In the words of Dr. A. L. Kenny, the President of the Victorian Branch of the British Medical Association, we heartily extend to our new contemporary and to its leader the wish, "Prosper, prodeo, et regna."

Sanitary Service in War Time.

We have already called attention in these columns to the effect upon the health of the community of the rapid withdrawal of large numbers of medical men from the country. The shortage of qualified practitioners is bound to react upon the physical welfare of the public, unless special means are taken to prevent such a calamity. The Local Government Board, after due consideration of the latest developments, has just issued a circular to county councils and sanitary authorities, drawing attention to the supreme importance of maintaining the efficiency of the sanitary service of the country at the present time. It is pointed out that it is essential that there should be no relaxation of any of the activities of local authorities in the prevention and control of epidemic diseases, the protection of water supplies from contamination, the promotion of child welfare, and in the securing the wholesomeness of food supplies and the general sanitary condition of each area. On this account, therefore, it is imperative that all vacancies in the minor sanitary offices shall be filled up.

Many steps which may be open to local authorities to replace medical officers of health who are absent on naval or military duty will vary in different districts. In many areas adequate temporary arrangements may be made by co-operation between the county council and district authorities or between neighbouring district authorities. The Board will be glad to be informed of each case in which a medical officer of health or chief sanitary inspector or inspector of nuisances has been given leave of absence for naval and military service, and of the steps taken to arrange for the temporary discharge of his duties. Only in this manner can it be hoped to carry on the sanitary service of the country without any break and consequent loopholes for disease to creep in unsuspected.

Photography in Medicine.

Of all the ancillary arts and sciences that have come to the aid of medicine photography may justly be reckoned one of the most important. No record of disease can be said to be complete without a photograph depicting the morbid condition, such as the size and extent of a tumour, the facial expression, the existence of some deformity or rare configuration of surface, etc. The camera has also proved a valuable detective, as when the existence of a meases rash is revealed on the photographic plate before it has become visible to the eye. It is superfluous to mention the extreme aid that photography has rendered to surgery in conjunction with the X-rays. To be a pathological photographer, or rather a photographer of pathological objects demands a good deal of special skill. The lack of this is constantly seen when ordinary photographic artists are asked to take some interesting morbid condition of the body. The resulting print, unless special instructions have been given, generally results in the display of an abundance of clothes and background, while the interesting eruption or growth is quite small and inconspicuous. Another more recent development of the photographic art which has just begun to demonstrate its utility for illustrating morbid pathological conditions, and not a few modern medical text-books have taken advantage of the method for special plates. The Paget method appears to promise great things in the direction of the faithful reproduction in natural colours of pathological subjects. Several transparencies of cases of skin disease made by this process were in evidence in the museum at the annual meeting of the British Medical Association at Aberdeen, and they were unanimously voted a striking success.

The Shick Reaction.

The present is an age of laboratory tests and specific reactions. With the growth in our knowledge of bacteriology and serum-therapy this must inevitably be the case. One result is that the art of diagnosis is in danger of being reduced to a question of minute figures and the interpretation of the consequent reaction. The latest test of this kind is known as the "Shick reaction" in diphtheria, an account of the practical application of which is given by Drs. W. H. Park, A. Zinger, and H. M. Serotu, of the Research Laboratory, Department of Health, New York City (a). The reaction depends upon the local reaction of minute quantities of diphtheria toxin when injected intracutaneously. If antitoxin be absent or in insufficient quantity for protection, a positive reaction appears in twenty-four to forty-eight hours, consisting of a circumscribed area of redness and slight infiltration, measuring from 1 to 2 cm. in diameter. This persists for about a week and gradually fades, leaving a brownish pigmentation. To prevent the appearance of the reaction it is estimated by Shick that at least one-thirtieth of an unit of antitoxin per c.c. of blood is required, but Behring states that so small a quantity as one-hundredth part of an unit of antitoxin will protect against the disease in uncomplicated cases.

The authors tested the reaction in 700 patients, and they find that the test serves as a reliable and convenient index of the susceptibility or otherwise of individuals to diphtheria. It is also of service in the diagnosis of clinically doubtful nasal diphtheria. The Shick reaction may, therefore, be regarded as a useful adjunct to our means of detecting diphtheritic infection.

PERSONAL.

Dr. H. S. Birkett has been appointed Dean of the Medical Faculty of McGill University, Montreal.

Dr. Bethel A. Solomonos, F.R.C.P.I., has been appointed Visiting Gynaecologist to Mercer's Hospital, Dublin.

Mr. H. G. Parker, F.R.C.S.Edin., L.R.C.P.Edin., has been appointed Honorary Aural Surgeon to the Bolton Infirmary and Dispensary.

Dr. James Carrick, M.B., B.S.Glas., Assistant Medical Officer of Health for Paisley, has been appointed an Assistant Tuberculosis Officer for Sheffield.

Dr. Henry Pratt Newsomle, M.B., B.Ch.Oxon., M.R.C.P., D.P.H., at present Assistant Medical Officer of Health for the county borough of Southend, has been appointed to a like position in the Surrey county health department.

Mr. Walter Joseph Harper, L.R.C.P.Lond., M.R.C.S.Eng., of Braunton, Devon, was the recipient the other day of a suitable testimonial as a mark of esteem and affection upon the occasion of his retirement from practice in the district.

(a) Archives of Pediatrics, July, 1914.
CLINICAL LECTURE

ON

DIAGNOSTIC APHORISMS IN GYNECOLOGY. (a)

By ARTHUR E. GILES, M.D., B.Sc., F.R.C.S.,

Surgeon to the Chelsea Hospital for Women; Gynaecologist to the Prince of Wales' Hospital, Tottenham.

As "aphorism" is defined as "a concise statement of a principle in science," and this definition expresses with sufficient accuracy what I wish to convey in the present remarks. That is to say, I want to place before you in concise form some of the principles that are helpful in gynaecological diagnosis.

I must premise that the statement of a principle implies a generalisation, and a generalisation is an expression of a substantial truth combined with a fractional element of error.

Aphorisms are not free from this flaw. They are general truths containing a germ of error; in other words they formulate the general rules and probabilities, and do not take cognisance of the exceptions and possibilities.

Such aphorisms as I have to offer you are therefore intended to suggest the truth in diagnosis; but they do not claim to represent "the whole truth and nothing but the truth."

**Of Diagnosis in General.**

A few observations on diagnosis in general may be permitted. The first is that a diagnosis based on symptoms and unsupported by an examination of physical signs contravenes the fundamental principles of medical ethics; and anyone treating a patient on the strength of such a diagnosis might very well be regarded as "guilty of conduct infamous in a professional respect."

Without entering upon the merits or demerits of the Insurance Act and contract practice, I may say that if the "panel system" fosters the treatment of the poor on the basis of their symptoms and without due examination, that system is a dishonour to the medical profession.

I have seen the phrase, "We make mistakes; other people commit sins." A wrong diagnosis after due examination (a thing that happens to all of us) is a mistake, and a pardonable one; a wrong diagnosis (without due examination) is a thing that happens to the other fellows) is a sin; medically speaking, it is "the unpardonable sin."

That an examination was not allowed is no excuse for a wrong diagnosis. If you cannot convince the patient that an examination is necessary, quit the case; for it is better to lose a patient than to lose reputation. Moreover, do not treat first and examine afterwards; for then you may be called upon to treat not only the disease, but also the effects of your own treatment.

After an examination has been made, if still in doubt admit it. If you do not know enough about the case to satisfy yourself, it is not safe to assume that you know enough about it to satisfy the patient; this is not only indifferent ethics, but also bad policy. A celebrated American politician once said: "You can fool all the people some of the time, and you can fool part of the people all the time, but you cannot fool all the people all the time."

While I am giving advice I may offer this piece to the beginner: When in doubt, do not commit yourself to a diagnosis and then call in a specialist, for this may tax the specialist's ingenuity too severely.

A final word of advice may prove wholesome for the specialist as well as for the beginner. In the presence of the obvious, do not overlook the possible; it does not follow, because you have found something, that there is nothing else.

**Of Pregnancy.**

Probably more mistakes are made about pregnancy than about any other condition in gynaecology.

When a woman says that she menstruates during pregnancy, either she does not menstruate or she is not pregnant. Menstruation is a preparation for pregnancy, and when this has arrived Nature is not so fickle as to go on preparing for it.

Pregnancy can never be excluded on _a priori_ grounds of spinsterhood, widowhood, separation, social position, religious belief, political "convictions," or the alleged previous removal of organs; nor on the patient's affirmation that it is impossible.

Some women cannot be convinced that they are pregnant until they see the baby, and not always then. It is unsafe to state, on the ground of the condition of a woman's pelvic organs, that she cannot become pregnant unless you have yourself removed her uterus, ovaries and tubes, and even then it is wiser to say that it is improbable.

There are many symptoms and signs of pregnancy, and all of them can be simulated save one: the one infallible sign is to hear the fetal heart.

In doubtful cases it is to be remembered that pregnancy may be complicated by the presence of other conditions.

**Of Tumours.**

Speaking generally, during the child-bearing period, a tumour with missed monthly periods is pregnancy; a tumour with unaltered menstruation is non-uterine; a tumour with increased menstruation is a fibroid. When a woman has a large tumour, if she is very thin it is probably ovarian; if she is very fat it is probably uterine fibroid. We may vary this observation by saying that cystic tumours are associated with wasting, and solid tumours, except malignant ones, with adiposity.

A fixed tumour in a woman at or past the menopause suggests malignancy; in a young woman it suggests an inflammatory mass or an inflamed tumour.

A supposed ovarian cyst can sometimes be removed by passing a catheter, and a supposed solid tumour by giving an enema.

When a woman in her teens or early twenties has an irregular tumour suggesting fibroids, look out for pus tubes. Fibroids are rare before the age of twenty-five.

A swelling in connection with the uterine appendages may be a small ovarian cyst, tubo-ovarian inflammation or tubal pregnancy. The physical signs of the three conditions may be indistinguishable, and the diagnosis will turn on the history.

Speaking generally:—

An adnexal tumour without symptoms is ovarian.
An adnexal tumour with or following xanthorrhæa is tubo-ovarian.

An adnexal tumour with scanty haemorrhage following mixed periods is tubal pregnancy.

If a swelling is found, the probabilities are against tubo-ovarian inflammation; if it is bilateral, the probabilities are against tubal pregnancy.

It is well not to assume too readily that there is a tumour only on one side merely because none can be felt on the other.

When small, firm tumour can be felt on the left side, it is well to make a rectal examination. Such a tumour may be a carcinoma of the rectum or of the sigmoid.

With an adnexal tumour, the temperature is an indifferent guide. It may be normal with pus-tubes, and it may be raised with tubal pregnancy and with an ovarian tumour with twisted pedicle.

When symptoms and signs point to an inflammatory mass in the pelvis, the channel of infection should be sought. Infection conveyed up the unbroken genital tract leads to salpingitis, pus-tubes and peritonitis; infection carried through the broken genital tract leads to pelvic cellulitis and pelvic abscesses. When the symptoms and signs of a pelvic tumour are not classical, imperative difficulties and complications may be expected.

Of UTERINE CANCER.

When haemorrhage occurs after the menopause, with no previous history of menorrhagia, the condition must be regarded as carcinoma until the contrary is proved.

Cancer of the vaginal portion of the cervix is found only in parous women. Cancer of the body of the uterus is found nearly exclusively in nulliparae. Endo-cervical cancer is found in both, but much more often in parous women.

The treatment of uterine haemorrhage without examination at or after the menopause closely resembles manslaughter.

The scantier the haemorrhage, the greater the urgency; for profuse haemorrhage is nearly always due to simple tumours, whereas haemorrhage due to cancer is nearly always scanty, except in the late stages. Hardness of the cervix is not a sign of malignancy; friability is. Wasting and an offensive watery discharge are not essential to the diagnosis of cancer. They are rare when the disease is far advanced. When a woman has cancer of the uterus, the younger she is the worse is the prognosis.

Of EXTRA-UTERINE PREGNANCY.

A history of missed periods, followed by a brown discharge, leaves the thoughtful physician pondering on the subject of tubal pregnancy until the diagnosis is settled.

With a history of early miscarriage and no focus passed, a ruptured tubal pregnancy must be thought of.

Missed periods followed by median pains and free loss suggest uterine miscarriage; but, if followed by lateral pain and scanty loss, extra-uterine pregnancy.

When tubal pregnancy is associated with uterine haemorrhage, the tube has always ruptured or aborted, and the gravid tube and hematocele become a fixed mass. Therefore, a mobile tumour associated with uterine haemorrhage is not a tubal pregnancy.

The pregnancy may be closely simulated by a retroverted or laterally deviated gravid uterus, and by a small ovarian cyst or distended tube associated with an early impending miscarriage.

Of THE MENOPAUSE.

Normally, the menopause is no more a critical period than is puberty; the cessation of menstruation should be as uneventful as its onset, but both epochs are liable to be associated with some functional disturbance. The menopause may engender functional disorders but does not cause disease. Disease may, however, be synchronous with the menopause.

Menstrual infrequency or diminution in the flow may be functional, and attributable to the approaching menopause.

Increase in the frequency or the amount of loss is due to disease.

Increase in haemorrhage at or near the time of the menopause, or any haemorrhage at all after the menopause, renders an immediate examination necessary.

The menopause does not cure disease any more than it causes it. To tell a patient to wait for the menopause is as bad as sending her to a quack.

Of SYMPTOMATIC DISORDERS.

Dysmenorrhœa and menorrhagia are not pathological entities, but symptoms of which the cause must be ascertained.

When dyspareunia is present from the first, it is usually due to uterine stenosis or vaginitis; when it comes on later, it is usually due to tubo-ovarian disease.

When coitus is followed by haemorrhage in later life, look out for urethral caruncle, cervical polyposis, and malignant disease.

When sterility is accompanied and associated with dysmenorrhœa, it is probably due to uterine and ante-plexion; when it is associated with a history of xanthorrhœa, it is probably due to salpingitis.

When sterility is not associated with definite physical signs, the husband should be examined before the wife is treated.

When a woman complains of pelvic pains assume that there is a definite physical cause until such has been excluded.

Never call a woman neurotic when you do not know the condition of her pelvic organs.

The LAST WORD.

There is no sign or symptom that may not be fallacious. The most experienced judgment is fallible.

Note.—A Clinical Lecture by a well-known teacher appears in each number of this Journal. The lecture for next week will be by R. Oswald Moon, M.D., Oxon., F.R.C.P.Lond., Consulting Physician to the Western General Dispensary, Marylebone; Physician to the Hospital for Diseases of the Chest. Subject: "Mitral Stenosis, its Prognosis and Treatment."

ORIGINAL PAPERS.

ACUTE GENERALISED INFECTIVE PARALYSES IN ADULTS.

By W. B. Warrington, M.D., F.R.C.P., Hon. Assistant Physician, Royal Infirmary; Examiner in Medicine, The University of London; late Physician to the Northern Hospital, Liverpool.

Every now and then we are confronted in practice by cases of rapid and widespread paralysis the extent of which is so great as to cause much alarm, sometimes justifiable. No obvious cause is, as a rule, to be discerned. Although paralyses of this acute nature present marked similarity, yet that they are of a different pathology is proved by the course of the disease and the marked difference in prognosis. Several acute diseases may attack the nervous axis and its peripheral nerves and bring about an extensive paralysis: (a)

(i) Acute toxic polynicræ—cause agent is rarely recognisable, and few opportunities have occurred for a study of the anatomical basis.
Acute poliomyelitis—doubtless due to the same infective organism which causes the ordinary form of infantile paralysis, and characterized by the same pathological lesions.

Electrical examination—a disease the nosological position of which has been much discussed, but which, in the writer’s view, is certainly a distinct clinical and probably an equally distinct pathological entity. The importance of a diagnosis is obvious when it is stated that in acute toxic polyneuritis the terminations begin abruptly; complete recovery by Landry’s paralysis the event is either rapid death or complete recovery; whilst in poliomyelitis a fatal result is rare but some permanent damage usually remains.

I shall give a typical illustration of these several types, and also add an account of a case of acute ascending myelitis, which, although comparable was a very acute and terrible course, yet if its symptoms are known can hardly be confounded with the other forms. A particular feature of interest attached to this case is that the evidence seems to show that it was due to the organism of mumps, certainly a most rare sequela, though this disease sometimes has cerebral and meningeal complications.

Acute toxic polyneuritis.—Thomas J. was a young man of twenty-two years of age. He was a total abstainer and of previous good health. The only antecedent of any importance which could be discovered was that for the last few months he had constantly been wet through.

His chief trouble was headache, vomiting, and paraesthesia of tingling and numbness in the feet and hands. It is not known whether he was feverish; the course of the disease during the time he was under observation was afebrile. Weakness soon appeared in the legs, and in a week he was unable to stand. If he were supported and attempted to walk, he moved his limbs about in a wild and vacillating manner. On examination of the muscular power, both lower limbs were greatly affected, but the distal parts much more so than the proximal segments, so that, whilst he could barely move his feet or toes, there was some power in the knee-joint and even more in the hip. Slight wasting in the front of the leg was evident at first. The appreciation of loss of power was found to be present in the upper limbs: the small muscles of the hand were distinctly wasted, the grasp and movements of the interossei weak, whilst the larger elbow and shoulder joints retained a fair amount of power.

The cranial nerves also shared in the paralysis; the lower part of the face on the left side and the left vocal cord were obviously weakened in their movements. The remaining cranial nerves were normal; and at the time he was first seen the thorax, abdominal muscles, and the diaphragm were acting well. There, was no affection of the sphincters.

Electrical testing showed distinct diminution, though not an absence of, faradic excitability in the weakened muscles.

A striking feature was the muscular hyperesthesia, but we were not able to detect any loss of cutaneous sensation or inability to appreciate passive movement. All the deep reflexes were absent, but the abdominal, cremasteric, and plantar reflexes were present. A slow but uneventful progress to complete recovery took place.

The diagnosis was not difficult, but, before commenting on this case, I will relate an example of generalised paralysis which I have recently met, and am still in some doubt whether we have to deal with polyneuritis or poliomyelitis.

Mr. W., a patient of Dr. Sélater, aged twenty-six years, was quite well on the day previous to the onset of this illness, which began with a feeling of weakness and feebleness, vomiting, slight fever, and a dry patch on the knick of his throat. At the end of a week double vision appeared, but this only lasted for a few days. This symptom came on before any signs of paralysis. Then the left leg became weak, and, the loss of power rapidly invading all four limbs, he was not able to sit up or move at all, and there was "twitching" all over the body.

There was no difficulty in swallowing, nor any other affection of the cranial nerves. There was a slight hesitancy in passing water, but no other bladder trouble. Pains in the thighs were marked, and there was a great tenderness of these muscles. No tingling of the feet or fingers was evident, and he apparently began to improve rapidly.

About three weeks later, in the right upper limb there was distinct atrophy of the first dorsal incosseous muscle, though this and the other small muscles of the hand could be moved, but the second or third fingers could not be extended. The deltoid was very feeble, but all the other muscles showed some, though diminished, power. In the left upper limb the deltoid was powerless, but all the other muscles, including the small muscles of the hand, could be moved. The right lower limb had recovered and could be lifted from off the bed, and he could extend the toes, although the paralysis was more marked in the feet than in the muscles of the thigh. In the left lower limb the loss of power was extreme, and only very slight movement was possible in the knee-joint and hip-joint, and there was nearly as much power present in the extensors of the feet. There was no loss of sensation either superficial or deep. The diaphragm and thorax were acting well. The ankle-jerks and the knee-jerks were gone; the planter response was feeble, but the abdominal and the epigastric reflexes were brisk. Electrical testing showed that all the muscles of the upper limbs reacted to faradism. The right deltoid gave a very feeble response, and with the right trieps the response was just barely perceptible. The left deltoid responded feebly, but the triceps, latissimus dorsi and pectoralis acted fairly well. All the muscles of the right lower limb acted to a strong current, but the only muscle excitable in the left lower limb was the quadriceps.

From personal experience and the studies of Dr. Farquhar Buzzard, the following are the points on which one mainly relies in making a diagnosis:

<table>
<thead>
<tr>
<th>Toxic Polyneuritis</th>
<th>Poliomyelitis</th>
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<tr>
<td>Onset</td>
<td>Quick, but not sudden, malaise, fever.</td>
</tr>
<tr>
<td>Extent of paralysis</td>
<td>Limbs and especially their peripheral parts most affected, trunk may be invaded, and direct marked incision of the skin is possible.</td>
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<tr>
<td>Cranial nerves</td>
<td>Face most commonly affected, sometimes vocal cord, palate, oesophagus nerves.</td>
</tr>
<tr>
<td>Sensory</td>
<td>Muscular hyperesthesia, sometimes in the face, and slight objective loss of sensation.</td>
</tr>
<tr>
<td>Superficial reflex</td>
<td>Usually lost or diminished.</td>
</tr>
<tr>
<td>Electrical reaction</td>
<td>Usually lost or diminished.</td>
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Mr. W. was a typical case of "papilledema."
It has been my fortune to see two cases of Landry's paralysis with complete recovery. If the opportunity occurs to watch this paralysis from its inception, I do not think its diagnosis presents great difficulties.

The steady march upwards, segment by segment, the paralysis of the abdomen and thorax, and then of the diaphragm, which may cause the fatal termination; or, if this is escaped as it were by a hair's-breadth, from some remaining excitability of the respiratory muscles, the progress of the disease to attack the centres in the medulla, again threatening life, makes the typical disease at least a striking and dramatic picture.

The first case that I relate I saw with Dr. Shaw a number of years ago. M. was a young man of 20 years of age, who had suffered an illness, supposed to be influenza, some two weeks previously, which compelled him to stay in bed for about ten days. He then went back to his work, and on the Wednesday; suffered from pains in his legs, of a dull, aching character, and accompanied of a feeling of numbness and tingling in the feet and in the fingers. He was seen by me on the Sunday, four days later, and was then lying helplessly in bed. The lower limbs were greatly paralysed, so that he could not lift them from off the bed; there was practically no movement in the psoas-isiacus group and barely perceptible power of abduction and adduction of the thigh muscles. There was the typical power to movement in the upper limbs, and he was able to make very slight movement of the ankle-join; the calf muscles appeared to be weaker than the extensor.

In the upper limbs the shoulder girdle muscles were markedly affected, and also the muscular movement of the elbow-joint. The wrist and the fingers were also parietal, but the loss of power was not so great as in the larger muscles of the abdomen, and the diaphragm moved well. The optic discs were normal, and there was no objective disturbance of sensation. Knee-jerks and ankle-jerks were absent, and also the plantar and epi-gastric reflexes. All the paralysed muscles acted strongly to faradism.

On Tuesday the patient was worse, and with the exception that he could extend the toes, the lower limbs were absolutely paralysed. The weakness had also progressed in the upper limbs, so that now he could not make any movement with the fingers or wrist; and although the loss of power in the shoulder girdle remained very great, the weakness did not seem to have progressed as much in the muscles moving the wrist and fingers. The thorax barely moved in respiration, and the diaphragmatic contraction was feeble.

The cranial nerves were now affected, and there was complete left-sided paralysis of the face and of the palate. The speech was slow, drawn, and monotonous, but there was no difficulty in swallowing.

The optic discs and eye muscles were normal. All the muscles still reacted to faradism.

On Thursday the absolute powerlessness of all the four limbs continued, the patient's face was still paralysed, and there was now difficulty in swallowing. The speech had somewhat improved, but the thorax showed some signs of expansion, and the diaphragm was also acting a little. The pulse was about 100, and the temperature raised a degree or so. There was no trouble with the sphincters, and the patient's mind was quite clear. Gradual recovery occurred and was complete.

The second case was very similar; my patient was a young man, aged 26, who a few days before he came under observation complained of stiffness and unsteadiness about his feet, and a day or two later of a difficulty in using his arms.

When I saw him, about a week after the onset, the lower limbs were paralysed, and flaccid; all he could do was to feebly flex the thigh; the reflexes were absent, but sensation and electrical irritability remained. I found the abdominal and thoracic muscles and the diaphragm to be acting well. The upper limbs were also greatly paralysed. The muscles which move the wrist and fingers and the elbow-joint were practically powerless, and there was very little power in the small muscles of the hands. Above this level the muscles of the head, shoulder, and neck acted well.

He remained in this state for a week; then the paralysis advanced, the intercostals and abdominal muscles being paralysed, so that breathing was almost entirely by the diaphragm. The muscles of the neck became weakened, the sterno-mastoids were almost powerless, the face on the left side was paralysed, and the larynx barely moved with phonation or in swallowing.

At this stage the patient could not make the slightest effort to sit up or flex his head; dia-phragmatic respiration appeared the minimum, dyspnoe became pronounced, respiration appeared almost to depend on the activity of the trapezius and the pectoral muscles.

Next the right side of the face became paralysed, and one felt that the slightest further spread of the disease must be fatal.

After another week in this precarious state the intercostals began to expand the thorax, and power in the diaphragm returned, the face regained tone; then the muscles of the shoulders, the arms and hands; next the legs, the neck muscles, and the back muscles began to recover. Improvement continued, so that in five weeks, from being in a most desperate condition, the patient was able to sit up. Power rapidly returned, and in another week he could walk with a little help, whilst in a fortnight he was convalescent. Throughout the disease there was no atrophy of the muscles, no loss of sensation, no alteration in the electrical reactions, and no affection of the bladder.

The diagnosis of Landry's paralysis, if the case can be watched for a day or two, may perhaps be so difficult. At the onset the pain and constitutional disturbance are less than in either toxic poliomyelitis or poliomyelitis. The electrical reactions are of great importance.

Landry's paralysis is often fatal, and it has long been known that in these cases the muscles were excitable to the end.

My two cases show that this capacity for response continues, and at once forms a certain diagnostic point in distinction from poliomyelitis and almost so from toxic poliureutis.

In conclusion, I relate the case of acute ascending myelitis, at once distinguished by the gross loss of sensation and the affection of the sphincters. My patient was a young man, aged 15, who, with brother, some ten days previously, bilateral parotitis, diagnosed, no doubt correctly, as mumps. On the Friday she complained of pain at the back of the neck, was up and walked on the following day, but had eventually to give up on account of the pains. On Sunday the pains were worse, especially on movement, and on Monday weakness in the legs and numbness set in. On Tuesday night the temperature rose to 101°, and she was slightly delirious. I saw her on the Wednesday, and she was lying in bed with her head kept to the left. She was moving restless, with clouded mind, but there was no obvious paralysis of deglutition or articulation, though she spoke with difficulty, the
words lacking their normal volume, and she said that it seemed to her as if the food stuck on the back of her throat.

There was nystagmus in all directions, of long range and slow rhythm. The optic discs were normal. There was complete flaccid paralysis, with absent reflexes of the sphincter and relex was absent. The bladder was distended and dribbled.

The thorax was paralysed, but the muscles of the shoulder girdle supplied by the upper cervical roots and the diaphragm were acting well.

There was total anaesthesia on the right side up to the fifth dorsal segment, and on the left as far as the first lumbar segment. Above this, diminished sensation as high as the neck-body line—i.e., to the level of the second dorsal—and this loss of sensation could be traced along the inner border of the upper limbs. There was obviously, therefore, an affection of the spinal cord reaching up to, but not involving, the fifth or sixth cervical segment. In the upper limbs there was great paralysis, especially in the fingers and the small muscles of the hand. The muscles supplied by fifth and sixth roots acted fairly well.

A week later the patient was obviously much worse; the face was cyanosed, little air was entering the lungs, and bubbling rales were heard. The thorax and abdomen were completely paralysed, the respiratory function was maintained by the feeble action of the diaphragm. The girl was wandering, the disease had spread into the higher part of the cervical enlargement, and anaesthesia had become almost absolute. Death occurred two days later.

TWO CASES ILLUSTRATING THE USE OF THE DIURETIC THEOCIN-SODIUM-ACETATE.

By CHARLES PEDDIE, M.A., A.MED., M.R.C.P.

Medical Officer for the Brindley District, and Certifying Factory Surgeon, Chorley, Lancs.

Before beginning the description of the cases I may say that I have always employed the following formula:

R. Theocin-sodium-acetate, gr. 80
Tr. Digitalis, dr. iss
Tr. Sella, dr. iiij
Casc. Evacuant., dr. 1
Acq. oz. ad. viij
Sig.—A tablespoonful every four hours until further orders.

The tinctures I have prepared from Parke, Davis & Co's. fluid extracts made up to the proper strength with glycerine and chloroform water. In this way the use of alcohol, undesirable in kidney cases, is easily avoided. The preparation of fresh infusions advised by some writers is impossible for the busy practitioner and I have never had any cause to complain of the digitalis prepared as above.

Case 1.—Male, 47.—This patient had been under the care of another medical practitioner for four months during which time instead of improving he gradually got worse. When I saw him first in February, 1911, there was extensive oedema of the lower extremities and a fair amount of ascites. He was also very much troubled with "dry bearing" as well as almost continuous belching of wind, a symptom very common in heart cases, and causing only momentary relief (this is a purely nervous condition, its cause is obscure and may be insufficient blood supply to the stomach) and also suffered from insomnia, which was exceedingly difficult to relieve. The urine was loaded with albumen.

The first point of attack was the heaving and collecting of wind in the stomach, and this I was able to influence by hypnotic suggestion, the insomnia being also relieved by the same means. The suggestions were renewed twice a week for about three weeks and then discontinued. I prescribed the theocin-sodium-acetate mixture for him with remarkable results; the pain dropped entirely disappeared within a fortnight's time, and the albumen was very rapidly, His intake of fluids was limited in order to assist the absorption as well as the elimination of fluids from the tissues. The biliary attacks and the blood pressure symptoms were treated as they arose.

The dietary prescribed was as follows:—

Breakfast, 8.30.—An egg lightly boiled, poached, or fried in bacon fat, with a little toast well buttered when cold. (I have found it an advantage in the preparation of toast to have it dried first in the oven before toasting in order to ensure its being crisp).

Dinner, 5 p.m.—Fish, fowl or chop with green vegetables cooked with plenty of butter.

Tea, 5 p.m.—A little China or decaffeinated tea.

Supper.—Repetition of dinner with the exception that it was varied—if he had fish at mid-day he would get a chop or fowl in the evening etc.

He was a life-long teetotaller and a tablespoonful of brandy was prescribed with a little hot water, before he settled down for the night. It should be noted that he had very little milk, and practically a saltless diet.

In the end I was rewarded by his complete recovery in about five months.

He resumed work in the beginning of July and from that time until his death on October 21st, 1913, he never lost a day's work, even though he was kept at it from 6 a.m. until 6 p.m., without the chance of getting home for his meals. He did lose 3 hours' work about 3 weeks after commencing, but this was due to a bilious attack, brought on by a six-mile walk on Saturday, in a boiling sun. He thus remained perfectly well for 2 years and 4 months. On Monday, the 20th October, 1913, he returned from work, complaining of a slight pain in the chest and feeling a little out of sorts. On retiring, the pain gradually got worse, and about 7 a.m. I was telephoned for, but on arrival found that death had ensued from heart failure.

Case 2.—Male, 57.—In November of 1912 a patient consulted me, complaining of shortness of breath and inability to get through his work with the wonted ease. On examination I found nothing organically wrong, but the patient was exceedingly stout and had been overworked, and I believe the heart action had been interfered with on account of the fat. There was no trace of albumen or sugar in the urine. I prescribed a heart tonic combined with a mild diaphoretic, and strongly advised a holiday, which, however, he was unable to take.

I did not see him again for nearly a year, and heard that he was being attended by another practitioner. I was informed that on September 18th, 1913, he was sent to see a specialist in Liverpool who gave the prognosis that with rest and careful dietary he would get perfectly well. On October 1st, I was asked to take the case, which had been given up as hopeless by the bowen towns acting for his usual attendant. When I saw him he was in a semi-comatose condition, fighting for breath, the pulse rate being 136. He had oedema of the lower extremities and great scrotal swelling.
LIME SALTS IN CHILDREN'S DISEASES. (o)

By J. C. McWALTER, M.A., M.D., F.F.P., and S.

All diseased children have deficient lime in their tissues, and a smaller proportion of calcium in their bones. All weak animals have less lime in the osseous framework than their healthy brethren. At once it seems sound sense and rational therapy to give some sort of lime to a delicate child, but so soon as we do we encounter the pharmacologist who assures us that our labour is in vain, and our attempt but a proof of our ignorance. We are assured, in fact, that all these efforts to introduce lime into the system are futile, and that none of it is retained—that normally, in fact, it passes out unchanged.

Two or three incidents have lately tended to resurrect the faith of the profession in the efficacy of lime salts. One is the marvellous influence which the administration of thyroid substance has in certain developmental diseases of infancy. Coincident with these observed good results comes a theory that hypothyroidism results in an excretion, or at best the inability to absorb in the salts containing the necessary salts—as chloride of sodium, phosphate of lime, etc. We have then staring us in the face the broad fact that metabolism is impossible without calcium, that the simplest tissues hunger for it, and are rendered powerless to function or to grow without it, and the defective growth, as well as all diseased conditions, are associated with a deficiency of calcium compounds. There is the further important fact of which the French school attach great importance—namely, that tuberculosis is, chemically, a decaying process, that its essential manifestation is an exaggerated excretion of calcic and other salts, and that in the face of deficient tissue supplies, have be in increasing the intake of suitable mineral salts, mostly calcie.

If lime salts do good, how shall we give them? Lime water is an old and favourite remedy, but the pharmacologists tell us that it only acts as a simple alkali, and represents nothing more than a dilution of the salt, which brings about a more rapid dilution of the urine and reduces the amount of lime in the body. The mothers of families, seems to prove a real influence in lime water in modifying intestinal and stomachic disorders, which certainly is not exhibited by a weak solution of potash or soda.

Lime water, we shall agree, is useful, but the half grain or so of lime which it contains per ounce is certainly a weakly way of giving a calcium salt. Much more useful is a solution, now almost gone out of use, the saccharated solution of lime, which contains about 14 times as much lime as lime water. Children who in their earlier years are probably given some suitable salt of lime, are liable to the disease of deciduous teeth, to hemorrhage if the Eisen temperature system is broken down, to tuberculosis affections, especially of the bones, than those whose lime content is subnormal. Fixity of tissue is the result of sufficient lime content in the organism. The bones are hard, wiry-like; the teeth are strong; there is no tendency to fluxes, whether of the intestinal tract, the mucous membranes, or from the nascent system.

A very suitable way to give calcium is in the form of powder—carbonate of calcium and precipitated phosphate of calcium. They can be mixed with sugar or sugar of milk, and may be given at much less about half-hour or doses twice or thrice daily, blended with a little milk.

The pharmacologists will assure us that these salts are perfectly inert, and pass out unchanged. Possibly this may be true of 0.5 per cent. of the salt—if all remained in the organism doubly so. Retention would give rise to the formation of insoluble salts, to hemmorhage if the Eisen temperature is broken down, to tuberculosis affections, especially of the bones, than those whose lime content is subnormal. Fixity of tissue is the result of sufficient lime content in the organism. The bones are hard, wiry-like; the teeth are strong; there is no tendency to fluxes, whether of the intestinal tract, the mucous membranes, or from the nascent system.
THE CHOICE OF THE METHOD OF OPERATION IN THE TREATMENT OF GASTRIC AND DUODENAL ULCER, WITH A REVIEW OF MY EXPERIENCE ACCUMULATED IN THE LAST TEN YEARS. (a)

BY PROF. FREIH. VON EISELSBERG, M.D.,
Vienna.

In spite of all the progress in the diagnostics of gastro-intestinal diseases, amongst which 1 place Rontgen photography amongst, the choice of the method of operation in gastric ulcer and its complications can best be made at the autopsy in vivo when the abdominal cavity is opened.

It is most important that the operator should satisfy himself whether there is an ulcer on the surface or a healed ulcer—in fact a scar—and whether the ulcer is situated at the pylorus or at a distance from it. When in possession of these facts he is in a position to decide which operation is to be recommended, whether gastro-enterostomy only, or pylorus exclusion, or, lastly, a resection.

The operations for the acute and chronic conditions met with in gastric ulcer are amongst the finest achievements of modern surgery.

That the operation of the straitifying one is justified and justly fills the surgeon with pride and satisfaction will be confessed by anyone who has witnessed how a patient with an acute perforation of a gastric ulcer is rescued from the deathbed on which he was found by laparotomy, irrigation of the peritoneal cavity and incision of the ulcer.

Or, again, how a patient with a chronic pyloric stricture is relieved of his chronic illness and weakness and converted into a healthy and flourishing human being.

Gastro-enterostomy especially has come to be considered as an operation most frequently attended with beneficial results, and today there is no operation so often done in the gastro-intestinal canal—excepting, of course, surgical treatment of ulcers—whether we use the method as an universal method of treatment in all cases of ulcerated processes of the stomach, where it is possible to do it.

But the happy results of gastro-enterostomy just now mentioned are not evident in all cases. In cases of persistent ulcer particularly its cures are not so numerous as in the cases of ulcers already healed. In cases when the ulceration is at a distance from the pylorus, the results of gastro-enterostomy is not so good as in cases when the ulceration is situated at the pylorus. To my pupil, Claimont, especially is due the credit of having shown this.

And, finally, one must always bear in mind that peptic ulcer is not merely a matter of the underlying cause but that tumour formation, in which cases obviously only removal is efficient, while a gastro-enterostomy can have, at most, a palliative value.

In consideration of the fact that gastro-enterostomy has become so usual in the treatment of gastric ulcers, it behoves us to look very carefully into its merits.

My deductions will be particularly directed to this question: the value of gastro-enterostomy as compared with other operations for gastric ulcer; and especially will I define the position of the stomach.

My former pupil, Prof. Claimont, has helped me very considerably in the collecting and arranging of this great mass of material. He will shortly publish a large work going with our united experiences in the department of the operative treatment of gastric ulcer. Out of a total of 334 operations of gastro-enterostomy for gastric ulcer, 17 died after the operation (in 12 of these cases the ulceration was on the pylorus; number 8 died from causes referable to the ulcer itself for instance haemorrhage from the ulcer, progressive ulceration). Thus it will be seen that gastro-enterostomy in some cases not only did not stop the haemorrhage, but apparently induced it.

Of the 32 "unrelieved" cases in 8 the ulcer was situated at the pylorus; in 11 the ulcer was situated at a distance from the pylorus; 8 were duodenal ulcers: in 4 the situation of the ulcer was not known; there were adhesions, and probably it was a question of duodenal ulcers in these cases—total, 31.

The interesting point is demonstrated: that ulcers situated at a distance from the pylorus (Pylorunfen) are, by a long way, not so much influenced by gastro-enterostomy as those situated at the pylorus.

Standing at the head of the causes which are responsible for this failure of the operation to cure is the development of a post-operation—peptic ulcer of the jejunum.

This occurred 7 times in 334 gastro-enterostomies. Of this formidable complication after gastro-enterostomy I will speak fully later on. Finally, with regard to the cases shown under the heading "died at a later period," only a limited number of causes of death are known.

(i) 13 patients died of cancer of the stomach (or about 10 per cent.).

(ii) In 6 cases continuance of the growth and development of the ulcer after the operation was the cause of death: (a) 1 patient developed the morphia habit through the pain he suffered and died; (b) 1 haemorrhage caused death; (c) 1 death followed perforation of the ulcer; (d) 1 patient suffered pain and haemorrhage—jejunostomy was performed, but the patient committed suicide; (e) in 1 case the pains continued, but further details are unknown.

(iii) 3 patients died of tuberculosic of the lungs.

(iv) 1 patient died of acute cholecystitis.

(v) The cause of death in the remainder of the patients is unknown.

We see, therefore, that of 41 patients who died a long time—more than 17 years—after the operation of gastro-enterostomy, 13 (that is, nearly one-third) died of carcinoma, whilst 6 died through the progressive continuance of the symptoms of the ulcer.

In 36 cases of ulcerative processes of the stomach and duodenum these ulcers were of ulcerative type and pylorus exclusion was performed. This operation was in some instances done in the case of still ulcerated and bleeding ulcers in the neighbourhood of the pylorus, and in some instances cases of ulcers localised in the duodenum, for which situation pylorus exclusion appears to be especially suitable. Twelve operations were performed during 1911; the interval after operation is too short.

Eleven patients made a complete recovery after the operation. Some of these belong to the years 1905 and 1906.

Under the heading "improved" are included even cases complaining of insignificant symptoms. They might show most of them under the heading "cured.

Of the 4 cases which were "unrelieved" it is to be noted:

(i) In one case the extirpation of the whole ulcer was done for continuance of the pains, with the result that a cure followed.

(ii) One patient still suffers from attacks of haemorrhage.

(iii) Two patients developed symptoms of peptic ulcers.

Finally 3 cases died at a later date, about whom the following is to be noted:

(i) One case developed cancer of the stomach.

(ii) Two patients developed peptic ulcer.

SOME REMARKS ON PEPTIC ULCER.

As the topic of the development of peptic ulcer again occurs before me, I should like to go into the subject with more details, especially as it seems to me that the knowledge of peptic ulcer of jejunum is not so general as it deserves to be.

As H. Braun of Göttingen, the discoverer of this serious complication of gastro-enterostomy, has already pointed out, peptic ulcer appears to be caused by the continuous passage of the acid gastric juice into the small intestine (duodenum), causing the mucous membrane to be eroded and giving rise to the growth of an ulcer of the same size in varying intensities. In the less severe degrees symptoms taking the form of simple pains, such as an ulcer usually causes, can occur. In such a case—as in all

operative processes—repair on the part of the organism can bring about a cure. In these cases of spontaneous cure the contracting structure and stricture of the gastro-enterostomy wound area seems to take place very easily. I cannot explain in any other way what I have already observed. In other cases, however, the Kehr described case of Vienna—namely, the *shrinkage* of the gastro-enterostomy fistula, which I made of normal size to one-third of its size without any appreciable induration occurring, is the only case of this kind to which I can compare the above-mentioned case of Kehr. In other cases the fistula itself spares width, and with the serious and tragical issues of this we have hitherto to deal to-day.

I have observed the formation of a peptic ulcer 7 times in 317 gastro-enterostomies. Added to this I have found 10 peptic ulcers by other surgeons and on whom I myself did a relaparotomy, so that in all 12 patients a peptic ulcer was verified at the autopsy in vivo. Finally came 4 patients in addition in whom by the aid of a peptic ulcer followed unilateral pylorus exclusion. In these 17 cases the chief symptom was the development of a very painful in duration in the neighborhood of the gastro-enterostomy fistula, the discomfort and pain becoming so great that not a single person could eat or drink. In these cases the diagnosis of peptic ulcer was verified by the subsequent relaparotomy. Two patients were not operated on. Either another gastro-enterostomy, jejunostomy or finally an excision of the whole ulcer was carried out. In these 2 cases more than one of these operations was done either on one occasion or in several stages.

My table of the cases in which peptic ulcer developed shows that in six patients a fresh gastro-enterostomy was done, which was relaparotomized, but the ulcer itself was otherwise not touched. Only one of these patients was substantially improved after an interval of 6 months. One was unrelieved, one was lost. Two others died, one of the two fatal cases dying immediately after the operation. In the other the resection of the pyloric stump and the other later from the relapse of the ulcer.

In one patient, as the gastro-enterostomy did not give the hoped for relief, jejunostomy was done in addition, and in this case the stomach was entirely placed out of action. Here, on the contrary, the laparotomy was done on July 27th, 1912, when an ulcer was found in the duodenum, for which unilateral pylorus exclusion was done. After operation the acidity did not diminish—anyhow, not so much as usual—and hemorrhage kept occurring. October 16th another relaparotomy was done and a very large peptic ulcer was found, which seemed to be non-operative. A jejunostomy was now done, and a completely satisfactory improvement took place. The patient believed himself nearly well the second. I in turn urgently wished to dispense with the catheter. Unfortunately we yielded to the very strongly expressed wish—alas! all too soon. The catheter was left out, and the fistula had spontaneously closed on January 27th, 1913, 5 months after the relaparotomy. This case is very high, and the patient appeared to me to be lost. This man had too high an amount of hydrochloric acid, and one should not have dispensed with the jejunostomy so soon. Maybe one could still treat him successfully with adrenalin injection. In the present case, a female patient we obtained a favorable result with jejunostomy alone. A girl, at 27 (who in her seventh year had been successfully operated on by Billroth for hydatid of the liver), had pains in the stomach, moderate losses of blood and the constitutional symptoms of stenosis of the stomach. June 7th, 1910, gastro-enterostomy retro-colica posterior was done. Soon after the commencement of a good recovery a hard tumor in the abdomen developed, attached to the jejunum and extended to the wall. Suspecting a peptic ulcer, relaparotomy was done, and the suspicion proved to be correct. In consideration of the extension of the tumor, and the fact that it was intimately connected with surrounding parts, an ulcero-jejunostomy was done. It was done nearly three months after the first operation.

The patient for three years was given all her food by the fistula, and the tumor disappeared entirely, so that one was able to feed her from above and allow the fistula three or four times in the day. Simple removal of the catheter was sufficient, and the patient has now been quite cured for 2 years. This case illustrates the success of jejunostomy.

In the case of another patient with gastro-enterostomy and jejunostomy, one operation was done on the same day. This operation had been done upon September 25th, 1909, for a very high general acidity combined with an unhealed ulcer which extended into the duodenum; a unilateral pylorus exclusion was done. No improvement occurred, and the patient was relaparotomized on January 22nd, 1910, and a peptic ulcer found situated at the place of the gastro-enterostomy. Therefore a new gastro-enterostomy anticoelia anterior, plus entero-anastomosis, was done, and a jejunostomy as well was done. The patient died with symptoms of hematemesis. At the post-mortem five recent ulcers were found distal to the jejunum stump; one of the ulcers was on the point of perforation. The base of the old gastro-enterostomy was an annular ulcer, which appeared to be turning into a gastro-colica fistula.

In two cases first gastro-enterostomy and then the resection of the peptic ulcer was done. One patient had to be operated on 4 times, a gastro-enterostomy anticoelia anterior plus entero-anastomosis were done. One month’s relief from symptoms followed, then stomach trouble again occurred and the development of a tumor in the neighborhood of the whole ulcer. In the neighborhood of the ulcer, on June 17th, 1911, a second relaparotomy was done, the ulcer peptic was resected widely, the incisions passing through the quite normal tissue, and a fresh gasstro-enterostomy anticoelia anterior entero-anastomosis made. There followed an improvement lasting only a short time, and stomach trouble again set in, and on November 30th, 1911, the patient died with symptoms of a gastro-colica fistula.

Finally in three cases resection of the whole ulcer was performed. Of course, at the same time a fresh gastro-enterostomy fistula was established. This was necessary because we could not make a direct suture of the wound of the fistula.

In the case of the patient with a fresh gastro-enterostomy retro-colica posterior anastomosis was applied after resection of the peptic ulcer, whereas upon there was at last improvement. In the case of the second patient the subsequent history was lost sight of. One patient died after this resection. In this case the growth of a peptic ulcer of the jejunum presents a very serious complication; even repeated operations where really severe measures are employed are useless, and patients have succumbed to their peptic ulcer at last. Other authors have also repeated radical measures are necessary. Of these authors I mention v. Haberer, of the Innbruck clinic.

If we inquire into the causes of these ulcerous ulcers with hydrochloric acid value of the ulcer, it must be mentioned before. In some cases the patient had vascul
lar disease, either an arthritis and enteritis or a periarthritis.

It is observed this formidable complication of peptic ulcer in a surprisingly large number of cases and I cannot tell why I should have met with it more frequently than other surgeons. I should not like to say how much technique has to do with it. Peptic ulcers appear to me to be more frequent during the last years, and I am inclined to attribute its frequency to the fact that open or unhealed ulcers are operated on more frequently than before.

It is certain that many ulcers which are known to cause much tumorous formation and severe symptoms have led surgeons to think that cancer was present, and so the question of further operations has been laid aside.

Care must in the after treatment of cases possibly go far in the prevention of the development of peptic ulcer. For peptic ulcer which has already declared itself a total excision is the best treatment.

A short time ago I operated on just such a case, on which the primary gastro-enterostomy was performed elsewhere—an exceptionally difficult one, where the whole peptic ulcer together with the loop was excised.

I made the blind suture of both openings of the jejunum, and then the implantation of the distal one with a long loop of the stomach to the distal one. So far the progress of the cure has been rather satisfactory.

What I wish to emphasise is that whenever possible the patient must be excised, and that we make no experience neither gastro-enterostomy nor jejunostomy are sufficient in themselves, and in many cases both operations combined are of no avail.

We have already mentioned among the cases five patients on whom the first gastro-enterostomy operation was performed by other surgeons. I am therefore somewhat sceptical when I hear from other surgeons that they have never met with a peptic ulcer.

Cases in which Excision of the Ulcer was Done.

In the nine cases of death after operation the following proved to be the cases:

(a) Six times post-operative peritonitis—namely: four times caused by leakage of gastric juice (in spite of the strongly acid gastric juice the discharge from the ulcers was of a weak alkaline nature; it has repeatedly been shown to contain streptococci); once caused by leakage of the duodenal stump; once a chronic peritonitis was present.

(b) On a patient pylorus resection after method Billroth I, had been performed, where a fatal hemorrhage. In this case the total acidity was enormously high—so high even resection was unable to prevent the repeated formation of an ulcer. This patient had a very strong tendency to the development of peptic ulcer.

(c) One patient died later from the formation of a new ulcer, which perforated.

(d) One patient died forty-eight days after the operation method Billroth I, had been performed. He died of a secondary stenosis of the gastro-duodenal suture. In this case a gastro-enterostomy might easily have been helpful.

Subsequent Results of Resection.

(4) The 41 cases shown as cured are all quite well but of these there were 1 operated on in 1913.

(6) First improved and subsequently operated on. (1) In one case only an excision of the ulcer and at the same time a gastro-enterostomy retro-colica posterior was performed; (2) in one case a resection by method Billroth II, was made.

(c) Unrelieved 21. (1) In this case a wedge-shaped excision of the ulcer was done, then stenosis at the place of excision followed, and therefore gastro-enterostomy ante-colica anterior plus enterostomies was performed. This is direct evidence against the method of excision of the ulcer, and the operation should be replaced by resection. Whether in this case the repeated formation of the ulcer was traceable to a process analogous to the formation of a peptic ulcer must be left undecided. Wedge-shaped resection can easily lead to a sharp kinking of the vessels, and so may lead to a disturbance in the circulation and its resulting consequences—such as cicatrices or perforations. (2) One case resection Billroth II, 1911. Patient had recurrence of the trouble. Died 2.

(d) One patient died after three years of stomach trouble; one patient died after three years two months of cancer.

Subsequent results of resections (Table 5) showed good results. 41 cases are cured.

In the case of improvement followed by relapse after resection (Billroth II) had been done, it should be observed that the patient was well for 14 years, and then began to suffer pain in the left side.

The second case of excision which was not cured had relaparotomy performed on account of recurring trouble. In spite of a wedge-shaped resection a stenosis of the duodenal suture had formed. Finally, in a series of cases jejunostomy alone was performed. We need not wonder at the high mortality of the operation, as it was performed in the weakest and the most of all the cases, when the conditions were so complicated and nothing else was possible, or where the patients were so weak and worn out that one could only do the shortest operation it was possible to do under local anaesthesia. There are 24 cases with 12 deaths. Of these:

8 died of peritonitis.

1 died of hemorrhage from the ulcer, in other words, hemorrhage in spite of the jejunostomy.

1 patient was found to have tubercular complications, from which he died.

1 died of degeneration of the heart muscle.

1 died of marmasus.

Twelve cases survived the operation. Of these 2 died later, both of carcinoma.

1 case was improved.

4 cases were lost sight of.

5 cases were completely cured.

So we can lay down the following

Rules for the Choice of Method of operation on the basis of our observation:

(1) For acute perforation the best method is the earliest laparotomy, with irrigation of the peritoneal cavity and closure of the orifice of the perforation. Whether gastro-enterostomy should be done afterwards depends on the situation of the ulcer and the general condition of the patient. If the patient is so weak that a gastro-enterostomy is out of the question, and can take nothing on account of the peritonitis being already far advanced, then jejunostomy is the most simple operation, as it makes it possible to feed the patient uninterrupted for a long time.

I will here remark that in other complication of ulcer which we fear so much—namely, hemorrhage, operation is in most cases better left alone. When the hemorrhage is severe, expectant treatment is best, for it has repeatedly occurred at the operation that the bleeding point could not be found. This is one of the most hopeless situations in which a surgeon can find himself, for the patient may die during the operation. On the other hand, it is surprising how much blood a patient may lose without dying. One can stop a good deal of hemorrhage with rest in bed, ice bags to stomach, injections of gelatine, serum of horses, the administration of calcium lactium. In hopeless cases we can make use of strong chloride (1 in 1,000) solution for irrigation. In extreme cases jejunostomy should be performed, as one can give the stomach absolute rest and at the same time give the patient nourishment. If the hemorrhage is severe, but has stopped for the time being, one should operate at once, before the hemorrhage recommences.

(2) In typical stenosis of the pylorus, especially when, in the case of a long-standing ulcer, no new symptoms have occurred, and gastro-enterostomy is the operation to be chosen. Sixty per cent, of cases of stenure of the pylorus are completely cured by gastro-enterostomy, while in the cases of open ulcer gastro-enterostomy is only successful in 41 per cent, of cases. Among 134 gastro-enterostomies in ulcer of stomach and duodenum and its complication. 78 deaths occurred. Of these, eight (nearly half) occurred through con-
continued bleeding from the ulcer; therefore gastro-enterostomy is not in all cases a complete protection against continuance of the haemorrhage.

(3) Unilateral pylorus exclusion, which I did first in 1894, offers the greatest security in dealing with ulcer and its complications. It should receive special consideration if the ulcer is still fresh and causing much pain, and finally in cases of duodenal ulcer. It seems to offer the best guarantee of stopping haemorrhage and for guarding against a perforation. For ulcer situated at a distance from the pylorus, simple gastro-enterostomy is not so feasible as in cases of ulcer of the pylorus itself. This my pupil Clairmont was the first to show, on the evidence of the collected experience, that it offers more successful cases, as contrasted with 54 per cent. successful cases of pylorus ulcer. Perhaps this can be partially explained in that an ulcer, situated away from the pylorus, produces fewer symptoms than one at the pylorus, and is therefore not recognised so soon, and is not operated on till much later and in a far more advanced condition.

(5) High hydrochloric acid values of the gastric juice by distinctly favouring the development of post-operative peptic ulcer detract much from the value of gastro-enterostomy and exclusion. Whether, as it almost seems, this post-operative peptic ulcer appears more easily after pylorus exclusion is not yet certain. We have not many exclusive cases. In duodenal ulcer, when an ulcer appeared spontaneously in the small intestine, so that the small intestine already seemed predisposed to the formation of an ulcer.

(6) It has been this post-operative peptic ulcer after operations done by myself and my assistants in the hospital as well as in patients who had been operated on by other surgeons, so that the growth of such an ulcer cannot be attributed alone to our perhaps faulty technique. The ulcer of the pylorus is especially apparent in such cases where gastro-enterostomy was not strictly indicated. There are cases in which the history of the patient given by his history collector is such that the signs of gastric ulcer are wanting at the laparotomy. There may be perhaps merely a relatively small stenosis of the pylorus, some adhesions or cicatrical tissue in the stomach, In former years it was more easy to decide on gastro-enterostomy in such cases. One regarded it as a safety valve, and also a prophylactic against a stenosis occurring later, and therefore being more serious. It is certainly an advantage if it can be easily done to remove the appendix at the time any and its complications, but if the case is full of cases of duodenal ulcer, when an ulcer appeared spontaneously in the small intestine, so that the small intestine already seemed predisposed to the formation of an ulcer.

In cases when, by autopsy in vivo, I have found no other condition to indicate what one had expected to find, judging from the history of the case, and nothing to show what sort of an ulcer it was, I have done an exploratory laparotomy simply, and have refrained from doing what we may term a "concession gastro-enterostomy."

Among 15 cases of post-operative peptic ulcer of the jejunum which I have seen following gastro-enterostomies performed in my own clinic and some by other surgeons, of whom the cases of pylori were so complicated, were tried to reproduce normal conditions. Only one patient was cured, four improved, three unknown, two unrelied, five died. So we see that peptic ulcer represents a very serious complication.

(7) In cases of ulcer situated at a distance from the pylorus, as well as in cases where there is a high hydrochloric acid value, transverse resection seems to me the operation of choice, as this of all other resection, offers the best security against subsequent complications. It must be made wherever there is the least suspicion that the tumour under consideration may be of a malignant nature. Of 200 patients on whom gastro-enterostomy was performed in my clinic, and who could be kept under observation for some time after, 41 died at a later stage, from carcinoma, whilst six died with continuance of the symptoms of the ulcer and five with perforation. On the other hand, transverse resection, planned by Riedel, also advocated by Payr and Kuntner, is a relatively safe operation. We had, up to January, 1914, done twelve transverse resections, to which six cases more can be added up to July 1st, 1914, making eighteen and not a single death. I have never seen a peptic ulcer or any ulcer after this operation.

When transverse resection cannot be done, method Billroth II, should be employed. Method Billroth I is the third in order to be considered. Partial excision is to be entirely rejected.

In extreme cases only, when other operations are not feasible, jejunostomy may be considered, as it has already suggested in cases of perforated ulcer, when the patient is so weak that he must be fed immediately after the operation. Jejunostomy makes it possible for nourishment to be given even on the operation table. Further, in cases of peptic ulcer, in which for exceptional reasons complete exclusion, is the easiest and most rapid of all operations for gastric ulcers, and above all it leaves the stomach undisturbed. As it has only been done in extreme cases, one cannot wonder that it had met with so little success, and that no special complications in such cases have been associated with it. They were patients whose peritoneum had lost its power of resistance.

Now a few remarks on the Technique of the Operations under discussion.

Gastro-enterostomy in my clinic is, whenever possible, done after the method of Haecker, with Lasso postero-intestinal resection. As has been said, without any length of bowel between the stomach and jejunum. The transverse mesocolon is found, and an aperture is made in a part comparatively free from blood-vessels; through this the stomach wall is pulled forward and then secured with a Doyen clamp at a place which is as near as possible to the greater curvature. The small intestine at the junction of the duodenum with the jejunum is brought to this place, and a continuous knot of Naht; when this knot is fast, the description of the suturing. It is done in the typical way after Wölfler's method: (1) "Innere seromuscul. Naht"; (2) "Innere mucosa Naht"; (3) "Innere mucosa Naht"; (4) "Innere seromuscul. Naht"; and then four Lambert sutures applied.

It appears to me of special importance that the silt in the mesocolon should be properly sutured. In Königstein I once had an opportunity of observing a case of lues in which a mesocolon silt, made during a laparotomy, was left unsutured by my predecessor in the professorial chair. This led to an internal strangulation. Since then I have always been especially careful in suturing the silt. My successor here has agreed with this complication in a patient of my own on whom I had performed gastro-enterostomy at a period before I had learnt the importance of this suture. Finally, we had a short time ago a bad case in our clinic, where, after a gastro-enterostomy, the silt, which secured this silt to the stomach, gave way and led to an internal strangulation.

The technique of pylorus exclusion was done thus in all the cases I have mentioned: The stomach is divided between two Kocher's clamps by a Paquelin's cautery, and both proximal and distal ends are sewn up by a continuous suture while the clamps are on. After removal of the clamps, a few sutures are done "for safety." I lay very great stress on the importance of the fact that in unilateral exclusion the nerves of the stump may be severed. This happens only when they are cut through, and not when simply a band or fold of fascia is laid round.
The technique of transverse resection of stomach will be more easily understood from the picture than from a lengthy description. One is always astounded how much is gained by removal of the central portion, so that one always fears that the transverse suture will not be possible; but it is easier than one would think. It is necessary when doing this operation to supplement the longitudinal incision with a transverse incision in order to get plenty of room.

The technique of the jejunostomy is especially simple, and the method has not changed since I described it in 1889. It is simply the principle of Witzel, substituting jejuna for stomach, and I would emphasise especially this point—that the catheter should not be introduced into the intestine at any point lying higher in the abdomen than the mculo, otherwise it may lead to a kinking of the intestinal loop.

OPERATING THEATRES.

PUTNEY HOSPITAL.

ACUTE INTUSSUSCEPTION IN A YOUNG INFANT—OPERATION—RECOVERY.—Mr. Sampson Handley operated on a child, aged 7 months, who had been admitted to the Putney Hospital, and was suffering from intussusception, with vomiting, paroxysmal crying, and a passing of blood and mucus from the rectum. The symptoms had begun at 8 a.m. and she was seen by Dr. J. J. Edwards. The child did not look ill, and its crying was not distended. Dr. Edwards suspected intussusception, and deep abdomino palpation evidently caused some pain, but no definite swelling could be felt owing to the resistance of the recti muscles. The following morning Dr. Edwards brought the child up to the Putney Hospital where an anesthetic was administered. A definite sausage-shaped mass could then be felt in the hypo-gastrum. Rectal examination disclosed no tumour, but blood and mucus were present on the examining finger.

Fourteen hours after the onset of symptoms Mr. Handley opened the abdomen in the middle line. A large intussusception was found occupying the situation of the transverse and the descending colon. The intussusception was very much congested and blue, and reduction was effected with great difficulty, the peritoneal coat of the large gut cracking in many places during the process. The intussusception, which included the appendix, was greatly swollen and congested and infiltrated everywhere with effused blood. The mesentery of the ascending colon seemed to be deficient and the cecum was very long.

Bezoars were not at all obvious as predisposing causes of the intussusception, Mr. Handley anchored the ascending colon and excised the peritoneum of the right iliac fossa by two fine silk sutures. The peritoneum was then closed with fine catgut, and the abdominal wall with figure-of-eight fishing gut stitches.

The operation occupied about 20 minutes. Mr. Handley said that the principal interest of the case lay in the extreme youth of the patient. Children so young do not stand abdominal operations well. It was very important, he pointed out, that the operation should be done quickly, and that the surgeon should be as gentle as possible in his manipulations during the operation, as it was very important to avoid still, and if possible, the reduction of the intussusception should be carried out without delivering it from the abdomen. There seemed to be no doubt, he remarked, that the principal factor in the case was the disposing cause not only of volvulus but of intussusception as well.

The following day, after a simple enema, flatus was passed, and a large quantity of blood mixed with blood. About thirty hours after the operation the child vomited large quantities of greenish fluid of offensive odour, but not definitively faeces, and the abdomen was distended. Collapse appeared imminent. Dr. Newman administered 5 minims of pituitary extract. An hour later the little patient was practically pulseless and appeared in a desperate condition. Hot fomentations were ordered to the abdomen. The following morning the condition had greatly improved and the bullet was said to have been expelled. Subsequently the child made good progress and left the hospital sixteen days after admission.

SPECIAL REPORTS.

THE EIGHTY-SECOND ANNUAL MEETING OF THE BRITISH MEDICAL ASSOCIATION, HELD AT ABERDEEN, 1914.

[By Our Special Representative.]

CONCLUDING ADDRESS.

THE ANNUAL EXHIBITION.

Despite the fact that most of the exhibitors held duplicate displays in London and Aberdeen, owing to the clashing of the two Congresses, there was, nevertheless, a very good show of medical books, appliances, instruments, foods and drugs. The exhibition was conveniently housed in two spacious rooms already well-known to the members of the various sections. Messrs. Burroughs Wellcome and Co. were well to the front, and in an elegant display were to be seen their well-known specialties, including "Tabloid and Solod" products, and the very elegantly-decorated polemic medicaments. Among their recent preparations was to be seen "Laxamol," a refined paraffin jelly of service in chronic constipation. Messrs. Cadbury Bros., Ltd., were showing their high-class preparations of cocoa and chocolate. Among the attractive exhibits at the stall of Messrs. John Wright and Sons, Ltd., of Bristol, were to be seen "The British Journal of Surgery," "The Medical Annual," and the two valuable books on the treatment of "Differential Diagnosis of Main Symptoms" and "An Index of Treatment," by Drs. Herbert French and Robert Hutchison respectively. The Regal Syndicate, Ltd., showed their ingenious combination of agar-agar with cascaria sagrada. Messrs. Ingram and Royle, Ltd., presented for inspection specimens of the famous waters of Carlsbad, Giesshuber, Vichy, etc. At the stall of Messrs. Zimmer and Co., Ltd., were exhibited, among others, Messrs. Hamilton Pegler’s "New Map Scheme of the Symptoms and Distribution of the Fifth Nerve (Trigeminus) with its Ganglia and Connections;" Dr. Harrower’s "Practical Hormone Therapy;" and "Prof. De Quervain’s "Clinical Surgical Diagnosis;" The Charles H. Phillips Chemical Co., were well in evidence with their milk of magnesia, phospho-muriate of quinine, and digestible cocoa. Of the preparations exhibited by the Saccharin Corporation, Ltd., novocain, trinalin, a harmless substitute for morphia, and phytin (eial), a natural phosphorus salt, commanded attention. The well-known "Ranuk" polishes, stains and stoppings were to be seen at an attractive stall. Messrs. Brand and Co., Ltd., were showing their own well-ground meat essences and lozenges, as well as "Ferrocrinis," a pleasantly flavoured preparation of iron and meat-juice. The Horlick’s Malted Milk Co. exhibited their valuable food, both in powder and tablet form, and in addition to their usual advantages for morphia and phytin (eial) were demonstrated to interested inquirers. At the stall of the Bayer Co., Ltd., were a large number of pharmaceutical specialties, prominent among which were "Adalin," a salicylic hypnolac; "Istin," a synthetic lacto-"Polystrool," a scientific galactogogue; and "Cymarin," a cardiac tonic and diuretic, in addition to the three somatose preparations. Some useful voice pastilles were exhibited by Messrs. Meggisson and Co., Ltd., as well as "Vocalzone" solution and gargle for use in tonsilitis, nasal catarrh, pharyngitis, etc. At the stall of Messrs. D.
Appleton and Co. were to be seen many interesting medical works, among which may be mentioned a new edition of Dr. Essex Wynter's "Minor Medicine," Dr. W. Gilman Thompson's "Occupational Diseases," and J. R. H. Reves's book "Pneumonia in its Microscopic Aspects." H. K. Lewis presented a large number of important medical books, among which were to be seen Dr. C. K. Millard's "The Vaccination Question in the Light of Modern Experience," a second edition of Dr. Lewis Jordan's "Heredity," and a much-admired "Mechanico-therapeutics in General Practice." Lemo and Oxo were well to the front with their high-class nutritive preparations. Among the exhibits of the Nestlé and Angell were of especial interest. A brand of cheese particularly pure "Milk Maid Brand of Pure Rich Thick Cream," free from preservatives. The Apollinaris Co., Ltd., had samples of Apenta, Eddowes, and Johannis waters and table beverages. A number of well-known medical books were on view at the stand of Messrs. W. B. Saunders Co., including Dr. Crile's work on "Ano-association," Sir Berkeley Mylnihan's "Abdominal Operations," a new edition (11th) of Anders' "Practice of Medicine," and Dr. Ray's "Opera-1." The well-known hygroscopic and antiseptic application "Antipilostigmine" was much in evidence at the stand of the Denver Chemical Manufacturing Co. The various preparations and adaptations of "Calcium" were demonstrated by J. E. R. McDonagh. Dr. M. C. W. Young showed a preparation illustrating the derivation of a coccus resulting from heating the B. anthracis. Some interesting photographs were shown by Dr. D. B. Barlow of cases of yaws and of specimens of wax casts, colour photographs and drawings of rare dermatological conditions were exhibited by Drs. Norman Walker, Alfred Eddey, and Haldin Davis. X-ray pictures, pathological specimens, and one of a case of scabies were exhibited, attracted much attention.

CORRESPONDENCE.

FROM OUR SPECIAL CORRESPONDENTS ABROAD.

AUSTRIA.
Vienna, Aug. 2nd, 1914.

DYSTONIA MUSCULORUM DEFORMANS.

At the recent meeting of the Gesellschaft für Innere Medizin and Kinderheilkunde, Dr. B. Bischof exhibited a case of dystonia musculorum deformans (progressive torsion-spasm, Ziehen-Oppenheim Disease). The history of the case dated from an insidious commencement of five years ago, from which it had gradually evolved, and for the past three years had manifested itself in the form of pains in the feet, which were accompanied with a sensation of dragging weight. There were also stabbing pains in the back. When the patient assumed the erect posture, the right lower extremity always displayed a position of torsion, the foot presented a characteristically club-foot, while the spasmodic condition of the spinal musculature produced the distortions of lordosis and scoliosis. The spasm subsided when the patient made a controlling effort, or when he was supported, or assumed a position of repose. The small muscles of the feet are in an atrophic condition. The neck is held in a position of slight backward inclination, as a result of which the muscles of the cervical region stand out in a state of strong tension. Slight twitches are observable in the muscular system. The patient now walks only with extreme difficulty. The atrophy of his left arm is due to the muscular spasm and organic change of the central nervous system. Is this one of the cerebellum, or of the nerve-paths leading therefrom?

NASSO-PHARYNGEAL TUMOUR WITH CEREBRO-SPINAL METASTASES.

Dr. A. Finzi demonstrated the case of a male patient, aged 22, who presented a nasso-pharyngeal tumour which had proceeded to metastatic developments in the base of the brain and in the spinal cord. Two years ago, 'a tumour had formed in the neck, and a quantity of pus un mixed with blood was removed therefrom by operation. Paroxysmal radiating pains subsequently appeared, especially in the form of left-sided cephalalgia. Large lymphatic swellings gradually developed in the neck, and the olfactory and auditory sensations had become more obuse on the left side. On application of the radium treatment some improvement was manifested, but this did not continue long. The patient now suffered from acute left-sided cephalalgia, left occipital pains radiating from the vertebral column. There was also paresis on the left side, which was accompanied with a slight degree of exophthalmos, of which condition a slight occurrence was described. There was also a slight paresis of the left arm. There was analgesia which extended over the left half of the face, marked lowering of the olfactory and gustatory sensibility on the left side, a slight degree of paralysis of the left lateral half of the velum pendulum palati, and the presence of a hyperaesthetic zone at the level of the fifth and sixth dorsal vertebrae, which was also the seat of radiating pains. A sarcomatous tumour occupied the nasso-pharyngeal space; this grew from the wall of the epi-pharynx, and its surface had become partially ulcerated. Metastatic tumour of the cervical lymphatic glands had developed, and had also apparently formed in the middle fossa of the base of the skull and in the structures of the vertebral column.

TREATMENT OF TRACHOMA WITH ULTRA- VIOLET RAYS.

Dr. F. Rössler has just published his experiences of the Finser ray, temperature treatment of trachoma, accompanied with the formation of small "sago-grain" nodules in the tarsus and fornix, or with papular hypertrophy and the development of numerous secretory formations. The effectiveness of the Finser rays has been found by him to yield the best results of any, and in the minimum interval of time. In the other stages, "blue-stone" had been found to prove the best local application. In cases which had reached the stage of panus formation, any application of the Finser-rays was contra-indicated.

USE OF ARTHION IN IRITIS.

Dr. H. Krebich has published a paper which gives his experiences of the use of Bruck's arthion, administered by way of intra-venous injection, in cases of gonorrhoeal iritis. The indications of use of arthion had found that it gave surprisingly favourable results, and was absolutely without danger.

THE ETIOLOGY OF ULCUS VENTRICULI.

A great deal of interest is now directed here to the recently published theory of the genesis of ulcus ventriculi which has been formulated by Dr. H. Sieben (Basel). Dr. Sieben has based his researches on this much-debated question. He has arrived at the conclusion that such conditions as cause an increased formation and frequent regurgitation of the intestinal contents into the cavity of the stomach can always be guaranteed to produce typical specimens of ulcer ventriculi. This fact he has proved by carefully repeated experiments. He had found that after ligature of the pancreatic duct, when the most unfavourable conditions were created for the unrestricted action of the intestinal ferments on the lining membrane of the stomach, no ulcerative process
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was ever found to develop. On the other hand, feeding with trypsin was always found to be followed by the appearance of typical ulcers. Accordingly, the conclusion becomes unavoidable that, in the experiments on the cat, the formation of an ulcerous membrane was no other than the trypsin which functioned, so to speak, as a foreign body in the cavity of the stomach. It has also been found, besides dealing with the formation of an ulcus tyrannum—and under conditions of which the development in the human organism is quite readily conceivable.

**UNITED STATES OF AMERICA.**

**New York, Aug. 5th, 1914.**

**THe ILICIT CONSUMPTION OF OPIUM AND OTHER NARCOTICS IN THE UNITED STATES OF AMERICA: ITS RELATION TO THE GROWTH OF AND TRAFFIC IN OPIUM IN THE ORIENT.**

It is the large Chinese population in America which has impelled the United States Government to inquire into and endeavour to regulate the consumption of opium by unauthorised persons. In the course of this inquiry, it became manifest that far more opium was being imported than could be accounted for by what the Chinese knew, and which they presumed to be legal. At the same time, it became generally known that the number of secret takers of drugs was becoming very large, and that a large proportion of these were takers of derivatives of opium. A little later, the researches of the Chinese authority on the Acupuncture, which has reached an extent to menace the health of the nation to an even greater degree than has been the case in China. It will surprise these unacquainted with the fact to learn that one hundred and fifty thousand pounds of crude opium for smoking were imported in one year. The manufacture of this was permitted on payment of the nominal license of ten dollars per annum. The total amount of opium accounted for by the United States is found to be one hundred and fifty thousand pounds. In addition to this, a considerable amount is smuggled, especially since the prohibition of the importation of smoking opium.

Customs returns since 1860 show that about 25 per cent. of the imports of opium is used for smoking. Deducting this proportion from the amount entered at the Customs Office, the following results of imported opium are revealed—a Decade 1850-1860, from 358,194 lbs. of crude opium to 741,663 lbs., being an increase of 111 per cent., the increase of population only being 34 per cent. A large amount of opium was, besides, used for medicinal purposes, and this is estimated at about 20 per cent. additional to that entered at the Custom House. In the following five years occurred the civil war; and a great deal of opium was believed to have entered the United States on account of the war. In the Customs returns show an increase of only 48.5 per cent., with a population increase of 22 per cent. It must be remembered, too, that the medical demands were greatly increased by the war.

For the decade 1870-1879, the importation was 1,020,023 lbs. as against 1,103,041 lbs. for the preceding decade, being an increase of 74 per cent., while the population only paid duty for a part of the time, and was imported in enormous quantities to anticipate the Dingley tariff. Hence in the following decade ending 1890 the importation was 2,500,000 lbs., and the population 1,926,023, 4,800,088 lbs., while the population increased 15.9 per cent.

Taking the whole period from 1866, we find that there is an increase of 341 per cent. in the amount of opium imported in the last decade, against an increase of population of 133 per cent.

This increased amount is by no means due to the increase of Chinese in the United States. Thus, in 1866, the Chinese population of the United States was only 188,000. From a survey of the Chinese quarters in the largest cities it has been estimated that 35 per cent. of these people smoke opium. These may be divided into heavy smokers, who use six pounds per annum; these number about ten per cent.; light smokers, who use 1½ lbs. per annum, who number about 15 per cent.; and social smokers, who use about one oz. per annum, to a number of 10 per cent.

From these figures we can calculate a total Chinese consumption of 90,750 lbs. As the average importation is 145,168 lbs., if we calculate the importation of smoking opium as about 25 per cent. of the total importation, this amount, when converted into units to be accounted for by non-Chinese smokers. It is true that the foregoing statistic does not agree with that submitted by the United States to the International Opium Commission at Shanghai; but since that estimate was made further data have been derived from the Japanese inquiry in Formosa, from figures submitted by the Chinese members of the Commission, and by the investigations of the United States delegates in the Far East. In that dependency, it is believed that Chinese opium is smuggled, that 32 per cent. of Chinese male adults smoke opium.

But on the other hand there must be added to this $8,418 at least 20,000 lbs., which is smuggled into the United States from Canada, besides what is surreptitiously manufactured in the United States.

The Hon. Mackenzie King, now the Minister of Labour for Canada, reported that there were at least seven factories manufacturing smoking opium in the Pacific Coast Cities of Canada. In 1907 their receipts were over $600,000. The owners of these are Chinese, who import the crude drug from China and manufacture it, and the whole is entirely consumed in Canada itself. Mr. King concludes that much of it is smuggled into the United States, and this opinion is confirmed by the American Customs collectors, who find it impossible to prevent the smuggling, and estimate that 20,000 lbs. a year crosses the border.

It is difficult to estimate, however, the number of American opium smokers, for the practice is generally not considered worth while. It is calculated that about 10,000 are regular smokers, who are able to smoke only when they have money and are not in gaol. Thus, the consumption per caput is smaller than that of the heavy-smoking Chinamen. Nevertheless, as the United States is a land of doctors, physicians, and intelligent opium smoking Chinamen, it is computed that in New York, Chicago, and San Francisco, there are between 5,000 and 15,000 Caucasian and negro smokers of opium. Taking 7,000 as a fair average. From the foregoing figures, it is seen that this figure represents a large number of the population, it might be estimated that there are 150,000 white and black opium smokers. This would correspond to a consumption of about half a pound per annum for each. Of the assumption that 68,000 lbs. are consumed, in accordance with the foregoing calculation.

The danger has been long realised; it has not only permeated popular literature, but both States and municipalities have legislated against the evil. Efforts
LETTERS TO THE EDITOR.

[We do not hold ourselves responsible for the opinions expressed by our Correspondents.]

THE WAR AND THE NEWSPAPERS.
To the Editor of The Medical Press and Circular.
Sir,—It was impossible without sympathy to read your frank statement, with regard to the totally undeserved injury which medical papers must sustain through the indirect effects of the truly terrible struggle which the whole Empire has entered upon, and no less stiffening to view the attitude of the great bulk of leading papers. These papers set the fashion to the mass of inferior fry. They follow what is called "commercialism," and their newspaper is a struggle to amass money by any means that does not include felony, although there are some professional guardians of the public welfare who do not stick at felony when they have made themselves tolerably sure that when put into the dock finally for trial a flaw will be found in the indictment. Then they will be heroes to their pals and sure of a biography after their deaths.

To-day being the Sabbath, it is truly edifying to notice the shreds of advertisements, of whose character the proprietors and managers are men who are forth in special Sunday editions to deceive and injure our soldiers—those gallant men about whom the papers write in blasphemous terms. I send you some sheets from Forrest papers of the day. It would not be better to give eloquent appeals to the Almighty to guard our noble soldiers, instead of assisting to exploit and injure them by the publication of advertisements of these fraudulent quack medicines.

I am, Sir, yours truly,

Scribner.

Sunday, August 16th, 1914.

INFANT MORTALITY.
To the Editor of The Medical Press and Circular.
Sir,—At this time of year infant mortality among infants is always high, and since it is to the young generation that the country must eventually look for its strength, it is of the utmost importance at this juncture to prevent all unnecessary waste of life. At an emergency meeting of the Executive Committee of the Association of Infant Consultations and Schools for Mothers, which has just been held, it was decided to ask the co-operation of the press to point out to all those who have charge of young life the danger of deaths and much illness may be prevented by the observance of a few quite simple principles of mothercraft, of which the most important are:

1. To persevere with natural feeding up to the end of the ninth month; even if supplementary feeding by night is not possible, the mother is compelled to go out to work. Employers of female labour are earnestly requested to give nursing mothers opportunities for feeding their babies.

2. That in those cases in which such opportunities are impossible weaning is by no means necessary. A supplementary feeding of cow's milk will not disagree with the infant and may save the infant's life.

3. That the chief causes of illness among nurses and other babies is irregular and too frequent feeding by day as well as by night: intervals by day should not be less than three hours, and at night a long interval of some six-eight hours should always be provided.

4. Expectant mothers should also seek advice as to their own health, either by consulting their doctors or by attending at schools for mothers.

5. That stimulants are not only unnecessary, but are harmful both to nursing and expectant mothers.

Yours, etc.,

ERIC PRITCHARD, M.A., M.D.Oxon.,
Chairman of the Association of Infant Consultations and Schools for Mothers.

ELEANOR Ritchie, M.D., Secretary of the Association of Infant Consultations and Schools for Mothers.

4 Tavistock Square, London, W.C.,
August 15th 1914.
OBITUARY.

DE W. H. CARTHEW DAVEY, LIVERPOOL.

We greatly regret to have to announce the death of Dr. William Henry Carthew Davey, of 50 Princes Road, Liverpool. Deceased some years ago, from some accident sustained in an electric furnace which had a fatal termination on the 11th inst. Before his illness he was the fullest health and bustling in work. The announcement of his death will come as a great and painful surprise to his numerous circle of friends and admirers. Dr. Davey was born in London in 1867, studied at Charing Cross Hospital, where he afterwards held an appointment as House Surgeon. Later he obtained the appointment as House Surgeon of the Royal Northern Hospital, Liverpool, and upon relinquishing this he was appointed Surgical Tutor at the Hospital and settled in practice in a central part of that city, where he soon succeeded in establishing an extensive and lucrative practice. He held several public appointments, amongst which were the Surgeoncy to the Liverpool Orphanage, Myrtle Street, the Agency to the Admiralty, as also the medical referee to one of the largest insurance companies in the year 1899. He married—Sara, daughter of the late Robert Thomson, of Belfast, J.P., by whom he is survived. Two children, both of whom are boys, are also left to mourn his loss at a period of life when their parents' care and advice were of untold value. He was a member of a number of learned societies, amongst which may be named the Liverpool Medical Institution, and a firm supporter and contributor to this Journal. His funeral (by cremation) took place on Friday last, the 11th inst.

DR. J. FLETCHER LITTLE.

We regret to announce the death of Dr. John Fletcher Little, which took place at 33 Dorset Square, N.W., on the 9th inst., aged 71. The deceased, who qualified as L.R.C.P. and S.Edin. and L.M. in 1866, received his medical education in Dublin, Liverpool, Charing Cross Hospital, and the University of Dorpat, in which he became M.B. in 1888. He was elected M.R.C.P. Lond. in 1889. Dr. Little was well known in Marylebone, and he had served on the London County Council. He was also Medical Officer of Health for Harrow. He was a Vice-President of the Medical Graduates' College and Polytechnic, and was formerly Physician to Mount Vernon Hospital for Consumption, the London Temperance Hospital, the West End Dispensary, and Marylebone General Dispensary. He had previously held the appointment of Physician to the Ben Khwidd Establishment and the Liverpool Convalescent Institution. Dr. Little had contributed many articles to medical journals, including articles on "Massage and Mechanico-Therapeutics" to the Index of Treatment. He was also the author of a work on "Rheumatoid Arthritis."

REVIEWS OF BOOKS.

TWO YEAR-BOOKS.

One of the main objects of the reviewing of books is to call the attention of readers to those that are worth purchase and perusal, and, on the other hand, to warn against, just as the case may be. For this point of view there is little need to write a review of Messrs. Wright's "Medical Annual." (a) for, every medical man who reads at all must know that it is indispensable. Each successive issue makes its wonder more and more, so that it is not out of place to include in the review at all, in fact, anything that has appeared in this series, in order to give the public a digest of what has been done in the year. The most remarkable feature of this work is its completeness and thoroughness. It is a compilation of all the important communications of the year dealing with those subjects as the cause of death under chloroform, intractable anæsthesia, spinal anæsthesia, and anæsthesia associated with "cancer," Mr. Monsarrat quotes, with illustrations, some valuable and insuperably known work of Dr. T. F. Paul on the history of epiphrenonema and its relation to degrees of malignancy, and on "Vaccines" contained in the "Review of Therapeutic Progress" by Dr. F. J. Charteris, and is hardly sufficient, in view of the rapid development of that method of treatment. In particular, we might expect nothing more from the "Medical Annual," so far as a supplement to Messrs. Wright's current medical knowledge, Dr. Priestley supplies a useful article on "Public Health," in which he quotes the most important legal decisions of the year. The weakest feature in the present volume, as in its predecessor, is the gloom, with which the annual abounds, because, as a whole, it is all very good, it would be ungenerous to dwell on the few weak points.

The "Tuberculosis Year Book" (b) edited by Dr. Kelynnack, contains no book of useful information of all to whom are concerned in tuberculosis work. It caters for the clinician as well as for the administrator, and indeed, also for members of public boards who have to formulate and carry out tuberculosis schemes. Contributions from writers who can speak with authority we may mention specially the article by Sir Thomas Oliver on "Occupation and Tuberculosis," and that by Dr. Nathan Raw on "Bovine Tuberculosis." Those engaged in the work in tuberculous sanatoria, which, as a one-third of the book, does not appear to us to be specially useful. The volume is of cumbersome shape and is too heavy for comfort, but, as we have said, it contains considerable matter of interest.

PSYCHOLOGY AND BIO-CHEMISTRY.

The "Vorwort" of this extremely interesting and suggestive booklet is dated from St. Petersburg: May last year. That of the Russian issue bears the date December, 1911. The text is in German. "Vorwort" is editor's congratulatory course of lectures at his University. The booklet presents a well-thought-out presentation of our current knowledge of the indented bordering margin which limits and connects the respective domains of biological chemistry and psychological psychology. The transition to the great mass of enlightening (and sometimes confusing) matters of fact and opinion which the tidal wave of nineteenth century materialism set in centrifugal motion all round the world of thought. The spirit of research that was set in motion by the epoch-making synthesis of urea, which "dynamited" the barrier that had previously marked off the respective domains of organic and inorganic matter through all the centuries, encouraged a large section of enthusiastic, but sometimes also juticious, apathetical, and scientistic research and scientistic infallibility to hope for the early attainment of what has hitherto proved to be unattainable. So did the invention of the colossal "man's nest of the "Origin of Species by means of Natural Selection." But each explosive movement had unquestionably the very desirable effect of stimulating and encouraging research in every department of its special domain of knowledge, and thus furnishing an enormous collection of utilisable facts, and suggesting the book.

(a) "The Medical Annual; A Year-book of Treatment and Practitioners' Index." By various contributors. 1914 and 1915. Price £1 1s. net.

tive" subjects of thought and criticism. The dangers of
vulture hunting have been as clearly illustrated in
connection with those movements of intellectual in-
volution which have repeatedly checked the upward
ward progress of the human brain. The present
human, however, a weaknesses which may well be held
to merit a substantial share of sympathy. And
although the mass of collected facts hitherto garnered
in each special compartment will not convey to the
logical mind the persuasive power of the methods of
demonstrative proof— even when most skilfully
manipulated— every earnest inquirer has the fullest reasons
for gratitude to those who have done so much to plug
out the heart of the mystery of Nature's laws and
methods of movement, which now and then are very
partially screened off from the mental vision of those
who have eyes to see.

The great object of Dr. Justschzenko has been to
demonstrate and illustrate the mutual connection and
inter-dependence of mind and matter in the human
organism, to the present knowledge of which so vast an
amount of material has of recent years been contributed
by researches in the very interesting department of
biochemistry. Its facts are far too numerous to be even
 glanced at in any detail. We will just give for sake of
classification the list of the neurin, kreatin, neutrin, lysatin,
lysoxylein, methylguanidin; (2) santhin group (santhin,
lysoxylein, methylguanidin); (3) xanthin group (xanthin,
hyperoxanthin, adenosin, xanthinoluen, xanthinourea,
adenosinourea, with open chains (methylamin, trimethylamin,
neutridin); (5) amino-acids (glycocol, leucin, etc.); (6)
leucamines of unknown chemical constitution, such as plasmin
and spermin. Perhaps a good test of the reader's enthusiasm would be afforded by the degree of his
deliverance from this chain of investigation at its present
limit, and try to add a few more links to its crescent
longitude (7).

LECTURES ON DIETETICS. (d)
The series of lectures which comprise this volume
were delivered at the New York Post-graduate Medical
School, and the author is to be heartily congratulated in
now publishing them in book form. The subject of
dietetics has been so long the happy hunting-ground of
false authors and quacks. The book is based on sound reasoning and possesses much
practical utility.

After discussing the principles of diet and nutrition, the author deals with the digestibility of foods and
the dietary discretion of acute and chronic diseases of prolonged duration and in chronic
diseases and the diet in chronic affections of the digestive
tract next receive consideration. There are chapters on the dietetic treatment of chronic diarrhoea and the dietetic treatment of diabetes mellitus. Various
diet regimens are examined and the author concludes
with a chapter on indications for and description of the
method of diuretic feeding. It will thus be evident that much ground has been
covered in this small volume and the fact that this book is used by medical students and practitioners of the actual lectures makes its perusal all the more interesting, and enhances
its practical value. There can be no doubt that this monograph will facilitate the question of diet to the
practitioner, and will aid him in its management and
we can with confidence recommend it to our readers.

THE PRACTICE OF MEDICINE. (b)
This popular text-book having reached its tenth
edition has been very thoroughly revised, and many
sections have been recast, a notable example being the
appearance of a separate section on the glandless glands. Intuitive pathology, owing to the
researches of modern pathology, has been transferred
from the chapter on nervous, to that on infectious
diseases. The modern work on diseases of the heart has also been largely recast, and very
notable skin diseases have been added. Useful skew diagrams have been obtained from Dr. A. C. Jordan.
We do not doubt that students of the present day will appreciate this text-book as much as did their predecessors the previous editions.

MANUAL ON MASSAGE TREATMENT. (a)
The fourth edition of this useful book has just appeared in revised and enlarged form, with a chapter on
massage of the eye by Dr. A. Darier, of Paris. The first edition appeared in 1889, and so far as we
know, was the first book in English on this subject. The present volume is highly to be recommended to
the physician and surgeon alike as well as to the specialist and general practitioner as a useful text-
book and reference manual at one and the same time.

In our estimation, the British Isles, massage has by
no means reached the highest pitch of development,
for there are still large numbers of medical men who have no practical acquaintance with the methods of
application of this most useful remedial agent, and who
are unable to give practical reasons for how it should be carried out, but are content to rely upon the skill and discretion of the manipulator
whom they employ. If the latter has had a sufficient
training, little or no harm will ever be done, but for
success in treatment we still look forward to the day
when the British physician will no longer consider it beneath his dignity either to possess an accurate
theoretical knowledge of the subject, or, as on the Continent and in other places abroad, be his own
massuer. A brief résumé is impossible since the
text is very extensive. We most
cordially recommend it to medical men and students of
massage as one of the best standard works to which
they can refer.

HANDBOOK ON SANITATION. (b)
This manual of theoretical and practical sanitation is
primarily intended for sanitary inspectors and other
inspectors engaged in public health work. It is
divided into three parts: I. Sanitary Science; II.
Sanitary Practice; III. Sanitary Inspection. The
questions discussed are similar to those dealt with in
any manual on practical sanitation and need not be
detailed. The book is pleasantly written and the
author has acquired the art of marshalling his facts in
an interesting manner. The work is of course based
largely on sanitary practice as carried out in the United
States, which differs in several respects from that of
in this country. One very marked difference in this
respect may be mentioned. In this country it is
usually considered sufficient for a public water supply
to be rendered supply by the addition of chlorine to
distribution, but the author maintains that whether
this has been done or not there ought to be in every
house some means of further purifying the water.
The illustrations, though not very numerous, have been

(a) "Massage Manual of Treatment." By —. Graham.

(b) "Handbook of Sanitation." By —. Price, M.D.,
Director of Investigation, New York State Factory Commission, et al. Third
Hall, Limited, 1913. Price 65. (2d ed.)
judiciously selected and are extremely good. We have no doubt the book will have a wide circulation in the United States, and we can recommend to those engaged in public health work in this country as a useful adjunct to more standard works.

**TUBERCULIN TREATMENT. (a)**

No better test could be made of the value of tuberculin than in the case of sanatorium patients, seeing that they remain long enough under treatment and observation to determine the success of the treatment. Dr. Bardsley's report is, therefore, one which will be studied with interest by the profession, as the present time is critical, and decisions are being made as to the value of tuberculin. While too short a time has elapsed to give anything like a definite pronouncement on the subject, Dr. Bardsley's words must carry a certain amount of weight. He says that "tuberculin has not proved itself to be a remedy in the ordinary sense of the term, and no immediate or striking results are to be expected from it, even in the most favourable cases." He points out, moreover, that in a certain number of cases, tuberculin therapy has been followed by a relapse, and that "experience up to the present time shows that the administration of tuberculin is quite unsuitable as a routine method of treatment for all cases of pulmonary tuberculosis, and that its indiscriminate and careless use may have a very serious effect upon the health of the patient."

May these words sink deep into the minds of those who to-day are forward in advocating tuberculin treatment! This is a most excellent report, and we sincerely trust it will have a wide circulation.

**POCKET MEDICAL DICTIONARY. (b)**

This concise book in its new edition has been carefully revised and includes much new material. Many of the new terms which have been included from the different departments of medicine have been added, thus adding a few more pages than the previous edition and making it more complete. The Editor has made no attempt in this volume to replace the larger dictionaries, which are necessary to a thorough understanding of the language of medicine, but has made an effort to extend the possibilities of a pocket medical dictionary beyond that hitherto attempted.

The vocabulary is strictly up to date, the definitions of terms are concise and precise, and the additional space has been used to advantage. The order of arrangement is strictly alphabetical, and in addition, it also contains a considerable amount of matter in tabular form, which serves to group correlated facts, and is a valuable aid to the memory and quick consultation.

**THE DIETETIC TREATMENT OF DIABETES. (c)**

The pathology of diabetes, if not fairly definable as a *terra incognita* in our enlightened twentieth century, as it admittedly continued to be during all the preceding ages, still remains unmapped to any degree approaching the standard of precision which may now be proved useful in the provision of the successful therapeutic code which is destined to lead to the physical salvation of the afflicted. Indeed, the accuracy of the author of the booklet now before us will be challenged by few practising members of our profession, when he states that throughout the researches of physiologists, pathologists and physicans in modern times, the etiology and pathology of this ill disease remain as obscure to-day as they were in the days of Charaka and Susruta. Thus, in the interest of the disease may be said to present itself through the respective reflection of each of two of its facets—"the historical and the clinical. And, as our author has evidently devoted earnest care and studious observation to the attempted mastery of this chosen task, his views on the subject of an interesting clinical example which, if continued to be one of the most vexatious and unmanageable of that inextricable series, should receive a full hearing from all physicians. It is interesting to read that: "... hindu physician of yore were, perhaps, the first in the world to diagnose diabetes"—and it is decidedly instructive to learn that "... kidney disease is not so common amongst Indians as amongst Europeans. This is due to Indians being accustomed to the vegetarian diet, which is non-stimulating, and also to their eschewing alcoholic beverages." Every medical practitioner should test the results here claimed for "the coconut cure."

**RENAI. DIAGNOSIS. (a)**

The advances made in urology are very largely due to increased facilities for making accurate diagnoses. These modern methods are here fully set forth. The author first discusses the physiology of the renal functions, and then goes on to speak of the competency of the present diagnostic methods. He is critical, but definitely reasonable. He next refers to cryocopy and the various functional tests used in diagnosing renal affections. Finally, he deals with the significance of functional diagnosis in the medical and surgical treatment of kidney disease, and the remainder of the book is devoted to interesting clinical examples. The book is one of considerable importance, not only to the specialist, but also to the general practitioner. It is a work of quite exceptional merit, and we are pleased to find that an English translation now exists. The translator's part has been well done, and the English rendering is quite readable and, so far as we can judge, is accurate and faithful to the original. As a handy epitome of modern methods of renal diagnosis, we can strongly recommend it.

**ORGANIC CHEMISTRY. (b)**

This is a very good book, full of solid information and liberally bestowed with graphic formulas. For the student who early feels the attraction of organic chemistry the work is ideal, but for the ordinary student, especially those intended for medicine, he could have no more easily read book. In this subject, space devoted to chaining the attention by the mention of some practical application is never wasted, it minimises the strain of the lesson and allows the memorising of a fact to be easily accomplished without effort. That the book is characterised by a mass of interesting clinical examples. The book is one of considerable importance, not only to the specialist, but also to the general practitioner. It is a work of quite exceptional merit, and we are pleased to find that an English translation now exists. The translator's part has been well done, and the English rendering is quite readable and, so far as we can judge, is accurate and faithful to the original. As a handy epitome of modern methods of renal diagnosis, we can strongly recommend it.

**APPLIED SPECTRUM ANALYSIS. (c)**

This scholarly work of the late Dr. Macmunn, owes its publication to the devotion of Mrs. Macmunn and three of her late husband's friends. To those who have already mastered the elementary technique of spectroscopy, this book will prove most useful, written as it is by a master of art. That the book is characterised by a mass of interesting clinical examples. The book is one of considerable importance, not only to the specialist, but also to the general practitioner. It is a work of quite exceptional merit, and we are pleased to find that an English translation now exists. The translator's part has been well done, and the English rendering is quite readable and, so far as we can judge, is accurate and faithful to the original. As a handy epitome of modern methods of renal diagnosis, we can strongly recommend it.
botanist will find not only accurate and important information, but food for reflection as well. In the preface Professor Gamble refers to two previous works of Dr. MacMunn as “authoritative expositions.” The one under consideration is certain to be similarly accepted.

**LITERARY NOTES.**

The reprint by Messrs. John Wright and Sons, Limited, of the second edition, revised and enlarged, of Lieut.-Colonel P. C. Gabbett’s “Manual for Women’s Voluntary Aid Detachments” is opportune at the present moment, especially as so many ladies are anxious to do their bit in bearing to the sick and wounded in warfare. This useful little book does not deal with first aid, a knowledge of which is presupposed by its readers, but rather indicates the direction in which women’s detachments may turn their thoughts. It contains notes on nursing and diet, the preparation for emergency operations, list of equipment required for a temporary hospital, training and field drill. The last chapter deals with the question of how and where to train to become a qualified member of a W.V.A.D. The price of the book is 1s. net.

* * *

“The Year Book of Radiology for 1915” is announced by Messrs. Longmans, Green, and Co. as in preparation, edited by Robert Knox, M.D., and James H. Gardiner, F.C.S. The object of the work is to give an account of the most recent advances in our knowledge of radium, X-rays, and the allied phenomena, both from the medical and the physical point of view. The volume will comprise a series of authoritative articles by specialists working in radiology, and a directory of qualified medical men practising in radium, X-rays, radium and electro-therapeutics, both at home and abroad, also a list of hospitals and institutions where such treatment is carried out.

Our contemporary, The Medical Officer, has issued a leaflet on “The Best Foods to Buy during the War.” It is compiled from publications of the Croydon Health Department, the National League for Physical Education, and the National Food Reform Association. A moderately complete list of flesh, fish and vegetable foods is given, and their nutritive values and low market prices stated as a guide to poor people and all others who desire to economise during the present crisis. The advice is based on the preparation of some cheap and nourishing dishes, all of which appear to be framed on sound lines, and will, if followed, prove of value to those for whom it is devised. The leaflet is being supplied to Public Health Authorities for distribution.

* * *

The twentieth series of “Quiet Stories” from Truth, like its predecessors, furnishes suitable reading for the railway carriage or the waiting-room. The stories are, as usual, entertaining, though perhaps the element of unexpectedness is not as marked as in previous years. Most of the writers make no pretence to literary style, but even complete lack of pretence does not prevent a certain infinity to the stories. The stories of the supernatural are among the best, and it is a tribute to the power with which “Lady Magpie’s Leap” is written to say that even reading it in a railway train, it gave us a creepy feeling.

**MEDICAL NEWS IN BRIEF.**

Plague at Hon-Kong.

The Secretary of State for the Colonies received on Monday last telegraphic information from the Governor of Hong-Kong that five cases of plague had recently occurred during the week, and that there had been five deaths, Gift of a Convalescent Home to a London Hospital.

The freehold residence of Sea Copse Hill, Whimingham, Isle of Wight, with grounds of nine acres, has been presented by Mrs. Frederick J. Kirchner as a free gift to the Royal Waterloo Hospital for Children and Women, to be used as a convalescent home.

**MEDICAL WAR ITEMS.**

Several medical men have enrolled themselves as special constables during the last few days. The price of hospital bedsteads has advanced 33½ per cent, owing to the increase in the cost of raw material.

Of the members of the St. John Ambulance Brigade 4,000 have mobilised, while there is a roll of 2,000 men waiting to sign on at a moment’s notice. Several X-ray specialists from London are proceeding to Belgium with apparatus to assist the surgical officers in cases of wounded, in the detection of bullets, fractures, etc.

The King has given to the Westminster Division of the British Red Cross Society, 74 Vincent Square, Westminster, an ambulance and a pair of his own horses for use during the war.

There is a considerable rush to attend classes in first aid and home nursing at the present time, and centres for such instruction are being given in many parts of London and other places.

A number of Cambridge men have volunteered to man a hospital transport ship to work between the Fleet and hospital ships and hospital cases on shore. Lady St. Helier, of 31 Portland Place, is acting as treasurer.

A new naval hospital, to be called “Queen Mary’s Royal Naval Hospital,” is to be opened immediately at Southend-on-Sea, for the purposes of which the Palace House has been placed at the disposal of a special committee which has been formed, of which Dr. W. Hale White is Chairman and Consulting Physician.

A dental unit, says the Guy’s Hospital Gazette, is proceeding shortlv, to Wimereux (Pas de Calais) to assist Mr. Newland Pedley, Consulting Dental Surgeon to Guy’s Hospital, in the formation of a private clinic for the dental treatment of the French and English troops, including the treatment of fractures of the jaw.

The Great Northern Central Hospital, Holloway, has placed 100 beds at the disposal of the Government, and a number of the 165 beds in the London Homoeopathic Hospital in Great Ormond Street, W.C., will be devoted, when required, to naval and military patients. The Board of Management of the Metropolitan Ear, Nose, and Throat Hospital have also decided to offer their services in support of the War Office, the staff having unanimously offered their services for the care of war patients. The Governors of Guy’s Hospital have offered the whole of the resources of their dental department to the War Office for the treatment of men offering themselves as recruits who have been rejected on the ground of defective teeth.

**NOTICES TO CORRESPONDENTS.**

Correspondents requiring a reply in this column are particularly requested to make use of a Distinctive Signature or Initial, and to avoid the practice of signing themselves "Reader," "Subscribers," etc. Much confusion will be spared by attention to this rule.

**SUBSCRIPTIONS.**

Subscriptions may commence at any date, but the two volumes each year begin on January 1st and July 1st respectively. Terms per annum, 21s.; post free on orders for abroad, 25s. Foreign subscribers who pay in advance. For India, Messrs. Thacker, Spink and Co., of Calcutta, are our officially-appointed agents, and will be supplied with this journal. Messrs. Dawson and Sons are our special agents for Canada. For South Africa, The Record Publishing Co., Cape Town, Messrs. Gordon, Robertson, of Sydney and Melbourne, are our special agents for Australia.

**OUR ARRIVALS.**

For Our Inscription.—Whole Page, £3; Half Page, £2 10s.; Quarter Page, £1 5s.; One-eighth, 12s. 6d.

The following are made by the Press:—Whole Page, 13 insertions at £3 10s.; at £3 2s.; 52 insertions at £1 1s., and pre rates for smaller spaces. Small announcements of Practice, Assistances, Vacancies, Books, etc.—Seven lines or under (50 words), 4s. 6d. per insertion: 6d. per line beyond.
"Business as Usual." The partial paralysis of trade and all the complicated mechanism which goes to make up social existence, consequent upon the first declaration of hostilities in this country, is now, happily, beginning to show unmistakable signs of a revival. Thanks to the prompt intervention of the Government, food prices, which at one time threatened to be outrageous, have now been regulated, and there is every reason to believe that in this respect matters will further improve as the great trade routes at sea become once more opened up. Slowly but surely the masses are taking a saner outlook upon the general conduct of business, and hope, one of the greatest of mental stimulants, is beginning to awaken men's responsibilities to their King and country. It would be unreasonable, even on the part of the most independent citizen, to expect neither loss nor dislocation of some kind at this critical time in our history; but, at the same time, it is the bounden duty of every loyal subject to preserve, so far as may be possible, normal relationships with his fellow men and not, from motives of self-advancement or greed, to make their lot harder. There are many benevolent and combatant who will go under in the present strife. Let each one see to it, then, that he place no stumbling-block in his brother's way by making the conditions of life unnecessarily harder in this time of stress. Now that the wave of panic is subsiding it behoves us all to depart as little as possible from the ordinary tenor of our lives. In the foolish spirit of cancelling all holiday arrangements as short-sighted as it is selfish, for change of air is as necessary for tired workers as an influx of visitors into the seaside hotels and boarding-houses. In short, the motto of "Business as Usual" should be adopted in spirit, if not in letter, by all British subjects.

In some ways the medical profession in this country will be hardly hit during the war. Those practitioners who have left their practices and resigned their appointments to minister to the greater need of the sick and wounded abroad can rely upon their places being kept open for them by loyal and able auxiliaries. Some have returned to their practices in the absence of their partners, and others are suffering actual loss, probably of only a temporary character, from lack of regular patients and from the addition of extra gratuitous work. It is understood that, in order to adjust medical practice in Scotland while so many practitioners are away, a special Medical Service Emergency Committee has been formed which has made certain suggestions for the carrying on of medical work at home with as little dislocation as possible. This body has recommended that retired practitioners who are willing to step into the breach should send in their names forthwith to the Committee for registration and ultimate allocation to temporarily vacant practices. The suggestions that the visiting staff of public institutions should themselves undertake certain of the duties usually assigned to junior resident officers during the absence of the latter, and that school medical officers should be permitted to give at least part of their time to general work, strike us as being thoroughly practical, even if a trifle revolutionary, but in times like the present many of the accepted rules of medical etiquette and practice must be waived in favour of the common good.

Some wise advice was given by Lord Kitchener to the soldiers of the British Expeditionary force upon their departure to the front. After the usual martial and patriotic monitions he dwelt upon the desirability of each man keeping himself as fit as possible, in order that he might serve his country to the best advantage. At that point the ordinary cut-and-dried official manifesto would have ended, but the War Secretary is not given to general phrases in a matter of this kind. He wound up with a specific warning against the temptations of wine and women to troops on active service. This is almost certainly the first occasion in modern times that a General has given detailed advice of that kind to his army, although it was common enough in Puritan and Presbyterian armies and others having strong religious convictions.

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logical factor is therein concerned. Reducing the matter to its ultimate terms it seems probable that any harm to the individual soldier arising from intercurrence is not so much due to the act itself as to the risk of contracting venereal disease. In any case the British soldier will do well to lay the words of Lord Kitchener to heart. In times of peace the strength of the Army is seriously drained by the sickness due to venereal diseases. In times of war the injury inflicted by that class of disease is immensely increased by expending force, in which it is necessary to maintain the highest possible standard of general health.

A Famine in
"606." Of late the incidence of venereal disease has been reduced in both Army and Navy. Not only has the actual number of cases been lessened, but the average stay in hospital has undergone a similar decrease. To some extent this satisfactory state of affairs is no doubt due to the better class of men who now enter the ranks of the Army, and also in part to a better knowledge of the facts of the case and more careful supervision by the authorities. Another important factor is the great improvement in venereal which has taken place in the treatment of venereal disease of all kinds. It will be interesting to note what effect the sudden shortage in the supply of salvarsan and neo-salvarsan have upon the health statistics of the Army. Both forms of "606" are made exclusively in Germany by German firms by processes of the secret of which is carefully guarded. The course of time will be no doubt possible for the English chemists to produce salvarsan synthetically, but at the best they could hardly hope to achieve so difficult a task without many months of arduous investigation and experiment. Meanwhile war with Germany means a famine of salvarsan and neo-salvarsan, that is to say, after the available stock on hand in the United Kingdom is exhausted. It would be difficult to furnish a more striking illustration of the far-reaching effects of war than that afforded by the spectacle of syphilis wreaking its dread ravages upon a populace depleted of the marvellous specific remedy evolved by the genius of the great German scientist, Professor Ehrlich. It is curious to note that a philosophy ridden nation should devote its energies with equal fervour and success on the one hand to the destruction and on the other to the saving of human life.

Anesthetics for the Front. One of the most pressing needs of the military hospitals at the present moment appears to be chloroform, and there are also wanting men to administer it. It is appalling to think that the beneficent and conservative operations of surgery may be seriously hampered, and many of them rendered impracticable, by the lack of the all-important anaesthetic. Morphine may act as a partial substitute, but it is vastly inferior in any of the recognised general anaesthetics, while its use may jeopardise the success of many an operation, even in these days of rapid surgery. It will be interesting to learn whether intraspinal anaesthesia will be employed to any large extent in the base hospitals. For general simplicity of administration and rapidity of induction, the use of one of the chloroform mixtures with ether will probably still find favour, especially with civilian surgeons, not professional anaesthetists, who are called upon to act in that capacity. There can be no doubt that the prevention of shock from an operation is largely a matter of the anaesthetic, and for this reason, as well as to enable surgeons to do other work, there is a real demand for anaesthetic specialists at the front, for an operation has, obviously, a much better chance of success when the surgeon is untrammelled by any misgivings with regard to the safety of the patient. It is reported that several private gifts of chloroform have been made to the Belgian military hospitals, and for these gratitude must be expressed to the donors. There is urgent need, however, for more, and the attention of philanthropic patriots may well be called to the matter.

LEADING ARTICLES.

THE WAR AND THE DRUG SUPPLY.

The general dislocation of trade consequent upon the war has, if we except food, nowhere made itself more acutely felt than in connection with the supply of drugs. The intervention of Government regulation and the partial re-establishment of the shipping routes have, happily, done much to relieve distress consequent upon the diminished supply of food. In the case of drugs, however, the case is somewhat different. A large number of synthetic preparations are manufactured almost entirely in Germany, and for many years past practitioners in this country have been accustomed to employ them on account of their superiority, in many respects, to similar remedies made by home industry. The supply of all these so-called fine chemicals is now cut off until the war is over. Other drugs such as the bromides, and particularly potassium bromide, have rapidly risen to famine prices, owing to the fact that the mineral deposits from which they are at present obtained are found chiefly in Germany. It is most opportune, therefore, that, upon the recommendation of Sir Thomas Barlow, K.C.V.O., and the British Medical Association, a professional Committee has been appointed by the Government to "consider questions arising in connection with the supply of drugs for curative purposes in the United Kingdom, with special reference to the ways in which the medical profession can assist in effecting economies in the use of these drugs of which the supplies are at present small." The following members have been appointed to act upon this Committee, of which Mr. J. Smith Whitaker is the chairman—Sir Thomas Barlow, Bart., K.C.V.O.; Sir T. Lauder Brunton, Bart.; and Drs. A. Cox, E. Rowland Fothergill, B. A. Richmond, F. J. Smith, W. Hale White, and E. W. Adams (Secretary). The principal departments of medical practice are well represented upon this advisory body which has already issued certain notes for the individual guidance of medical practitioners as to how they can economise with certain drugs. It is realised that there are many drugs, the shortage of which is merely temporary, and the sources of supply of these may be re-opened or alternative sources found, within a comparatively short period. In the case of other drugs already referred to the resources of the pharmacopoeia must be tapped in order to find substitutes, more or less efficient, no
CURRENT TOPICS.

The Way Round.

We all know that our drugs are costing us more. If we did not the confidential circular issued by the Government would make us realise it. Apart from the necessary shortage brought about by interruption of communication and an increased demand—which, after all, are only temporary factors—there is the fact that heretofore we have largely depended on the Continent for many of our supplies—notably salicylic acid and its many derivatives, potassium salts and the enormous mass of synthetic products produced mostly in Germany, which have lately found favour amongst us. Now we are expressly prohibited by Royal Proclamation from trading with the enemy, which term covers any person in the German Empire. There is, however, an exception which may be a matter of considerable importance to us—"This Proclamation shall not apply to the trading or commercial intercourse carried on by such person solely from or by such houses or branches of business in such other country." Now, several of the great German chemical houses possess branches or agencies of some sort or other in neutral countries, especially in Great Britain and America, and it seems quite possible that business may be resumed in this round-about way. Of course, there is no prohibition against selling stocks obtained here previous to the declaration of war, and it is apparently possible that we may in the way indicated obtain a share of such subsequent supplies as are available. The question of patriotism hardly occurs. To refuse goods on which the health or even the life of our people may depend, in order to keep a few shillings out of the enemy's pocket, would be a short-sighted policy indeed. And, in addition, in our professional capacities, we are international. We are not combatants but adjusters of the results of combat. We would do our best for the friend or foe who needed us alike. So it were the veriest folly to deny ourselves lawful therapeutic weapons needlessly.

Ambulance Work in War.

The whole country is responding to the Government's call. Everywhere we hear of nothing but corps and rumours of corps. The first idea of the man in the street is to get to the enemy; his ideal is a pair of puttees and a rifle. So be it. In addition to the civilian definitely militant, we find the civilian expectant—the man who thinks to a certain extent and realises that there is such a thing as disorganisation in various forms. Business, family or other reasons keep him from volunteering, and, accompanied by his womenkind, he applies to the varied powers that be for ambulance training. Everybody is taking out courses in first-aid and kindred arts. A great many are impelled to do so by an unquenchable and highly laudable impulse to do something, no matter what. Comparatively few ask what is or will be the ultimate use of so many lectures, demonstrations, and examinations. They realise that the short training they will get will not fit them to understudy the Royal Army Medical Corps on the march in battle, and therefore do not know what else there is for them to do. It is for the medical profession, who will be called upon to teach these eager and largely ignorant throats, to know the exact why and wherefore of all these efforts, and, as we have often found a discreet vagueness in answering the insistent "qui bono?" of the class, let us get the thing down plainly for once.

B.O. 183, issued by the St. John Ambulance Brigade, contains the following as the duties of Brigade Volunteer Aid Detachments:—"They will be expected to be able to give intelligent assistance in the transport of and attendance on sick and wounded in a war of invasion under the direction of senior officers of the Army Medical Service. They will be employed on the lines of communication between the field ambulances and the general hospitals in the following positions: Clearing hospitals, entraining stations, ambulance trains... Rest stations, private hospitals, conveyance homes." Here we have our duties in a nutshell; they apply to all, that is, we now know what our ambulance detachments are part of the country's considered scheme, and for the future we hope to hear no one suggesting that ambulance and nursing classes are a waste of time or a work of supererogation.

The New Recruits.

The physical standard of the new recruits has surprised and delighted the War Office. The number of rejections for physical unfitness has reached a record, far below anything that was expected. This, no doubt, is largely due to the class of men which is presenting itself for enlistment. In times of peace the War Office finds its efforts limited principally to the wastrel class, the poorer members of the community to whom enlistment in the army offers the only chance of relief from degrading poverty. Their descent appears to be mostly the result of the want of sustenance to stave off the pangs of hunger, they contract the habit of smoking to excess cheap cigarettes; tobacco takes the place of food, and from its baneful effects the candidate for enlistment is mostly rendered unfit for the requirements of military service. On the other hand, this class of recruit is largely drawn from the most favoured classes of the community. In them, no doubt, is reflected the good purpose served to the nation by the manly spirit of athleticism. From
the cricket fields, the tennis courts, the football fields, the golf courses and hockey clubs, there have promised various opportunities, and, amongst youths, whose energy and physique have been built up by their passion for the national games. Every now and then the cry has asserted its pessimistic note, that as a race we are degenerating; the proof of which was claimed in the evidence of the rejection at the recruiting stations. The reports in this regard have from time to time made some impression upon the public mind that the pessimists had good ground for their assertions. Happily, however, this war has clearly established that the pessimism of the pessimists was unfounded and wrong. Poor underfed kids are no reflex of the manhood of the nation; but even they, with good chances, can often be converted into good material for the nation's requirements.

The Medical Profession and Bonesetters.

The claim by laymen for bonesetters—so-called—to be entitled to a niche in the temple of medicine is perennial. They talk of justice, of fairness, of the trades unionism of doctors, and punctuate their convictions by pointing to the expert knowledge of bonesetters. And the absence of it in regular members of the profession. Of course, many cases of marvellous cures are related, where the doctors have failed and the bonesetters succeeded. A few weeks ago a long discussion was maintained in one of the morning papers upon the skill and capability of a certain bonesetter, of which examples were given. The editorial was leftly expressed against the medical profession, and howls of execration greeted the insertion of a communication from a medical man who ventured to express the professional aspect of the case, by succeeding correspondents. Curiously enough, too, one or two medical men took the laymen's side, and affirmed their belief in the bonesetter's art. But we do not propose to reopen these arguments in explanation of the attitude of the profession upon this question. That ethical position has been clearly defined upon many occasions. We should, however, like to point out that laymen make the mistake of believing that it is with the power to admit bonesetters, as members of their community. That power does not belong to the medical profession. The question is one which bears solely upon the medical acts. Unqualified practitioners of medicine or surgery are not recognised by the State. On the other hand, if qualified members of the profession, even in good faith, lend any of their support to unqualified practice, their action in this regard becomes illegal, and punishment overtakes them. With the public, however, the matter is different. There is no law prohibiting a layman employing whom he likes to cure him of his ills. But the State cannot tolerate the unqualified and unskilled practice. If the layman elects to consult a bonesetter the matter is purely one between himself and the man whom he chooses. We do not deny that evidence is in favour of the usefulness in some cases of the manipulations of bonesetters, but this can scarcely be urged as a plea in favour of medical men lending their support to unqualified practice—apart from the illegality of the proceeding.

Vaccination in Ireland.

Until within the last few years Ireland was the best vaccinated part of the kingdom, and one of the best vaccinated countries of the world. Unfortunately, the anti-vaccination campaign found a footing in certain districts, and boards of guar-

dians refused to enforce the vaccination laws. The Local Government Board, with whom the responsibility devolves upon them and the medical officers of Irish counties neglect their duties, contented itself with giving mild advice, and took no real measures to see that the laws were obeyed. The results are shown in a return recently published by the Registrar-General. In the year 1912, 82 per cent. of the children born were returned as successfully vaccinated. In 1909 this had fallen to 78·3 per cent. In 1911 it was 72·6 per cent. In 1912 it was further reduced to 66·3 per cent. The falling-off is definitely associated geographically with the anti-vaccinist campaign. It is most marked in the south-east corner of Ireland, and hardly noticed at all in Ulster. Thus, in, e.g., Wexford, only one in seven children born was vaccinated. In Tyrone, Antrim, and Londonderry the percentage of those unvaccinated and preferred to be left unvaccinated was negligible. The Local Government Board, by its negligence, has allowed a very serious condition of affairs to arise.

Sugar and the War.

By doubling the price of sugar, the war has brought home to the householder the need for economy in the consumption of this useful commodity. Sugar may be regarded in two aspects: first as a necessity, and secondly as a luxury. In both respects it is liable to be consumed in excess. As a necessity, of course, sugar is invaluable in the form of a nutritive substance. It serves the double purpose of increasing the nutritive value of other food, while at the same time rendering the latter more acceptable to the palate. In the form of a luxury it figures as so-called "sweets," of which the confectioner's art has produced an endless variety. Hence the person who is said to have a "sweet tooth" is one to whom all sweet things are agreeable, and so is engendered the habit of gratifying that "penchant upon all available occasions. But sugar in excess "dumps" into the human machine is by no means harmless in its effects. Many human ills, directly or indirectly, are the consequence. In the indolent, inconvenient phlegm is a common tendency; dental trouble, again, is often a direct result, for sugar possesses a solvent action upon the enamel which preserves the integrity of a tooth. Again, gastric disturbance is provoking dyspepsia, destructive intestinal fermentation, and the changes produced in the blood indicated in the evolution of certain dermato-

The Psychology of Patience.

The man who first described patience as a virtue was a philosopher to whom the world has since been indebted. His simple enunciation of a great truth showed the means by which the great
burden of exercising patience could be lessened and more easily sustained. Patience, having been endowed with the dignity of a virtue furnishes an ideal at which to aim, namely, that of a high degree of mental control, both of mind and body. The "immortal William"—not the gentleman at present suffering from a bad attack of megalomania—has said: "How poor are they that have not patience," and again:

"Tis all men's office to speak patience To those that wring under the load of sorrow."

The burden of exercising patience has been cast upon us in this country; the patience of waiting for news which never comes, the patience of the moment, in which is concealed from us information which the exigencies of the occasion demand to be kept secret. Among many thousands of our countrymen and women this burden of patience will exact much fortitude and resolution to prevent the support of moral courage from breaking under the strain. Let these, therefore, bear in remembrance that a healthy mind in a healthy body is the first necessary condition to enable them to deal with the burden under which they labour. The maintenance of strength of body and of mind is a sure means for combating successfully the trials of the situation.

Water-borne Diseases. Many rumours have been current during the past week or two of attempts being made to poison the water supplies in various districts, the majority, if not all, of these being absolutely without foundation. Local authorities are fully alive, however, to the possibility of such malicious contamination of water destined for drinking purposes, and the curious sight may be witnessed in some parts of London of the guard rails of the entrances to reservoirs by Territorials. As a matter of fact it would be almost a physical impossibility to poison drinking-water by chemicals in bulk without being detected, and even if this were to be carried out it is doubtful whether the quantity so introduced would be sufficient to produce the desired effect. Far more deadly would be the contamination of a water-supply by pathogenic microorganisms of the variety known to be transmitted by this channel. There is a greater necessity than ever of keeping water supplies up to the bacteriological standard of safety. This warning was uttered only last July at the Congress of the Royal Institute of Public Health, held in Edinburgh, when Prof. J. M. Beattie read an address in the absence of Prof. Ritchie before the Section of Bacteriology and Comparative Pathology on the relationship of bacteriology to water-borne disease. In some country districts the danger of polluted wells still exists, and even in places where the supply is taken from rivers or reservoirs it not infrequently happens that coliform bacilli find their way into the water. The frequent bacteriological examinations of water supplies, however, are almost all admissible in the interests of public health, and never was it more urgently required than at the present time. In the meanwhile it is safer to boil all drinking water in cases where the slightest doubt exists as to its purity.

The Office of Coroner. A movement is on foot in America to abolish the office of coroner. It is held that in order to determine the exact cause of death the coroner is compelled to call in the aid of experts to decide the matter for him. Again, it is maintained that the coroner's jury is a useless expense, inasmuch as their verdicts are in accord with instruction furnished by the expert evidence. The idea seems to be that instead of a coroner being called upon to inquire into the cause of death the case should be made over to the police from the beginning. So in America a Board of Inquiry would be constituted, consisting of a skilled pathologist, the district attorney, and a representative of the police department, to investigate every case in which the cause of death was uncertain, either in consequence of the suspicion of crime or from any other reason. This board would be empowered to summon witnesses, and the cause of death having been determined, the matter would end, save in cases in which evidence was forthcoming of the commission of crime, when the police would take action with a view to the arrest of the suspect or suspect person. The proposed change seems to have been suggested on the score of economy, though it is doubtful if it would be more efficient than the present system. The coroner's court is admittedly a costly process in this country. The advance, however, of medical science has removed some of the difficulties of ascertaining the cause of death, and an inquest seems to be in some cases as a person of some expense and the means of making public facts which expert knowledge has already revealed. One advantage of such a reform may be best illustrated in the numerous cases in which inquests result in verdicts of death from natural causes. For example, an elderly man suddenly drops down as the result of a heart attack because no one can tell the means by which death took place, the machinery of the coroner's court is set in motion to determine the point. Then a post-mortem reveals rupture of a cerebral artery and cerebral hemorrhage. Under the alternative system the dead body would at once pass into the hands of the police; the police would then summon a coroner, and having found that the man had died naturally from cerebral hemorrhage, the matter would end. It is urged that economy, simplicity and efficiency would be attained, in the place of unnecessary formality, expense, and the interruption to business generally entailed upon the attendant jurors. The details of the system, of which the above is a mere outline, would naturally require careful consideration in order to achieve the object in view. Some responsible official would have to preside at such an inquest, and it hardly seems likely that the ancient office of coroner, held as it generally is by professional men qualified in medicine and law, will be superseded in this country yet awhile.

PERSONAL.

Dr. EARLDEY HOLLAND, M.D.Lond., M.R.C.P., F.R.C.S., has been appointed Assistant Obstetric Physician to King's College Hospital.

Dr. H. Drinkwater, of Wrexham, has been elected President of the North Wales Branch of the British Medical Association for the ensuing year.

Dr. Alexander Gibb Glass, M.A., M.D.Edin., D.P.H., has been appointed an Assistant Medical Officer under the Durham County Education Committee.

Dr. Oliver Field has been appointed Deputy Medical Officer of Health for Wandsworth during the absence of Dr. P. Caldwell Smith, who is serving with the Territorial Force.

Two private wards at the Newbury District Hospital were opened the other day as a memorial to the late Dr. R. J. Kerby, a well-known practitioner who was greatly esteemed in the district.
CLINICAL LECTURE

ON

MITRAL STENOSIS: ITS PROGNOSIS AND TREATMENT. (a)

By R. OSWALD MOORE, M.D.Oxon., F.R.C.P.Lond.,
Consulting Physician to the Western General Dispensary, Marylebone; Physician to the Hospital for Diseases of the Heart.

Clinically the ordinary picture of a case of mitral stenosis is well known to all practitioners. The most common case is that of a young woman, say, between 17 and 30, who comes complaining of shortness of breath, or headaches, or cough, or some symptoms of indigestion. To all appearance it might be a case of anaemia, simple dyspepsia, or perhaps phthisis; at this stage nothing but an examination of the chest will disclose the cardiac lesion, which is frequently detected without there being any cardiac symptoms at all. In this guise the previous history will generally disclose the fact that the patient has suffered from rheumatism, chorea or frequent quinsies, or it may be scarlet fever; in very many cases, however, there may be no history of previous illness. Nearly all such cases are, I think, primarily rheumatic, especially when one realises how slight and indolent may be the manifestations of rheumatism in early child-hood—nothing more, perhaps, than transient pains in the limbs which may be mistaken for growing pains, or a temporary stiffness of the neck. As compared with mitral regurgitation there is no doubt that mitral stenosis is associated with less pronounced forms of rheumatic fever. Some, however, have maintained that mitral stenosis is sometimes of congenital origin, but I have failed to discover any satisfactory evidence of this.

Mitr al stenosis does, indeed, sometimes occur as a result of arterio-sclerosis, but this is not at all common, and appears at a later age than the more ordinary form. Speaking generally, mitral stenosis is more frequently met with than mitral regurgitation, and we find most frequently in women between the ages of 22 and 40. It is rare to meet with clear evidence of mitral stenosis under the age of 10, though mitral regurgitation is common enough in quite early childhood, but the lesion of stenosis takes some time to develop, as it is due to the slow contraction of mitral fibrous tissue. It is true in children the left auricle does not usually contract with sufficient force to give rise to the presystolic murmur. On the other hand, cases of mitral stenosis in patients over 40 are more usually of the arterio-sclerotic type.

Diagnosis.—In its more obvious aspect mitral stenosis is the easiest to diagnose of all the cardiac lesions; palpation along the left side of the chest being often sufficient for the purpose, as the presystolic thrill (often best felt in the sitting posture with the body bent forwards) is most characteristic of the lesion and the long, rumbling presystolic murmurs running up to the first sound and varying in limited area is equally significant. In my experience this murmur is often heard in the recumbent posture, when it has not been audible with the patient standing up—particularly if he is made to raise the left arm. The only case in which a presystolic murmur can lead us astray in diagnosis is when, in aortic regurgitation, the regurgitation of blood into the left auricle brings about a virtual stenosis at the mitral orifice; this goes under the name of Flint's Murmur. It may be distinguished from the true presystolic murmur of mitral stenosis as follows: (1) It is never so loud or rasping; (2) the presystolic thrill very rarely accompanies Flint's Murmur; (3) the systolic shock is tapping in mitral stenosis, forcible and rather heaving in aortic regurgitation with a Flint's Murmur.

In an ordinary well-compensated case we should expect to find accentuation of the pulmonary second sound, owing to the increased tension in the pulmonar y area caused by the obstruction at the mitral orifice. At times we may find a reduplicated second sound in the pulmonary area or at the apex, where it is due to the first inrush of blood in the ventricle, such inrush being more sudden and forcible than under normal conditions from the increased blood pressure in the left auricle due to obstruction of the mitral orifice. The cardiac dullness is increased to the right; owing to atrophy, rather than hypertrophy, of the left ventricle, the dullness is not likely to be much, if at all, increased to the left. There is often a more pronounced enlargement of the right side of the heart in mitral stenosis than in mitral regurgitation.

In those cases which develop in connection with arteriosclerotic disease, however, the increased pressure of the second sound, because the blood pressure will be raised in the systemic circulation owing to: the arteriosclerosis no less than in the pulmonary area, hence the two sounds will be approximately equal and there will be no reduplication.

As the disease progresses the auricle becomes gradually weaker, and consequently it has no longer sufficient force to produce the presystolic or auriculo-systolic murmur, hence we may hear in its place a mid-diastolic or even an early diastolic murmur. This latter one must be careful not to confound with the murmur of aortic regurgitation, which is softer and more bounding in character, and not less obvious in the region of the apex. This is the point at which to speak of auricular fibrillation, about which so much has been said by recent writers on cardiac disease. Though auricular fibrillation may occur under a variety of circumstances in which there is degeneration of the myocardium, it is with mitral stenosis that it is particularly associated, so I will just say a few words about it here, though it would be more suitably dealt with in a lecture on cardiac arrhythmia.

Now, the ordinary beat of the heart starts at the mouth of the great veins opening into the auricles, and this is known as the 'sino-auricular node.' Beginning here the impulse passes down the auricles along the auriculo-ventricular band or bundle of His to the ventricles. This is the normal mechanism of the heart beat. But, in various conditions of disease the impulse does not start in the normal place, but in other positions, and then the fibres of the auricle may contract irregularly with no sort of co-ordination; the muscular walls of the auricles are in a position of diastole, complete systole is never accomplished, the structure as a whole rests immobile, close observation of the muscle surface reveals extreme and incessant activity, rapid and minute twitching with an un-
Clinical

Definitely has had well he the mentalization normal of frequent presystolic sound only which aortic sound are mistaken of hemiplegia, catarrh, usually traction. whipped the feet, dilated in tissue; insurance of passive congestion, may be mistaken for indigestion, or general malaise, and the physical examination discloses a pre-systolic thrill and murmur at the apex; such symptoms are probably not due to the cardiac lesion, they may be readily removed by some quite simple treatment, and years may elapse before the patient again appears with signs of a definitely broken compensation. Women, by reason of the greater tranquillity and sedentary character of their lives, are able to continue for a longer time than men unaffected by this lesion. As, however, the narrowing of the orifice becomes more pronounced, only a small volume of blood is ejected into the arterial system at each systole, the general nutrition becomes correspondingly poor, the complications in the lungs become more probable, the normal metabolic processes are interfered with and general nutrition becomes defective.

When once the compensation has broken down it is restored much easier than in the case with mitral regurgitation, because the narrowing of the mitral orifice causes an imperfect filling of the left ventricle, so that the heart itself obtains an insufficient supply of blood and thereby cardiac weakness is promoted. When mitral stenosis is established in late childhood it has a worse prognosis than if it first occurs in adult life, partly owing to the progressive tendency of the constriction of the orifice, which is more marked in early life, and partly owing to the fact that the stenosed orifice does not increase in size while the growth of the heart continues.

In considering the case of a young adult of either sex with a compensated mitral stenosis, the prognosis will depend on the nature of the work and the ease with which the patient can continue his occupation, and on the first premonitions of an impending breakdown; then again, the whole condition of his life, the house in which he lives and the climate must be considered. Still more important is it, in my opinion, to take fully into consideration the rheumatic history of the parents and collaterals, for the likelihood of a further attack of rheumatic fever will have a most unfavourable influence upon the prognosis.

In the case of women the question of pregnancy and childbirth often comes before us, and in many cases I think we may take a fairly favourable view; thus, if the cardiac lesion is well compensated, matrimony may be permitted; if there have been one or two previous breakdowns, if allowed at all, it must only be after giving full warning of possible dangers. Should the patient have reached the stage of pulmonary congestion with albuminuria, then marriage is clearly quite out of the question. As an instance of how well these patients may pass through pregnancy and childbirth: (1) I had a woman, art. 24, who came to me at the hospital suffering from mitral stenosis and regurgitation—she had had her marriage at the age of 12, and her mother had suffered from it four times; palpitation of the heart and dyspnoea were severe. She improved very much
under treatment, and compensation was restored.
I did not see her again till five years later, when
she came to the hospital at my request, and
found that she had married three times previously
and had given birth to a child which she had
nursed for 13 months. The physical signs were
unchanged, but she had no cardiac symptoms. (2)
Another case was a woman, act. 22, with mitral
stenosis and regurgulation, who improved a
good deal while an in-patient at the hospital for six
weeks. She appeared again four years later, when
she had been married 18 months, had had a
child seven months old, which she had nursed for
two months; though short of breath, her general
condition was distinctly better than when I had seen
her four years previously.
A few months ago I had a letter from a doctor
in Nova Scotia detailing the case of a woman who
had mitral stenosis in early life, but passed success-
fully through 12 pregnancies and reached the age
of 50 before there was a serious cardiac break-
down.
Hemoptysis, pointing to engorgement of the
pulmonary circulation and rupture of blood-vessels,
is rather a serious symptom. Hemiplegia, due to
thrombosis, generally admits of a speedy recovery,
which may be permanent.
Secondly with regard to prognosis may be
derived from the physical signs. It is important
to note carefully the second sound at the apex; so
long as the second sound is audible at and beyond
the apex, there is little or no liability to the
occurrence of symptoms, and no immediate danger
of a cardiac breakdown; when, however, the
second sound is no longer audible at the apex
through any cause, it will be no symptoms under
ordinary conditions of life, any slight extra exertion
may provoke them. The disappearance of the
presystolic murmur and the substitution for it of
a mid-diastolic or early diastole murmur is an
unfavourable sign, indicating as it does an in-
creasing feebleness of the left auricle; the advent
of the auricular fibrillation is a definitely unfavour-
able condition, though it is fairly amenable to
treatment, and a patient with it may live as much
as ten years, yet the compensation of the heart
is never completely restored. It is important to
note the accentuation of the second sound in the
pulmonary area, for, as it diminishes in intensity
we get evidence of the failing of the right ventricle.
The cases of mitral stenosis associated with
arterio-sclerosis have, of course, a much less
favourable prognosis, because the lesion is
necessarily progressive. The future, in fact,
depends on the rapidity of the advance of the
sclerotic process of the valves and heart muscle.
In these cases the dyspnea is particularly distressing,
and they sometimes die suddenly from angina
pectoris. Thrombosis is common in this form of
mitral disease, whereas embolism is more
characteristic of the endocarditic forms which we
have been discussing, giving rise, if pulmonary,
to infarcts and a localised pneumonia, while, if
cerebral, causing hemiplegia. Cardiac arrhythmia,
which is not so common in the pure forms of
mitral stenosis, occurs frequently in these arte-
ro-sclerotic cases, owing to the sclerosis of the
myocardium and the fact that the heart has to
struggle against hypertension in the systemic as
well as in the pulmonary circulation.

Treatment.—This does not differ materially from
that of other forms of valvar lesion; it is always
a question of estimating the strength of the heart
for doing its daily work and considering how far
this may be reduced. At first when the patient
comes complaining of breathlessness on exertion,
it is quite possible to resume ordinary life
again in a somewhat less active way. Later on,
when there is a definite breakdown, the question
of drug treatment arises. In many cases con-
siderable benefit will be found to arise from
ordinary tonic doses of iron and arsenic, if these
are unsuccessful, small doses of digitalis may well
be tried; in those cases in which small doses of
digitalis continued over a long time prove so very
efficacious. When, however, the condition is one
which is described as auricular fibrillation, of which
we have spoken above, then is the time for large
doses of digitalis—say, m. x. every four hours, of
course, with the patient at rest in bed. The
digitalis is here thought to act by protecting the
ventricle against excessive stimulation from the
auricle by inhibiting the conduction of impulses in
the bundle of His. When there is much oedema
of the legs it is difficult to improve on the well-
known diuretic or Niepceur's pill, which consists of:

Pil. hydr., gr. j.;
Scillae, gr. j.;
Digitalis, gr. j.,
which is most effective in removing the oedema
and minor degrees of ascites. When this line of
treatment fails, I have found most satisfaction from
theobromine, gr. v. t.d.s., which is a powerful
diuretic and also has a tonic effect upon the
heart. In cases where the ascites or pleural effusion
is at all considerable, tapping must, of course, be
resorted to. In the cases in which the mitral
stenosis is associated with arterio-sclerosis and, as
is often the case with renal cirrhosis, then the line
of treatment must be mainly dietetic, and consists in
avoiding nitrogenuous food and all uric acid
producers, while employing drugs which lower the
arterial tension, such as the iodides and nitrates.
Digitalis, on the other hand, is usually unsuitable
in this form of mitral stenosis.

Note.—A Clinical Lecture by a well-known teacher
appears in each number of this Journal. The lecture
for next week will be by Sir Arbutniet Lane, Bart.,
M.S., F.R.C.S., Senior Surgeon to Guy's Hospital,
and to the Hospital for Sick Children. Subject:
"Fractures."

ORIGINAL PAPERS.

THE
EMPLOYMENT OF HYPOPHYSARY
OPERTHERAPY IN GYNECOLOGI-
CAL PRACTICE: ITS IMMEDIATE
RESULTS. (a)

By PROF. M. F. JAYLE.

[Specially Reported for this Journal]

The relations between the ovarian gland and the
other ductless glands have now been for many years
the collective object of researches, of which the
results, although they are still in large proportion
without the limiting border of accurately definable
precision, are nevertheless capable of translation into
the language and applied practice of some positive
realities. One method of studying these relations
consists of the recurrence in clinical experimentation
of the time-honoured methods of ophotherapy.

(a) These researches were carried out in the gynecological
clique of the Faculty (Prof. S. Puzzi), at the Hospital Broa.
In this way I have recently been led to try the effects producible by the administration of pituitary gland to female patients affected with various utero-ovarian pathological troubles.

In carrying out these clinical investigations I had recourse to the hypophyseal fluid prepared by the method adopted by Choay. The gland selected is that of the ox, of which the mean weight is 2.2 grammes; 1.8 for the anterior lobe, and 0.4 for the posterior. (b) The hypophysis is treated by desiccation in vacuo, which yields 0.5 grammes of powder for the whole organ, 0.4 for the anterior lobe, and 0.1 grammes for the posterior. This powder is used in the preparation of the solution to be injected. It is divided into three parts; of these it is treated with solvents which extract from it certain active substances of which the nature has not hitherto been precisely ascertained. The solution thus charged with the active substances is subjected to a process of concentration till a dry residue is obtained. This residue is then dissolved in an aqueous solution of sodium nitrate, to which a solution of the base is added; and then the latter is gradually heated to ebullition, so that the thermostable constituents only are now left, and the noxious principles produced by microbiic action have completely disappeared. The direct consequence of following out this mode of procedure is that the injected solution contains but a restricted proportion of the active substances of the gland; the powder which has hitherto utilised only the solution prepared from the posterior lobe. Each ampulla contains 1 c.c. of this solution which corresponds to 0.05 grammes of the powdered posterior lobe of the hypophysis—that is to say, to one-half of that lobe.

The hypodermic injections were made beneath the skin of the posterior aspect of the thigh, on the upper outer, and a little below it, and the injections were given at intervals of two days, and daily in some exceptional cases. The quantity administered was at first that contained in a single ampulla, but I have been led by experience to recommend commencing with a third or a half, with the object of minimising the slight, but quite clearly defined, indications of intolerance in My cases, especially at the initial stage of the treatment. It has seemed, in the progress of my experience, that emaciated and intractable women bear somewhat large doses less well than do those of other types. Thus I have come to arrange a quadruple system of dosage (Nos. 1, 2, 3, 4), corresponding to the respective quantities of 2, 1, ½, and ¼ of the posterior lobe of the hypophysis, and I recommend beginning the course of administration of the remedy with the No. 1 dosage and a gradual increase till the No. 4 has been reached. In treating hemorrhages, I practise daily injections; in other cases, I adopt a series of ten injections, administered on alternate days, and the intervals between which are successively twenty-four, forty-eight, or six days, according to the requirements indicated by the conditions of the individual case. The amount of dose can also be graduated in the course of treatment from No. 1 to No. 4.

The injections are either painful to a very slight degree or quite painless. In my series of more than 400 cases, only one patient was found to have ever produced the effects are immediately manifest. The patient blanches at once and retains the palloid tint for several hours. She usually experiences some colicky pains, and in a good many instances complains of headache during the first day and insomnia during the first night. Generally speaking, the injection produces a feeling of fatigue and I accordingly advise patients to take complete rest on the day on which the injection is administered. For this reason, too, it is best to have it given in the patient's home.

The effects obtained have been: diminution and, fairly often, complete arrest of local discharges, whether red, yellow, or white; diminution, and fairly often, complete arrest of abdominal pains; diminution of congestion, of wandering—so-called rheumatic—pains of the limbs; suppression of menstrual clottings, while, with regard to the menstrual period itself, I have in most cases noted a diminution of the interval; exceptionally an increase, and occasionally a regularisation. I have treated by this procedure various patients suffering from chronic hypophysary over-secretions, uterine subinvolutions with metrorrhagia, uterine sclerosis of the menopause period accompanied with metrorrhagia, chronic non-suppurative salpingitis, chronic ovaritis, uterine fibroma, inoperable epiphlebitis of the cervix accompanied with haemorrhage. In order to estiimate the result more accurately I have suppressed the use of all dressings, and, frequently even the vaginal injections. The immediate result has proved satisfactory, and I do not hesitate to recommend this therapeutic procedure at the present date, while awaiting the revelations of the remote ones.

Thus hypophysary epo-thetepny seems to me to render distinct service in cases of young women affected with metastatic Fallopian tubes and peritoneum, which, while of comparatively slight nature, prove rebellious to ordinary treatment; also in those of women suffering from the metrorrhagia which accompanies the period of menopause, and in patients who are habitually tormented with attacks of recurring symptoms of pelvic congestion without any specific lesion. It may also prove useful as the complement of all conservative operations, when the results obtained by the latter have not been completely satisfactory. It may probably succeed in replacing electrotherapy, radiotherapy, and radium-therapy in certain indications for therapeutic procedures which have recently been relegated to the influence of the former.

The ovary (ovaria) seems a complex one, but we observe all the characteristic signs of vascular constriction. Nevertheless, it has appeared to me from the observation of certain facts that the ovary is itself influenced in its secretary function by the effects of administration of the substance of the hypophysis. The results of some observations which I have sketched here for the reader will enable him to render count of the immediate effects of hypophysary epo-thetepny. They are taken from the reports of the series of cases which I treated in the Hôtel Broca, in the service of my chief, Professor Pozzi, and of patients treated in my city practice. I have at present fifty cases actually under treatment, and the immediate results which I have obtained in the whole, have been decidedly favourable. Those reached in the series of ten cases here specially presented, and which have been taken at random from the general report, will enable him to estimate the effects of hypophysary epo-thetepny, which have usually been very favourable, and sometimes nil (as in obs. IX.).

Obs. 1.—Metritis. The patient, at the age of 23, was a nullipara. There was an enormous hypertrophy of the cervix; the ovaritis was more marked on the left side. Ten hypodermic injections were given between January 12th and February 12th. Improvement of the menstrual disorder and relief from pain followed immediately, and the latter had completely dis-

appeared after the sixth injection. The cervix was improved, but not quite cured; accordingly treatment with hot air was commenced. The improvement continued through March; an injection was given every sixth day, and at the end of the month the patient felt well. Menstruation had occurred twice since the beginning of the treatment; the flow was less abundant and not accompanied, as before, by a sense of fatigue.

Ours. II. Chronic metritis with ulceration of cervix.

Double salpingo-ovaritis, more marked on left side (vomiting and distress with the left salpingitis.—The patient, aged 28, had menstruated at 12, and had shown some symptoms of pulmonary tuberculosis during the past ten years. Had had miscarriages at 21 and 24. There was copious menstrual discharge, also metrorrhagia. Eleven hypodermic injections were administered between January 12 and February 13. The improvement was immediate. Metrorrhagia ceased completely after the third injection. After the fourth injection the menstrual period was ten days in advance (they had usually been five or six days in advance), but there was no formation of clots—which had previously been always in evidence and very voluminous.

From the commencement of treatment, there was a history of hemorrhage. The patient, aged 26, had had an abortion on the 9th of December—after a month’s pregnancy. Loss of blood commenced from January 15 to February 10; during the last week of that period clots of the size of the closed fist had always been forming. From February 16 to 28 six hypodermic injections were administered. There was immediate amelioration of the haemorrhage, followed by its complete disappearance.

Ours. IV.—Pelvi-peritonitis without any extensive lesions.—Nulumpsa, aged 24, was neurotic and suffered from very severe pains, especially on the right side (diagnosis of appendicitis, of salpingitis, of abscess). Between January 27 and March 14 eleven hypodermic injections were administered. Marked amelioration of pain. Total disappearance of white discharge (which had not been very abundant). The last menstrual period has been greatly lessened after ten injections.

Ours. VI.—Metritis, double ovaritis, pelvis varicose, lysis.—Nulumpsa, aged 27, Menstrual period seven or eight days in advance. Loss of weight during hypodermic, 20 kilos. Had sought advice on account of the pain and discharge, both red and white, which had continued during the previous seven months, and went on increasing in quantity. Seven hypodermic injections were administered from February 6 to March 11. The pains disappeared completely; the vaginal discharges became increased. These appeared a week beforehand, and much more abundant (little more was lost during previous three months). Bowels more regular. At close of menstrual period some white and yellow discharge reappeared. At the end of March improvement continued, with the condition of continuing the treatment.

Ours. VII.—Metrorrhagia of three months’ standing.—Patient had menstruated at 15, and borne three children. For the preceding three months the red discharge had necessitated the use of a fresh napkin daily. No abdominal pain. Headache and renal pains during past ten days. Half-ampulla of cocaine injected daily for seven days. Hemorrhage almost quite disappeared after the first injection, and entirely after the third. The headache and renal pains disappeared very rapidly.

Ours. VIII.—Double chronic post-abortal salpingo-ovaritis.—Patient a nullumpsa, aged 10. An abortion of four years previous date had been the starting-point of her illness. Menstruation had commenced at 13 years; it was now a little irregular, and accompanied by clotted. She had sought advice on account of very acute abdominal and lumbar pains, and very copious yellow discharge. From February 15 to February 25 five hypodermic injections were administered, with much production of the pains and discharge. The menstrual flow then appeared at one date, less abundant and less painful, of deeper red colour, and with less clotting. After menstruation the patient felt well; then, on placing a longer interval between the injections, the pains began to regain their strength, though with diminished intensity. March 28th: improvement continues, but only on condition of continuing the treatment.

Ours. VIII. Parametritis. Pelvi-peritonitis.

Fixation of uterus.—Nulumpsa, aged 26. Miscarriage at four months, in 1910. Menstruation at 13. Since miscarriage, menstruation had been irregular and painful. Administration of fourteen hypodermic injections from January 26th to March 10th. Diminution of discharge and amelioration of pain after fifth injection. Menses appeared after tenth injection, and much more healthy than any of those of the preceding period. Pains disappeared after thirteenth injection. Menses on March 16th, which lasted four days (instead of five or six) and were accompanied with a small quantity, though with a little pain, and had appeared four days in advance. At the end of March all went well, on condition of repeating the injection every third day.

Ours. IX.—Cystic salpingo-ovaritis, with chronic parametritis and pelvi-peritonitis. Hyperplasia of hirsute system.—Nulumpsa, aged 22. From January 17th to February 10th seven hypodermic injections were given, without any satisfactory change in way of improvement.

Ours. X.—Inoperable epithelioma of cervix.—Patient, aged 48, had had red discharge during past year, accompanied during last three months with formation of clots. Very weak, stooped in walking, unable to maintain erect posture in standing, on account of severe pain in right side. The result, noted on March 24th, after ten hypodermic injections, was as follows:—Complete cessation of loss of blood; some yellow discharge only. Patient holds herself erect, walks with comfort and feels stronger. The pain in right side has greatly diminished. Urine more healthy. Constipation continues. Quite naturally there is no local amelioration.

THE PRESENT POSITION OF

OPHTHALMOLOGY IN SCHOOL HYGIENE. (a)

Dr ROBT. A. AASKINS, M.A., M.D.Dub., D.P.H.

CANTAB.

School Officer, Lancashire Education Committee.

OPHTHALMOLOGY is one of the largest branches of school hygiene, and both from the point of view of the teacher and of the child it is one of the most important, and yet it is a branch which is admittedly on a most unsatisfactory footing. One of the chief reasons for this is that eye work differs from other branches of school hygiene in that most doctors have not had the highly specialised training necessary for ophthalmic work, and it is not possible for the ordinary school child to employ the specialist; on the other hand, the country is flooded with opticians who cannot carry out the examination essential for prescribing glasses for children.

(a) Paper read at the Annual Meeting of the Royal Sanitary Institute, July, 1914.
In our schools at present there are numbers of children wearing wrong glasses. There is a further crying demand for improved methods in eye work for such problems as that which the large number of cases of squint present, a deformity which involves blindness in one eye, apart from its ugliness. In most places the decision as to whether a child needs glasses or not depends upon its failure or otherwise to read a given line on Snellen’s test types, which is a very unsatisfactory and, indeed, unscientific method. Snellen’s types are at best a very rough and often unreliable guide in the case of children, and they cannot be used for a very large and important section, viz., children who are unable to read.

At the opposite pole to illiterates, there are the children who read below our arbitrary line on Snellen’s types. There are a number of children who read 6/6 and even 6/6 and who yet require glasses. Assuming, however, that the child’s vision is defective to a definite extent as estimated by Snellen’s types, it is then absolutely necessary that the school doctor should know what is the cause of the defective vision, and for this reason alone, viz., that Snellen’s types give us no idea as to which of the widely differing causes of defective vision is present, the recommendation of children for glasses on an examination by Snellen’s types alone should be condemned. In the first place there are many cases of defective vision which are not due to refraction errors at all, and in any instance, the child may have a temporary spastic condition of the ciliary muscle, which may simply require a short rest to set right. I have known of many cases where such children have been told they require glasses. One case went twice a ten-hour journey there and back to an eye hospital to be informed of the fact. There are again cases of fundus conditions, small opacities, etc., which are brought to light by an ophthalmoscopic examination.

By far the most important point, however, is that the school doctor should know in the case of a rejected child whether the case is one of hypermetropia or myopia. I intend later to make a few remarks as to these conditions, so widely differing in aetiology, treatment, and prognosis, that the entire consideration of the case depends upon which is present, and will content myself here with stating that it is absolutely necessary for the doctor’s examination to disclose this fact.

A third reason why ophthalmoscopic work should be done in schools is the presence of a very large number of wrong glasses in schools. There are a number of children wearing actually harmful glasses, e.g., hypermetropic children wearing myopic glasses. Almost any eye will get a temporary increase in the sharpness of definition of objects by putting up a low minus glass, and this is the common resort of an unscrupulous shaman who cannot find any glass which will improve the child’s vision. The ultimate result of such treatment is disastrous. There is in addition a still larger number of children wearing glasses so bad that they are practically useless from a point of correcting the refraction error.

I need scarcely say that no doctor can tell whether a child’s glasses are correct without an ophthalmoscopic examination. It is asking the doctor to say whether the bottle and the dosage are correct before he knows what is the matter with the patient. I mention it, however, because the point is a serious one, and because there are very erroneous ideas on the subject among medical men. Assuming, then, that the present position of eye work in schools is unsatisfactory, what can be done to remedy this?

A proposal was made recently by some of the Staff of the Royal London Ophthalmic Hospital, where a large number of eye cases from the schools are treated by arrangement with the London County Council. They suggested that all children who do not read 6 0 in either eye as well as if they should be sent to the hospital or treatment centre for examination. This would, perhaps, be the ideal; but, as is sometimes the way with ideals, it is doubtful whether it would be possible to get so many children, a large number of whom do not require glasses, up to the hospital. Those who have experienced the difficulty of getting even cases we know to be serious to the hospitals will, I think, agree with me in this.

The correct plan, I think, is for the school doctor to carry out an ophthalmoscopic examination of eye cases in the school itself. With one exception, all difficulties are thus got rid of at a single stroke. This one difficulty is that the school doctor must be an experienced ophthalmologist, and really good work will not be done in this important branch of school hygiene, until all school doctors are trained ophthalmologists. The necessity for this has so often been emphasised elsewhere that I will not comment on it further here.

I come now to a point I put aside previously, a point on which I wish to lay emphasis. It is the necessity for the school doctor, having decided that the child’s eyesight is defective, knowing which of the causes of defective vision is present in a particular case.

Firstly in reference to myopia. I am quite aware that there are different views held on this point, but I think that the majority on one side is so great that we may assume that all cases of myopia should be fully corrected. In order to do this all cases of defective vision should be diagnosed by the ophthalmoscope. Further, as myopia, even of low degree, tends to increase in very many cases between the ages of, say, nine and fourteen, all such cases should be periodically examined with the ophthalmoscope in order to keep the strength of the glasses up to the proper level.

I would like to draw special attention to hypermetropia. I have felt convinced for years that in school work we are needlessly, nay, harmfully submitting large numbers of cases of low hypermetropia to the unpleasant burden of wearing glasses. I am well aware that I am hereuttering what many will regard as heresy. It may be mentioned that in the estimate given by Dorrell 77 per cent. of all people are reckoned to have such an error. As, however, the point is one which may meet with opposition, I will invoke the testimony of an ophthalmologist of the highest standing whose name is familiar to all of you. I refer to Mr. R. W. Doyne, from whose work I quote freely in what I am about to say. He expresses the point in somewhat striking terms in saying: ‘If the word “error” is used it will indicate an error.

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is a very common thing to meet with in schools, and is more common in childhood than at any other period of life. Doyne divides eye-strain into two fairly distinct varieties, which I will consider separately. The first is due chiefly to peripheral conditions, i.e., in the eye itself. The second is chiefly due to central conditions, i.e., in the brain.

The most prominent feature of the first is pain and discomfort in the eye itself, especially at the back of the eye. This may be due firstly to a high degree of hypermetropia, error, which is definitely beyond the power of the ciliary muscle to counteract. In these cases glasses should undoubtedly be prescribed, whether for constant use or not depending upon the particular case in hand. Secondly, the cause of the peripheral eye-strain may be hypermetropia of low degree, and this is one of the classes of school children where glasses are often not only unnecessarily, but even wrongly prescribed. It is, to quote Mr. Doyne, as if a person has to walk many miles daily, and you put him to bed to develop his legs instead of encouraging careful exercise to increase his muscular vigour. Many such cases put into glasses are simply artificially manufactured invalids. Such cases require careful exercise of the eye and not glasses (except in certain instances). The child has got a little too fast and has exhausted his power temporarily. He requires to develop his ciliary muscles more carefully, by which means he can be put in a condition to do his work perfectly satisfactorily and be spared the infliction of wearing glasses. The latter course may simply mean prolonging or even rendering permanent the weakness. In cases of mild cardiac disease one does not recommend rest, but encourages a compensatory hypertrophy by means of exercises.

The second category of eye-strain to which I wish to refer is very common in school life, namely, the one due to central conditions, and chiefly to fatigue on the fusion centre. I can only go into the subject briefly, and must refer those who are interested to Mr. Doyne's paper, where the matter is fully gone into. The cause of eye-strain in cases characterised by headaches, often described as sick headaches, and confined chiefly to the frontal area. It is due not to fatigue of the ciliary muscles, but to exhaustion of the fusion centre of the brain. It is fatigue of this centre, or rather of the interaction of the fusion centre of the brain with lower centres controlling the ciliary muscles, that is the cause of the variety of eye-strain in children. It is not the ciliary muscle that is at fault. That this is the case is proved by the fact that those who have done much refractive work among children are familiar with, namely, the comparative rarity with which eye-strain is found in squinters, even where there is a considerable degree of hypermetropia, and also in one-eyed children. The reason for this is that although the ciliary muscle has just as much work to do, the fusion centre is no longer attempting to form binocular vision.

The same thing is exemplified by the extreme frequency of eye-strain in cases of anisometropia, the strain being due not to the ciliary muscle, but to exhaustion of the fusion centre of the brain which is attempting to fuse two very different images. Similarly in myopia, ocular headaches are much less common because no effort of the ciliary muscle can neutralise the myopia, and consequently the fusion centre does not exhaust itself in attempting to obtain a clear image, as it does in the case of hypermetropia. The treatment of most of these cases is suitable rest and suitable work, not glasses. At present the child is simply being, as it were, worked. I would like to anticipate an objection which will be raised, namely, that the error may cause the child to approximate its eyes to its work and so, owing to excessive convergence, possibly be a predisposing cause of myopia. If the child really cannot read comfortably without closely approaching its eyes to its work, then, by all means, put it into glasses. This will, however, only comparatively rarely be found to be the case in the class I am speaking of. I may mention that a much more fertile source of eye-strain, the eye-strain of approximation is habit acquired in infants' schools by the child doing work it is not fit to do at that age.

In summing up I would urge:—1. That the school doctor must be a trained ophthalmologist. Till this is the case we can have little hope of good eye work being done in schools.

2. That all cases of myopia should be picked out and receive a much more careful supervision than is the case at present. The ophthalmologist will discover more cases of myopia and correct them earlier than he will anticipate. All cases of myopia in the upper school should be known, got into glasses, and kept under very careful supervision, especially with the view to levelling up the glasses.

3. The recognition and careful consideration of cases of hypermetropia, and especially before ordering glasses for low hypermetropia, the estimation of the degree of the defect being a primary consideration. Secondly, the substitution of the principle of encouraging the development of the ciliary muscle rather than taking its work from it. No hard and fast rule can, of course, be laid down. Every case must be dealt with on its own merits, including the physical condition of the child, the symptoms produced, and the degree of hypermetropia.

4. As to squint. This problem can never be dealt with satisfactorily until it is, to some extent, at any rate, taken over by the school doctor. Many cases require supervision extending over long periods, and treatment in the infant school is not only carried out in school, e.g., orthoptic treatment. Till this is done thousands of eyes will be let go irretrievably blind.

In conclusion, it is no want of faith in the value of glasses that has prompted these remarks. It is, rather, faith in the enormous value of glasses which makes me urge a more scientific employment of their use and the hope of drawing some attention to the great, and at present sadly neglected, field of eye work in school life.

SOME CLINICAL POINTS ON DIET IN THE TREATMENT OF PULMONARY TUBERCULOSIS. (a)

By C. MUTHU, M.D.,
Chief Physician, Mendi Hills Sanatorium, Walls, Somerset; Consulting Physician to Lady Margaret Hospital, London.

TUBERCULOSIS is chiefly met with in children with disordered nutrition and disturbed metabolism brought about by unhealthy conditions of civilisation. The digestive organs seem to be the first to suffer from civilised life. When the sanatorium treatment was inaugurated in this country some 15 or 16 years ago the treatment consisted
in fresh air and hyper-alimentation. Now a great change has come over for the better in this respect. Generally speaking, consumptive patients at the early and curable stage do not require more food than others. As a rule the open-air treatment together with the regular life led in a sanatorium creates a healthy appetite which requires no compulsion or encouragement. It is impossible to formulate a standard diet suitable to all tuberculous patients, as they differ in age, sex, temperament, height, weight, etc. Diet constituted upon scientific calculation as efficient and satisfactory does not always work out correctly in everyday practice. Man is a living organism and a mere notion cannot be given to the digestive organs concerning the amount of proteins and carbo-hydrate from a given amount of food. The great secret of dieting sanatorium patients lies in using every natural means to create a healthy appetite and if possible avoid all artificial aid in the way of medicine or patent or concentrated foods. I believe in the three meal system. The stomach is the greatest friend of the consumptive. The gastric organs should have four hours’ rest between meals and should not be given as an excuse for breakfast, dinner and supper, except a cup of tea about 4 o’clock. The more rest given to the digestive organs the better and more efficiently will they serve the patient. Over-feeding is both unscientific and injurious. Forced feeding is not necessary in the earlier stages of the disease and is not of much use in the late stages, when the stomach is too enfeebled to digest any food. Many Continental physicians have spoken against the evil effects of over-feeding. (a) In my own experience, over-feeding induces dyspepsia, haemoptysis, dilatation of stomach and intestinal disturbances. Contrary to ordinary experience I find that an excessive meat diet feeds the disease, induces intestinal auto-intoxication, keeps up the temperature and retards the arrest of tuberculosis. A turred tongue, bad taste in the mouth, constipation, headache with slight pyrexia and sleeplessness are symptoms that the patient is having more food than he can digest, and the diet should be cut short. Meat is really the last article of diet and should be given with caution, as I have seen Europeans, Indians and Arabs get cured of tuberculosis on vegetarian and fruit diet. Especially patients with weak digestion should not be over-fed. If after a few days’ trial ordinary meals produce feelings of discomfort food should be cut short and the stomach given rest. If dyspepsia or anorexia still continues it is a good plan to try two meals a day. I have found over and over again that patients who cannot eat are all the better for abstaining from food and then their appetite returns. (b) Another plan is to have a light meal after awhile and then they are able to relish their food after a fast. In fact, fasting is a leaf taken from nature’s book. It is surprising how little women patients eat as compared with men and still gain weight. The secret of successful diet depends more upon attention to economy in diet than by giving way to extravagance. We do not sterilise milk as we used to in the old sanatorium days, as we find our patients thrive better on fresh milk. I am convinced that milk to be nourishing and digestive should not be boiled or sterilised but given in its raw fresh state. I entirely agree with Dr. Vincent, of Manchester, when he said that he could not establish any relation between the consumption of raw milk and the incidence of tuberculosis.

Patients who lose weight have a gain of weight is not always an index to the patient’s improvement in the condition of the lung. I have seen active mischief continue in fat patients and arrest of disease take place in those with slender frames. The gain of weight does not depend upon any particular time of the year. Laugh and grow fat is a scientific truth. A man with a placid temperament gets more nourishment out of a small amount of food than one with an irritable frame of mind. Behind food lies the power of digestion. Over-feeding and behind this again lie the condition of the mind. Worry and anxiety, mental strain and stress interfere with the physiological functions of the stomach and healthy metabolism. Therefore, the sanatorium physician in arranging the diet of the patient should take into consideration the mental condition and temperament, the habits of life and idiosyncrasies, and only by discrimination and individual attention and placing the patient in a happy and cheerful frame of mind can be successfully wage war against tuberculosis. (a) Professor Lawe, Dr. Mouniess, Professor Robie, in The Medical Press and Circular, Sept. 30th, 1908.

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THE MEDICAL PRESS. 221

ST. THOMAS’S HOSPITAL.

A CASE OF CARCINOMA OF THYROID.—Under the care of Mr. Ender M. Corner.—Operating on a case of simple tumour of the thyroid, Mr. Corner said that there were a few details in operating on this organ. First, the area of excision should be adequately large and after the example of the “collar” incision advocated by Professor Kocher, of Berne. Secondly, there must be no haemorrhage, all vessels being clamped in two places and divided between. Thirdly, the tumour must be “shelled out” as closely as the capsule as possible so as to avoid all injury to the recurrent laryngeal nerve. An injury, such as division, of one recurrent laryngeal nerve would not be noticed at the time, or during the patient’s convalescence. Indeed, the lesion may escape notice until the first sore throat the patient catches after the operation. Then the voice is hoarse and the lesion discovered. There exists no general landmark for this nerve, and it only escapes injury by the surgeon’s keeping close to the tumour or leaving the posterior part of the lobe of the thyroid. Hence Mr. Corner believes that many more are cut than are present recognised. Fourthly, these wounds should be sewn up and not drained; though a big cavity is better drained for 24 hours. Most tumours like this are adenoma, often in part cystic. But it is no uncommon event for the pathologist to find in them carcinomatous change. The prognosis is good in such cases, though in general carcinomata of the thyroid are of bad prognosis. In this connection, he mentioned the case of a woman of about 60 years of age at the time of operation, who was discovered about six years ago with carcinomata of the thyroid. He excised the whole thyroid, but found great difficulty in removing the carcinoma adherent to her trachea. Microscopically the growth was that of the thyroid, but of a more chronic and recumbent form, and had in some cases been adherent to the trachea and picked out first one and later the other recurrent laryngeal nerve. When both of these nerves were paralysed there was bilateral abductor paralysis, and it was necessary for her to wear a tracheotomy tube. In spite of the daily use of thyroid extract the poor woman’s health got worse and worse. Kind people got her into a Home for the Dying. Mr. Corner said he had an authority that she is the only person who has walked out of that Home! With the nursing, feeding, and care the woman got slowly better and
CORRESPONDENCE.

FROM OUR SPECIAL CORRESPONDENTS ABROAD.

UNITED STATES OF AMERICA.

AMERICAN LEGISLATION TO MINIMISE ILLICIT OPIUM TAKING.

(Continued from our last issue.)

The first step in this was to evade the importation of smoking opium by the Act of February 6th, 1900. But this law has no effect upon the excessive importations of medicinal opium, nor does it prevent traffic between the states of the Union. As a matter of fact, opium is largely smuggled at its lowest sell by the authorities as soon as it passes the Customs House. And as there is no prohibition against manufacturing smoking opium, this matter is left to the individual States, only a minor portion being forbidden this manufacture; and even in them the law is not always effective. This could be easily done through a prohibitive internal revenue tax of, say, a thousand dollars a pound on all smoking opium manufactured, There is mooted such an amendment to an old act of 1890.

The control of interstate traffic is, however, a much more difficult matter, for each State is autonomous, under the constitution of the Union, except in such matters as has been specifically excepted for delegation to the United States Congress. The States are jealous of the encroachments of Federal power, which have been attempted and failed in much more important matters than the regulation of the opium traffic. We are waiting for all the States to pass laws restricting the importation of opium before that traffic be properly controlled. If this is the case, we may look forward to such a scandal as has been presented by the laws for regulating divorce and for the licensing of joint stock companies, where a single State, for the sake of the accruing fees, has connived at and licensed grossly immoral situations in order that its treasury may be enriched by those to whom it pays no account of the fact that other States do not conventionalise, police, or govern adultery. It is only by a law to regulate the interstate traffic in forms of opium that some such procedure could be prevented for a long time.

Since the Act of 1890, little smuggling has been attempted, except at Pacific ports and along the Mexican border. The scope of the Act has been greatly augmented by the action of the Canadian Government; since July, 1908, it has prohibited both the manufacture and importation of opium, which was formerly so extensively smuggled from across the Canadian border. The success of the Act is largely due to the provision that possession of the drug, coupled with evidence to authorize conviction, unless possession can be explained to the jury's satisfaction.

The State of California has already modified its laws for controlling illicit dealing in habit-forming drugs (April 21st, 1909). By this Act the sale of medicinal opium is 17 per cent., less than before, of morphine 27 per cent., of cocaine 40 per cent., and the use of smoking opium has been reduced to a minimum, so much so that its price has risen from $16 to $50. Another effect is that the importation from Asia has decreased, and many Chinese are returning home, as they are unable to obtain the opium to satisfy their cravings. Besides, many addicts are entering the agricultural and sanatorium to attempt to cure this craving. The Physicians and speculators report that an increasing number of smokers believe that opium dens are a thing of the past, thanks to the provision which constitutes the possession of narcotics a crime.

COCAINE.

It is estimated by Dr. Hamilton Wright, one of the United States Opium Commissioners, that at most 20,000 oz. of cocaine are required for surgical purposes in the United States. There are manufactured at least 150,000 oz. This is mainly consumed without medical sanction by habitual users who seeks its narcotic effect. The drug is the most pernicious one used in the Western world, as it drives its consumers to a life of crime which does not hesitate at murder. The negroes of the South have become very fond of it, and it is distributed to them by unscrupulous white dealers, generally through relays of middlemen who sell it in small quantities, very often to othermen, who sell it to the consumers in still smaller quantities. It is very difficult to convict any of the chain; and the profits are enormous, as it can be bought for about $25 and sold for $300. There are generally sold in one or two grain packages for a quarter of a dollar each i.e., a profit of 480 per cent. Whisky is often charged with it and sold in the shebeens of the South. It is claimed that contractors deliberately give it to ignorant negro workmen in order to induce them to furious energy for work. It is claimed, too, that rape by negroes, for which so many have been hanged, is often contributed to by intoxication with cocaine. Its use to corrupt young girls to prostitution is alleged; but there is no doubt that the drug is also extensively penetrating the Army and Navy, and even to the educated element of the population.

TARIFF LAWS.

The new Tariff Act of February, 1909, imposes the following:

Crude opium, not adulterated, with at least 40 per cent. of morphia, 25 per pound. When dried or otherwise prepared, 82 per pound.

Morphia, or other alkaloids of opium and their preparations, for use in medicine, 35 cents per pound.

Cocaine or its derivatives, 85 cents per oz.

Coca leaves, 5 cents per pound.

Liquid preparations of opium, 40 per cent., ad valorem.

FEDERAL LAWS REGARDING COCAINE.

By an Act of March 3th, 1900, the Postmaster-General has power to prevent passage through the mail of cocaine and other dangerous drugs. There is a fine of $1,000,000, or imprisonment for not more than two years, or both, for either offence. The American manufacturers of cocaine asked Congress to place upon its prohibited list, but the prohibitionists in other States. Unscrupulous druggists or physicians may in this way imprint the drug habit in hundreds of people. Moreover, there is nothing to prevent anyone from ordering it from a manufacturer in another State that he desires a narcotic for sale in his own State, where he could not obtain it on account of not being licensed. Only by Federal control of the interstate commerce in narcotics is it possible to reach illicit dealers of this kind.

(To be continued in our next.)
FROM OUR SPECIAL CORRESPONDENTS AT HOME.

SCOTLAND.

GLASGOW.

Sir Donald Macalister in Germany.

Sir Donald Macalister, who has been undergoing the cure at Bad Emms, was, with Lady Macalister and Miss Macalister, before the exiled foreigners who were turned out of that place at very short notice. They were sent under military and police protection to Nassau, and thence to Limburg and Frankfurt. At Frankfurt, Principal Medizin, and "Universitats-Rektor," was placed in charge of a party of seven, consisting of invalids, English ladies and their maids, who had been patients at Emms. He received from the authorities a pass permitmitting them to travel by way of Holland to England. All luggage had to be left behind. The party was forwarded slowly from point to point by military train, as opportunity offered, by way of Coblenz and Cologne. Everywhere military and civil officials, private soldiers and private citizens showed the party the utmost consideration and kindness, and apart from the inevitable hardships of a state of war no incident that could even be described as unpleasant to point out. The Principal was indebted to some generous Germans, previously unknown to him, for advances of money, without which he could not have proceeded on his journey. From Cologne the party, with a large number of English and American fugitives, proceeded to the Rhine by Dutch steamer, thence to Rotterdam, whence they proceeded to Flushing by train and crossed to Folkestone. They had no news of events at home from July 27th until they reached Rotterdam on August 5th.

SPECIAL GRADUATION FOR THE ARMY.

A special final examination in medicine has taken place at Glasgow University for a number of candidates who had completed their course of study and desired to volunteer for active service. It concluded on Saturday, 13th inst., and the 22 candidates assembled about five o'clock on the same day to hear the result. Nineteen, it was announced, had passed. These were immediately marshalled in the Senate Room, seven of them wearing khaki uniform beneath their academic gowns. The degrees of M.B. and Ch.B. were conferred on them by the Vice-Chancellor (Sir Donald Macalister) presiding.

RADUN FOR GLASGOW.

The committee some time ago appointed to secure a central supply of radium for Glasgow and the West of Scotland, have received subscriptions amounting to over £7,300, and the Bellahouston Trustees have promised a donation of £2,000. For three years they will take the expense of custody and administration and afford a proper trial for the scheme, provided the future progress, in the Trustees' opinion, justifies the continuation of the grant. Arrangements have been made for the purchase of 200 milligrams of radium, which will be ample for the committee's requirements in the meantime, and the University authorities have placed a room in the University at the disposal of the Committee. This room is in course of being fitted up as a radiometric laboratory under the supervision of Professor Fredk. Soddy, F.R.S., and on his recommendation a very capable physical chemist has been appointed. Arrangements are in course of being completed by the medical authorities in the city for the treatment of patients by radium.

WAR ITEMS.

Professor Sir William Mac ewen is among those who have been appointed consultants by the Medical Department of the Royal Navy, and who in most instances have been detailed for special duties. Among the 500 first elicited from Glasgow was one which was being spread by a man apparently pretending to be one of the doctors of Stobhill Hospital, Glasgow, to the effect that some Scots Greys were lying wounded in that hospital.

BELFAST.

MEDICAL ARRANGEMENTS IN BELFAST IN CONNECTION WITH THE WAR.

The Corporation Committee of Management of Hospitals and Dispensaries of the City of Belfast has decided to offer to place at the disposal of the military authorities for hospital purposes such accommodation as may be available at the Albert Bridge Road Institute, and the Cemeteries and Parks Committee have placed at the disposal of the authorities the Exhibition Halls of the Daisy. Arrangements may be made available for hospital purposes if necessary. It is also suggested that the latter Committee, associated with the Public Health Committee, might in addition arrange for the provision of volunteer medical and nursing staffs if such be required.

ROYAL VICTORIA HOSPITAL.

The Board of Management of the Royal Victoria Hospital has sent the following telegram to the War Office: "The Royal Victoria Hospital, Belfast, offers fifty beds at once for wounded sailors or soldiers, and a further fifty beds on twenty-four hours' notice." Similar arrangements are being made throughout the province, as in Downpatrick Infirmary and in hospitals in Portrush, Coleraine, and other places. Some of the hospitals in the province of Ulster which had been intended for the use of the Ulster Volunteer Force are temporarily placed at the disposal of the military authorities.

Samaritan Hospital for Women, Belfast.

The General Committee of the above hospital have passed the following resolution: "That the General Committee of the Samaritan Hospital for Women, Belfast, desire that the number of the nursing staff and assistance of the nursing staff and assistance of the hospital be increased by the military authorities, and the practical impossibility of obtaining fully qualified nurses to carry on the work, the Committee feel reluctantly compelled to close the hospital for the present."

LETTERS TO THE EDITOR.

[We do not hold ourselves responsible for the opinions expressed by our Correspondents.]

INFANT MORTALITY.

To the Editor of The Medical Press and Circular.

Sir,—The Executive Committee of the Associations of Infant Consultations and Schools for Mothers asks their co-operation in the Press to point out to all those who have the charge of young infants that many deaths and much illness may be prevented by the observation of a few quite simple principles of mother-craft. Of these principles they cite the following among the most important:

1. To persevere with natural feeding up to the end of the ninth month, or even longer, even though the mother is compelled to go out to work. Employers of female labour are earnestly requested to give nursing mothers opportunities for feeding their babies.

2. To do in those cases in which such opportunities are impossible weaning is by no means necessary. A supplementary feeding of cow's milk will not disagree with the infant and may save the infant's life.

3. That the chief causes of illness among nurses and other babies is irregular and too frequent feeding by day as well as by night: intervals by day should not be less than three hours, and at night a long interval of some six-eight hours should always be provided.

4. Expectant mothers should also seek advice as to their own health, either by consulting their doctors or by attending the schools for mothers.

5. That stimulants are not only unnecessary, but are harmful both to nursing and expectant mothers.

To me as the head of a very large mothers' meeting, where discussion of this question has for many years been kept to the front, it is annoying to see the 4th and 5th clauses without any insistence upon the need for mothers to refrain from dosing themselves or their children with anything excepting with any drug or medicine except some simple laxative like castor oil, and never to do even this without
full confidence that at any rate she is doing no harm. Infants—be they advertised in every cheap paper; their sale must be enormous, and can be found in the majority of poor homes. They help to kill and directly kill a vast number of babies yearly. This ought to be explained to mothers, and they should be implored to send for their babies or themselves to court. The mothers can be made to understand that the frequent show of pain is mostly due to the load of indigestible food it carries in its beak, which is a proper treatment for proper feeding. After clearing out the load from the bowels, and they can be made to understand that when anodyne quack medicines are given the pain may be put an end to for a time, but the form of torture continues, and the disorder advances towards death. The infamous wretches who live on quackery, unhappily at present not amenable to the law, hire clever scribes to indite their lying statements which entrap their simple victims; and the newspapers that set themselves up as guardians of the people put them in for paltry gain in the guise of editorial matter, knowing that thus they are participating in crime. I have noticed in the Lancet a few paragraphs in which it forms one of the biggest scandals of the day, especially as the great bulk of leading papers set the example. I am, sir, yours truly,

A Doctor's Wife.

Manchester.

FORCIBLE FEEDING.

To the Editor of The Medical Press and Circular.

Sir,—Dr. Clement Sers says "forcible feeding" is a "medico-legal question," that is to say, it is a question of the legal aspect of a medical act. Let us, therefore, look at it from these two points of view.

(a) Medical Aspect.—Forcible feeding is certainly not employed, as Dr. Sers asserts it is, to keep militant, hunger-striking Suffragists alive, because if it were then all such prisoners, including Mrs. Pankhurst, would be forcibly fed.

In fact some prisoners are fed and others are not, by favour of the authorities. Of course, Dr. Sers no doubt knows the Home Secretary has given up the miserable farce of calling forcible feeding "medical treatment," and that Mr. McKenna in the House of Commons even said it was a "most objectionable practice.

Clearly then, Dr. Sers must entirely alter his view of forcible feeding, and he will possibly agree that, as was indicated by the Home Secretary in the House of Commons, it is really a punitive procedure or in plain English a form of torture. That this is so is also shown by the fact that, though medical treatment (real) is given in all prisons, two prisons have been detailed for this particular purpose—namely, Holloway for England and Perth for Scotland. This leads naturally to the other aspect of the matter which we may now glance at.

(b) Legal Aspect.—Forcible feeding, though not "medical treatment," as we have just seen, is nevertheless a criminal act. Doubtless Dr. Sers would meet this point by saying that as prison doctors are sworn in as constables they are in the position of any prison warden who may be ordered to flog or otherwise punish by torture a prisoner, and the law may be true, and it often has been asserted, I have never been able to see that this special attribute of a prison doctor's work was compatible with the honourable position of being a member of our profession.

Perhaps Dr. Sers may be able to suggest how forcible feeding as practised in our prisons is compatible either with British principles of equal justice to all prisoners or with the humane ethics of medical practice.

The last two paragraphs of Dr. Sers' letter are not germane to the issue. I have shown many times since the Leighe case, five years ago, that the attempts of anti-suffragists to crush by brutality and force the movement for universal suffrage only creates outcries. Therefore, Dr. Sers must ask the anti-suffragists to find an answer to this question of forcibly feeding and that monstrous failure the Cat and Mouse Act are not answers.

I am, Sir, yours truly,

Victor Horley.

25, Cavendish Square, London, W.

August 10th.

THE INFECTIVITY OF CANCER.

To the Editor of The Medical Press and Circular.

Sir,—Although I have no desire to attempt to discuss this question from a scientific point of view, I am in entire agreement with you that the pernicious and one-sided attitude of the late Press in disseminating these (presumably) cancer "scare" amongst the general public; nevertheless I have good reason to believe that many medical men were unawakened—at any rate, until quite recently—to the infectivity of cancer, and it is only fair to state that a few years ago I wrote to your contemporary the Lancet on this very question, and, although my letter was not published, I immediately acknowledged it, and stated that his experience was not in accordance with mine. In case, however, any of your readers may still entertain doubts, I presume to offer a few facts and figures, although evidence operates differently on different thinkers, but I do so, if possible, to influence them, and probably to many others, that, inasmuch as in the vast majority of instances medical men cannot be found who have treated or attended two cases of cancer in any one community simultaneously, this affords sufficient and considered evidence, to my thinking, that this disease is not infectious, for the simple reason that the same cannot be said of any other infectious or even contagious disease, either syphilitic or parasitic. Having a special interest in the subject, I recently purchased at a second-hand dealer's an old book entitled "The Nature and Treatment of Cancer," by Walter Hayle Walshe, M.D., Physician to University College Hospital, London, which, which seems to coincide with what I have just stated. Dr. Walshe's views are briefly as follows:—"The opinion that cancer ranks amongst diseases transmissible from individual to individual by means of an infectious principle is not even at the present day without its supporter... Of the thousands of individuals engaged in attendance on cancerous persons, how many become similarly affected? Were the disease transmissible, would it not have been natural for doctors or their two or three years the bed of their cancerous wives, being seized with the malady, yet a single authentic instance of such an occurrence remains to be recorded." Yours etc.,

Clement H. Sers, M.R.C.S.

5, Chancotbury Road, Hove.

August 21st, 1914.

REVIEWS OF BOOKS.

ACUTE ABDOMINAL DISEASES. (2)

Since the appearance of Lejars' "Urgent Surgery" we have not met with a clearer description of abdominal emergencies and their treatment than in the present work. The teaching is sound all through and eminently reasonable. We welcome the collaboration of physician and surgeon, for acute abdominal diseases come under treatment by all members of the profession, and it is necessary to set forth every point of view. We are glad to see that immediate operation is advocated in acute appendicitis, and that the various complications which may be met with on opening the abdomen are adequately considered. The chapter on hernia is admirable; we would like to see more exact details given with regard to the treat-
of herina en glitate. There are operations for this condition, after which there is no necessity for the patient to wear a truss, and they require very little more time for their performance than the one described. Every author seems to be writing a preliminary chapter on the anatomy of the part under discussion, but we consider that if the surgeon about to operate does not already know instinctively the anatomical arrangements with which he has to deal, he had better ask the case over to somebody who does. We do not blame a surgeon for refreshing his anatomical knowledge before an operation, but we think that he would scarcely require to seek the position of the ascending colon on the course of the deep epigastric artery. If a chapter on anatomy is necessary it should deal very fully with the subject or should be confined to special details which the author has found to be of special importance. We would suggest that every surgeon who reads the last chapter on the diseases which simulate acute abdominal lesions; we are afraid that the possibility of their presence sometimes occurs to the surgeon after he has opened the abdomen. This book is a good one, and we would recommend it to everyone who is beginning the practice of surgery, and it would do the most experienced surgeon no harm to consult its pages.

**Therapeutic Value of the Potato.** (a)

This monograph is based on an article contributed by the author of the *Lancet* of April 11, 1914, and it deals with his researches into the therapeutics of the common potato. He finds two outstanding properties in raw potato-juice. First, a prompt relief from pain, and, second, a rapid absorption of fluid in cases of synovitis. At first sight the potato would not seem likely to possess any great curative effect. No alkaloid is present, and potassium salts are the chief ingredient. Anyway, in the author's hands it gave results, such as to press the juice out of the tubers, remove the starch and nitrogenous matter and concentrate with heat till an extract five times the strength of the juice is obtained. This is the *extract solium liquidam*.

An ointment, a liniment, and a plaster are made, and the sterilised extract is also put up in ampoules. Dr. Howard gives details of his methods and results, and finds that great benefit results from the use of his preparations in synovitis, gout, lumbago, rheumatism, and bruises. We hope others will be equally successful.

**Lourdes** (b)

This volume provides an account of the focus of pilgrimage which so conspicuously attracts both the exalted priest and the scientific curiously. For this man of very much emancipated generation. It is sure to be widely read, as the general attitude of the public—wide in all its conflicting views—and the very exceptional abilities of the author must combine towards the total effect of concentrating attention on a document of which the very title suggests so much of life and inspiration—and contradiction. Mr. Belloc very justly represents the *status quo* in his interesting and well thought-out preface: "Lourdes means a meeting or emotional, political, and religious theory, for which that word stands."

And we believe that we are fairly accurate in our suggestion that Lourdes may also be taken as the standard of the militant champions of the claims of the spiritual part of the human organism in opposition to the unquestionably well-worked ones of the material substratum. We will venture an opinion that Mr. Belloc has a visible as well as tangible foundation of truth for his statement that: "The men who control our Press today are as ignorant as they are brutalised by intrigue and avarice, and blinded by these and other appetites to reality and to proportion." Those who have been in intimate contact throughout with the limits of the intellectual media of the past quarter of a century must—if quite candid in the expression of their views—admit that the above presentation is by no means an unfair one of at least one profile view of the general mass of our political and social developments and engineered, as it has come to be, by the grossest mechanical materialism. Without attempting to formulate any opinion regarding the mutual relationship of mind and matter, and attempting to refute the oscillating claims for relative ascendency—which are advanced by self-styled advocates, we would just point out to the inquiring reader that the continuous influence of mind over matter—for the spiritual and emotional over this chemical and gravitational—are being continually ignored (whether unconsciously or otherwise) by persons who have every day presented to them examples of the sudden blanching of fear, the raptant glow of hope, and the ashens of hopeless sorrow with the invisible microbe always lying in ambush. The self-satisfied materialist may also be invited to ponder over the suggestion that it is to the attempt to suppress the emotional aspect of human nature and to eradicate all vital phenomena to the dictates of the rule of three that misguided humanity now owes the evolution of the nihilist and the sufrafuge. The object lesson of Lourdes may be read in very varied lights.

**Cancer of the Rectum.** (a)

For several reasons this book is noteworthy, first, because it gives the experience of a personal expansion; the surgeon who must be regarded as one of the founders of the modern treatment of rectal cancer; second, because the author's conclusions are based on a very great number of cases; and third, because the book abounds in practical details and lessons of treatment. The comfortable way of applying a T-shaped bandage is described. The book is of interest with regard to the history of the subject as it concludes with summarised conclusions written in 1876. We are more in accord with Mr. Cripps' treatment than with his pathology. The relationship described between epithelial cells and leucocytes is puzzling in the light of modern pathology. Neither do we agree with him as to the relative uselessness of the sigmoidoscope. With patience this instrument is usually a useful aid and sometimes invaluable. We find only three pages devoted to the combined method of operative and irradiating treatment. The book, however, does not pretend to deal exhaustively with the subject; it is simply a record of personal experiences in this branch of surgery, and as such is valuable.

**Applied Psychology.** (b)

The present readable and handy booklet furnishes an important as well as interesting item of testimony to the quality and prevalence of the methods and attainments of our motile democracy in its present transient stage of progressive evolution. We have here the obvious aim at popularisation of one of the most intricate subjects of human investigation, and the suggested hope of making the same available for the less learned—the lessons—lessons being presented in apparently clear and self-revealing sentences and paragraphs; and skimming, if not exactly penetrating, the receptacles of thought and displaying to view the weapons used in its arsenal. And the result obtained is what would have been anticipated by those who know something about these matters: the diction and phraseology are usually good—as such things go; the statements and style are free of the same style and the introductory "Introduction" is one of the most readable and illuminating sections of the text; and the general standpoint is apparently that of omniscient vision combined with the "total internal reflection" which veilingly and smoothly reflects all intellectual (6).

light in the direction along which their luminosity is desired. The average educated voter will have learned a good deal—though, we feel sure, not nearly so much as he will feel disposed to think—by looking down the closely read volume, that he has securely and permanently mastered. We incline to think that this compendium of things psychological and philosophical would have pleased the great Lord Chancellor Ilchester and his satellites. At the same time, the level of Herbert Spencer—an estimate which would be regarded by most contemporary writers as very high praise. It presents a contributory item in the movement of procrustean standardisation, which seems to aim at bringing all human intellects to the same uniform level, in the coming generation, all over the whole area of civilisation. The result will hardly prove a brilliant one to persons of our way of thinking: the amateurs will be sufficiently numerous to crowd out—almost to suffocate, or actually crush—the experts, whose dwindling numbers and opportunities will eventually leave the psychology and most other high-class intellectual work to be begun all over again. Meanwhile, for those who like this sort of thing, the booklet before us will, we think, prove acceptable.

**LUXOR AS A HEALTH RESORT.**

This is the second edition of a booklet of which the first issue appeared just a year ago. The date thus tells the tale of public appreciation. The name of Luxor calls up the glass picture, before the imagination of the historian, the ethnologist, the religious, and the soldier, as well as one of discriminating attraction before that of the meteorologist and the exultant of modern sophistication. At the same time the whole remains associated with the earliest extinct annals of king-craft and of priest-craft, with the most pronounced peculiarities of climate above and of terrestrial productivity below, as well as with the many recorded records of battlefield achievement and of political chicanery: of the quasi-miraculous conquests of the greatest of warriors and of the greatest of engineers.

**PROGNOSIS IN PULMONARY TUBERCULOSIS.**

This large octavo volume is thoroughly representative of the zeal, honesty and tenacity of purpose which carries the earnest citizen of the Vaterland through so many an intellectual hurdle. It is the highest quality. No available source of enlightenment—of all the beams and scintillations, old and new—that has been hitherto focussed on the dark places of the origin and destruction of the great and almost last vestiges of tuberculosis has been able to have escaped the researches of our authors. And we are glad to observe that some of the most respectfully mentioned conclusions of the endless list of authorities quoted in the present encyclopaedic volume are the old and uncontradictable observations and suggestions which are to be found embodied or outlined in the aphoristic expressions of clinical experience that date back to the days of the inspired "Father of Medicine" himself, or even earlier. Thus we find it, Gunzburg, always discussing the subject in 1861, informed his readers that the "sanguinische, plethorische, lebhafte, reizhafte Subjekte sind mehr gefährdet als solche von eher kühler Natur." Koranji expressed the opinion that: "Ruhianges Temperament, Besonnenheit, starker Wille, um schädlichen Einwirkungen auszuweichen, verbessern die Ausichten; sentimentale, bitzige, zynophile Natur verschlechtert die Prognose;'' and so forth. And thus it will go, Gunzburg, always discussing the subject in 1861, informed his readers that the "sanguinische, plethorische, lebhafte, reizhafte Subjekte sind mehr gefährdet als solche von eher kühler Natur." Koranji expressed the opinion that: "Ruhianges Temperament, Besonnenheit, starker Wille, um schädlichen Einwirkungen auszuweichen, verbessern die Ausichten; sentimentale, bitzige, zynophile Natur verschlechtert die Prognose;'' and so forth.

**INTERNATIONAL CLINICS.**

The present volume is on a par with other numbers of this well-known quarterly. It contains eighteen articles under the headings of Diagnosis and Treatment, Medicine, Surgery, Neurology, and Enginics. Rather mere prominence than usual is given to psychotherapy. All the articles are well up to the standard that the editor and publishers have led us to expect, and the illustrations to such articles as are illustrated are good.

**SCHOOL LIGHTING.**

This monograph is issued by the Medical Officers of Schools and is patronised by the School Board, and originally read. The question of both the daylight and the artificial lighting of rooms where numbers of children are to work is one of great importance. Till 1863, when Cohn made his investigations with reading type, no notice had been taken of the matter. Cohn concluded that the window area in every schoolroom should be at least one-fifth of the floor area. Various other authorities have increased the proportion of window area. Ker and others have shown that a window area actually greater than that of the floor. The amount of light can be measured by various angular calculations made from the worst lit desk as well as by Dr. Ker's instrument somewhat on the lines of a scientific camera, which can be placed on any desk and the light value immediately read off. The direction of the illumination as well as its intensity has to be considered. As we are right-handers our light must fall from the right, with artificial shadows while writing. Cross shadows and ventilation has to be taken into account, as well as the whole system of artificial lighting. In this case the chief bacteriological pathology, and with the varied clinical adaptations of the therapeutic qualities of tuberculin notwithstanding.

**PHYSIOLOGIE NORMALE ET PATHOLOGIQUE DES REINS.**

This beautifully printed octavo contains a comprehensive summary of the results which the researches of recent years have contributed towards the illumination of this domain of clinical knowledge. Indeed, it represents in its most luminous and intelligible aspect grade of achievement that has been found attainable in the characteristically "modernist" attempt to reduce the principal function of an organ of the living mechanism to the definite expression of a single element such as a chemical, while inevitably suggesting the halophilic-epigraphic laws that of correspondingly definable limiting powers may in the future be proved to control the respective functions of the various other glands of the human economy. The terms expressive of renal filtration and permeability have been shown to correspond but very remotely to expressions of actual fact. The study of the modified functions of diseased kidneys in the Hospital Nephrology is especially pointed out, and the chloruro-constants of secretion, especially the former; and the fact that the Académie des Sciences has this year awarded the "prix Monthyon" to M. Ambord, the highest distinction awarded by his country as a reward for his research on the renal and urinary physiology, in the manner in which the issue of the quality of his work. We accordingly have no hesitation in recommending the present volume to the attention of every earnest practising physician. The quantity of new and enlightening material here collected and lucidly displayed is too large, and its quality far too high, to make any attempt at critical detail either logically just or scientifically desirable. The contents of this volume should be assimilated in toto; we will guarantee their nutritive property.
difficulty is to have enough light without glare. Black boards are a frequent source of trouble, as it is often almost impossible to place them so that the writing is visible without strain by some of the roomful of children. Dr. Nasch has compressed a great deal of information into a small compass, and his book will be of the greatest value to any medical man who may be concerned with the designing of a school or similar building.

THE STUDY OF RÖNTGEN RAYS. (a)

This well-printed and well-illustrated actavo is a good introductory text-book of the very curiously fascinating, as well as instructive and clinically useful and research. It is written by a skilled expert in the domain of physical science, and in the present labyrinthine structure of one of the profoundest strata of that vast and puzzling edifice, the exposition and corroborative testimony of an expert guide is absolutely necessary. It should be at every student's disposal at all times.

It is a very valuable book, and should be recommended to all who are concerned with the teaching of the subject. It is well printed, and the illustrations are in perfect accord with the peculiar nature of the subject with which it deals. The illustrations and diagrams are very well selected and clearly printed, so that their presence adds greatly to the power of a skilfully written text. The small volume will have a wide distribution, as it seems to us to have all the qualities desirable for an introduction to the larger clinical manuals, and to the clinical practice in which Röntgen rays now take so very important a part.

INDUCED CELL PRODUCTION. (b)

Where would the sciences of physiology and pathology now stand if the amoeba had never been discovered, or created, or evolved? Echo, of course, answers—but we can all offer a probably approximate guess. The key of the doorway and pathway to all those illuminating researches is furnished by "a working hypothesis that normal cell production and benign tumours are caused by certain reagents called auxetics, such as tyrosin, creatin, etc., and that cancerous tumours are caused by a mixture of auxetics with another group of substances, called kinetics or augmenters, such as choline and cadaverine." The volume before us deals with a very great number of physiological and pathological conditions, and their possible bearing upon more important collateral movements and facts. We do not think that a majority of the questions opened have been finally answered—it is not possible, and we by no means think it should be just yet—but a great deal of new light is being continuously produced and shed on many dark recesses of the vast domain of biology. We congratulate the authors on the results already achieved, and the hope that they may go on with their good work in the increasing illumination of their own widening and deepening experience.

MANUEL DE CYSTOSCOPIE. (c)

This volume forms another addition to the valuable series of manuals on special medical and surgical subjects which M. Gittler has recently been placing before the students and practitioners of the medical art. The text and illustrations (of which there are 320—including some excellent ones "hors du texte") collectively constitute a very prominent example of the wonderful skill which has been attained during the past few decades in the adaptation of modern mechanical inventions to the treatment of so many lesions of the human organism, and the presenting illumination with which the imponderable side-lights of modern scientific invention have projected on the many dark places of the respective domains of diagnosis and therapeutics.

As Professor Legueu observes in his preface to the present volume, "Every science demands a prolonged period of preparation from the would-be expert, and cysctoscopy has proved to be no exception to that rule. But the lines of such necessarily laborious training are now so clearly laid down in the manuals of clinical illumination which are the unavoidable sine qua non, as well as of luminosity and approximate completeness of detail. The author himself comments on the frequency with which he used to be asked by anxious pupils aspiring to expert knowledge: What is the bath, E. H. Terry, L. B. Clarke, W. G. Maw, H. T. Roberts, M. dos Santos, and J. A. Watson.

The National University of Ireland.

The Senate met on Wednesday, August 19th, 1914. The Senate directed that in view of the present national crisis, and in order to facilitate the immediate entry of the majority of candidates for medical service in the Navy or in the Army, a special examination for the M.B., B.Ch., B.A.O. degrees shall be held, beginning on Tuesday, August 24th, 1914.

The written papers will be held at University College, Dublin; University College, Cork; and University College, Galway, to students of these Colleges respectively; but the clinical examination will be held only at University College, Dublin.

The candidates eligible to enter for such special examination shall be (a) those who have already entered for the ordinary autumn examination for the M.B., B.Ch., B.A.O. Degrees; (b) those whose forms of application for admission to the special examination for the M.B., B.Ch., B.A.O. Degrees, accompanied by fee and certificates, shall have been received by the Registrar at the National University of Ireland, 40, Merrion Square, Dublin, at or before 12 noon on Monday, August 24th, 1914. All candidates will be required to present themselves in either (a) all subjects of the examination, or (b), if they have already passed in any part of the examination, in the part necessary to complete the examination.

No late fee will be payable in connection with this special examination.

Intending candidates are requested to give the earliest possible notification of their intention of presenting themselves for the special examination to the Registrar, the National University of Ireland, 40, Merrion Square, Dublin.

The Senate adjourned.

Plague in Hong-Kong.

It is reported that five cases of plague occurred in Hong-Kong during the week ending August 15th. The number of deaths was also five.

Society of Apothecaries of London.

The following candidates, having passed the necessary examinations, have been granted the L.S.A. Diploma of the Society entitling them to practise Medicine, Surgery, and Midwifery—:

Summary of Recent Medical Literature

Clinical Significance of Sarcomatous Change in Uterine Fibromyoma.—Graze (Brit. Jnl. Obst., xxxiv., 3) in a study of 250 cases of uterine and cervical fibromyoma, found twelve showing sarcomatous changes in various types. In most instances the myoma were multiple with but one focus of sarcomatous change, and only one Sarcoma was found in two interstitial tumours. Only one case was a solitary fibroid. Sarcoma which develops in myoma may arise from various structures in the fibroids. The clinical history of the sarcomatous cases shows nothing characteristic. From the ages of the patients, sarcomatous change appears to be most frequent about the time of the menopause. It is in these cases that the greatest care must be exercised. To a great extent the Rontgen-ray treatment is most applicable in the cases where the frequency of sarcomatous change is highest, and also in that type of tumour in which the malignant change is relatively common, and for this reason is attended with the risk of overlooking a sarcoma.

Treatment of Retro-displacements of the Uterus.—Worrall (Jull. Obs. and Gyn. Brit. Emp., xxxv., 3) considers the most common cause of retro-displacement to be pregnancy which has ended spontaneously and death from the improper mode of living, especially during the developmental period of life. In considering the treatment, it is divided into purely hygienic, manipulative, mechanical (pessary), and operative. The first is considered worthy of trial. The others, except operability, are absolutely condemned. The numerous methods of treatment by operation are not considered except to object to the fixation or suspension of the uterus by either the anterior or posterior surfaces. The author is strongly in favour of suspending the uterus by a small portion of its surface immediately behind the line of junction of the tubes. He has not found any dystocia to follow in subsequent labours, and has had a good percentage of cures in the cases he has been able to follow up.

A Method of Sterilising and Storing Catgut.—Barlett (Surg., Gyn. and Obst., xviii., 5) advises dividing the outer strands into four equal lengths, and coiling them into rings about 1½ inches in diameter. These coils are then strung on a thread. The catgut is then dried in a dry steriliser for four hours at 80°, 90°, 100°, and 110° Centigrade. The catgut is immediately placed in liquid alcohol, where it is kept till perfectly clear, which takes a few hours, but it may be left for ten or twelve hours. The vessel containing the oil should be lined with thin paper. The oil should be left at a stated temperature being raised during one hour to 160° Centigrade and maintained the same for four hours. The put is then lifted out of the oil, allowed to drip, and then dropped into a solution of iodine in methyl alcohol, 1 part to 100 to 1 in 200, according to the size of the cutgut from No. 00 to No. 4, and is ready for use in a few hours.

Abdominal Caeasarain Section for Eclampsia.—Peterson (Amr. Jnl. Obst., Lxxx., 6), from the study of 500 cases collected from numerous operators, concludes that the maternal mortality in the five years previous to 1913 has been reduced to half that of former times. The mortality of 45.7 per cent. of the cases, is lowered by technique and selection of cases, as shown by the thirteen operators having the largest number of cases and a mortality of 18.68 per cent., and when moribund and septic cases are excluded from these the mortality is 13.15 per cent. The effects of the poison may be so great that the emptying of the uterus may not prevent death, which is reduced considerably even when they cease the recovery of the patient is not certain. Operative treatment of eclampsia has never been given a fair trial. To do this the uterus should be explored promptly after the first convulsion. This is shown by the fact that the cases which were operated upon after from one to five convulsions, and where no attempts at delivery were made below, gave a death-rate of 15 per cent. The greater the number of convulsions the greater the fatal mortality. The two mortalities are greater in multiparae than primiparae, and also in proportion to the age of the patient. Any condition which makes delivery by the natural methods difficult may be an indication for abdominal Cæsarean section.

Intramuscular Injections of Antitoxin in the Treatment of Diphtheria.—Rolleston and Macleod (Brit. Jnl. of Diseases, 21st of July, 1914) give an experience of this method of using diphtheria antitoxin. The paper is based on their experience during the last six months at the Grove Hospital, where intramuscular injections were frequently supplemented by more rapid injections of antitoxin. In all 412 injections were given to 339 patients, whose ages varied between two weeks and thirty-seven years; only 35 patients, however, were above the age of fifteen years. Of these 339 patients 43 died, or a mortality of 12.7 per cent., which is the following day, by excluding three patients who died within twenty-four hours of admission to the hospital. Patients with severe faucial diphtheria received from 16,000 to 20,000 units of antitoxin on admission, and usually the same or sometimes a smaller dose was repeated if necessary on one or two of the following days. Patients with moderate faucial diphtheria received from 8,000 to 12,000 units on admission, and sometimes a smaller dose was repeated. In spite of the large doses of antitoxin used the frequency of rashes and other serum phenomena was less than usual. From their experience the writers draw the following conclusions: Intramuscular injection, preferably in the vastus externus, preserves the antitoxin and other methods of administration of antitoxin in the treatment of diphtheria for the following reasons: (1) It is quite as simple as the subcutaneous method, ensures much more rapid absorption, is less painful, and, consequently little if any toxemia, received by the intramuscular route is shown, not by the effect on the faucial or laryngeal process, but by the lesser incidence of paralysis, especially of a severe kind.

The Action of Chloroform on the Blood.—Bean (The Australasian Med. Gazette, June 6th, 1914) records some experiments which he undertook to test the statements made by Gill as to the action of chloroform on the blood. Gill has asserted that chloroform vapour when
presented to the blood takes the oxygen from the red blood corpuscles, and becomes itself oxidised into inert products, and that the resulting anaesthesia is due to oxygen starvation of the brain, since the chloroform uses up the oxygen of the blood in its own oxidation. Bell states that he has been unable to reproduce Gill's results, and his experience compels him to adopt a different interpretation of the action of chloroform vapour on the blood. He believes chloroform is particularly active on the lower parts of the brain, and that killing it, in higher percentages quickly laking it. He believes that chloroform, when used in the minimal doses necessary for the production of surgical anaesthesia, remains confined to the lower parts of the brain and does not invade the higher regions. He believes that the chloroform in the blood causes an oxygen starvation of the tissues and brain by combining with the red blood corpuscles and temporarily suspending, or at any rate, lessening, their power of taking up oxygen and handing it on to the tissues.

K.

MEDICAL WAR ITEMS.

It is reported that cholera has already made its appearance in the Servian and Austrian armies.

The magnificent buildings of Birmingham University are being used by the British Army, and are the largest military hospital in the country at a cost of £10,000.

The Council of the League of Mercy have resolved to use their organisation to collect funds for hospital treatment for the sick and wounded in the offices and on the premises of Messrs. Urwin, Strand, W.C.

Dr. Kendall, Secretary of the Edinburgh University Club in New York, to-day offered a hospital unit to the Canadian Government on behalf of the graduates of Edinburgh resident in the United States.

The Oxo Company have given one ton of Oxo (£70) to the Prince of Wales' National Relief Fund, and undertaken to store it free of charge, and pay carriage on it in small or large quantities as ordered off.

In consequence of the war, and for the convenience of candidates who are desirous of qualifying for medical appointments in His Majesty's service, the Society of Apothecaries of London will hold a special examination, commencing Monday, the 31st inst., for the diploma in medicine and surgery granted by the society. Full particulars may be obtained upon application to the Secretary, Water Lane, Blackfriars, E.C.

Sir Donald Macalister, Principal of Glasgow University, wishes it to be known that the University will do what it can to safeguard the academic interests of the country, and will call its local duties.

The authorities whom he has been able to consult agree with him in recommending that to such students every consideration should be extended which the Ordnances will permit. In relation to attendance upon courses of instruction, to duration of study, to periods of notice required, and the like, account will be taken of a student's absence on military duty; so as, if possible, to ensure that his graduation shall not be unduly delayed.

The Royal Colleges of Physicians and Surgeons of England having regard to the exigencies of the war, have decided to hold a special final examination commencing on September 8th, to which candidates will be admitted under the following conditions:—(1) All candidates who would be eligible for admission to the October examination shall be considered admissible to the special examination in September; (2) Candidates who were referred for three months at the July examination will be admissible to the special examination in September without producing additional examination; (3) Candidates who fail at the special September examination may be admitted to re-examination in October by resolution of the examiners on consideration of the standard attained by them. Candidates who fail at the special examination in September if they have completed the courses of study required for that part, without having necessarily completed the whole curriculum, under the conditions of the old regulations, but they will be required to have attended all the courses prescribed by the regulations before completing the examination.

The National Relief Fund.

Dear Sir,—The Committee are glad to hear of the widespread and admirable arrangements which have been made by the Daily Express for systematic collection, and note with pleasure the names of the important firms who have contributed to help you. They trust that these efforts on the part of the Daily Express will lead to a substantial addition to the National Relief Fund.

Yours faithfully,

C. Arthur Pearson.

York House,
St. James' Palace, S.W.

August 17th, 1914.

The above letter refers to a League which has been organised to enable those to contribute shillings, to the Prince of Wales' Fund, who are unable to afford pounds. Many people unable to give a large amount in one sum will gladly give a shilling a week. Long time has been devoted to deserving a cause as the relief of the families of British soldiers and sailors and the alleviation of distress among the working classes, many of whom have been thrown out of work by a war which will do little to the date of the British Empire.

A shilling may be sent each week, or five or ten shillings can be sent in advance. A receipt will be sent for the first contribution, but afterwards, in order to save expense, so long as the shillings are received regularly, no further communications will be made. All sums of five shillings and over will, however, be acknowledged whenever received.

The name of every member of the League will be inscribed on a tablet at Home Office, and those who subscribe a minimum of 10s. will receive certificates, issued by the Prince of Wales, which will also be receipts for the total amount they have subscribed.

Now is the time to show your patriotism by helping the families of those who are defending your homes. Join at once and send your shillings.

Employers can greatly assist the League by encouraging their staffs to join and by arranging for one member to act as collector and to forward the contributions in one sum each week. Printed forms will gladly be sent on application to any employers who adopt this suggestion.

All communications and subscriptions should be addressed to J. W. Urwin, Esq., Hon. Secretary, Prince of Wales' National Relief Fund Shilling League, 60 Victoria Street, Westminster, London, S.W.

PRINCE OF WALES' RELIEF FUND, SHILLING LEAGUE.

I herewith enclose unpaid shillings for the above League for ......... weeks. I will give a shilling a week to the Fund, if possible, every week until peace is declared. I will try to get ...... new members.

Address: ......

Subscriptions: the sum of Rs......

Date: ......

NOTICES TO CORRESPONDENTS, &c.

Subscriptions may commence at any date, but the two volumes each year are published in January and July. The names of the subscribers are printed in small capitals under the heading: "Reader," "Subscriber," "Old Subscriber," etc. Any subscription not accompanied by the sum required will be returned. The subscription rates are: £5 per annum, £10 per annum, and £5 per month. All communications should be addressed to the Editor of the Daily Express, 60 Victoria Street, Westminster, London, S.W. Prices are 1s. 6d. for the weekly edition, and 2s. 6d. for the daily edition.
HAVE Low from—causes, asserts of typhoid; M. B. Glaso. The rubbish per hour, to Dr. and Mrs. N. T. Bond—a son.

Elpick.—On August 15th, at 1 Carlton Hill, N.W., the wife of George J. F. Elpich, M.D., M.R.C.S., L.R.C.P., of a daughter.

Gibson,—On August 15th, at the Corner House, Breatwood, Essex, the wife of A. J. Gibson, M.B., B.S., of a daughter.

Kemp.—On August 17th, at Jesmond, the wife of Major W. H. Kemp, J.M.O., of a son.

Matthews.—On August 22nd, at "The Limes," Lower Gornal, Stourbridge, Worcestershire, the wife of Mr. Matthews—a daughter.

Milne—On August 17th, at Manchester Old Road, Middleton, the wife of Miss Milne, M.B., M.R.C.S., of a son.

Morrison Davies—On August 23rd, at 85 New Canvendish Street, W., the wife of H. Morrison Davies, of a daughter.

Reynolds—On August 15th, at 18 Park Crescent, W., the wife of Dr. Edward G. Reynolds—a daughter.

Smith—On August 22nd, at Low Bank, Queen's Drive, Mosley Hall, near Stockport, the wife of Mr. Smith—a daughter.

Stam—On August 15th, at 63 High Road, Streatham, S.W., to Dr. and Mrs. Louis Stam—a daughter.

Wilson—On August 16th, at 96, Jesmond Road, Newcastle-on-Tyne, the wife of Frank Wilson, M.B., of a daughter.

Horton Infirmary, Banbury.—House Surgeon Salary £120 per annum, with board and residence in the Infirmary. Applications to E. Lamby Fisher, Hon., Secretary, Horton Infirmary, Banbury.

Brighton General and Eye Hospital, Church Street, Queen's Road, Brighton.—Applications to Mr. E. W. Pilbeam.

National Infirmary and Dispensary, Assistant Resident Surgeon, Salary £180 per annum, with apartments (not board), attendance, light, and fuel. Applications to C. Cheeiman, Secretary, 12 Low Pavements, Nottingham.

Manchester Northern Hospital for Women and Children, Park Place, Cheetham Hill Road.—House Surgeon Salary £120 per annum, with apartments and board. Applications to Mr. Hubert Teague, Secretary, 38 Burton Arode, Manchester.

Royal Albert Hospital, Devonport.—House Surgeon Salary £120 per annum, with board and laundry. Applications to the Chairman of theSelection Committee, Royal Albert Hospital, Devonport.

Appointments.

Holland, Earnest, M.D., M.R.C.P.Lond., F.R.C.S.Eng., Assistant Obstetric Physician to King's College Hospital.

White, Albert, M.R.C.S., L.R.C.P., L.R.C.P.I., Honorary Medical Officer, Public Vaccinator and Medical Officer for the Gloucestershire District of the Hay Board of Guardians.

The Medical Officer in chief, Military Wing, Royal Flying Corps, Farnborough, Certifying Surgeon under the Factory and Workshop Acts for the Farnborough No. 2 District of the County of Hants.

BIRTHS.

BESWICK.—On August 14th, at 72 Lower Raglan Street, Dublin, the wife of Charles B. Beswick, M.D., F.R.C.S., of a son.

Boox.—On August 22nd, at 29 Anerley Road, South Norwood, to Dr. and Mrs. N. T. Bond.—a son.

ELPICK.—On August 15th, at 1 Carlton Hill, N.W., the wife of George J. F. Elpich, M.D., M.R.C.S., L.R.C.P., of a daughter.

GIBSON.—On August 18th, at the Corner House, Breatwood, Essex, the wife of A. J. Gibson, M.B., B.S., of a daughter.

KEMP.—On August 17th, at Jesmond, the wife of Major W. H. Kemp, J.M.O., of a son.

MATTHEWS.—On August 22nd, at "The Limes," Lower Gornal, Stourbridge, Worcestershire, the wife of Mr. Matthews.—a daughter.

MILNE.—On August 17th, at Manchester Old Road, Middleton, the wife of Miss Milne, M.B., M.R.C.S., of a son.

Morrison Davies.—On August 23rd, at 85 New Cavendish Street, W., the wife of H. Morrison Davies, of a daughter.

REYNOLDS.—On August 15th, at 18 Park Crescent, W., the wife of Dr. Edward G. Reynolds—a daughter.

SMITH.—On August 22nd, at Low Bank, Queen's Drive, Mosley Hall, near Stockport, the wife of Mr. Smith.—a daughter.

STAM.—On August 15th, at 63 High Road, Streatham, S.W., to Dr. and Mrs. Louis Stam—a daughter.

WILSON.—On August 16th, at 96, Jesmond Road, Newcastle-on-Tyne, the wife of Frank Wilson, M.B., of a daughter.

HUMBLE DISPENSARY.

DALE STREET, STRETFORD ROAD, MANCHESTER.

WANTED.—A Barber, (suitable to having) a qualified Barber, Salary £120 for a full qualified. Salary £180 per annum. Annual increase £10 to £120, with apartments and gas and coal. Applications, with testimonials, at once to Honorary Medical Secretary.

Deaths.

CLARK.—On August 7th, at Brigstock, from double pneumonia consequent upon a severe attack of smallpox, Harry Edward Clarke, M.R.C.S., L.R.C.P., of 34 The Avenue, Bedfort Park, aged 57.

HUMBLE DISPENSARY.
The Medical Press and Circular

“SALUS POPULI SUPREMA LEX”


Notes and Comments.

One of the chief facts one must look forward to in the war that is now raging on the Continent is an enormous number of wounded. On no previous occasion in history has fighting been conducted on so vast a scale, and with the use of projectiles of similar range and power. A great many of the dead with great loss day by day are able to make a quick recovery—that is to say provided the requisite surgical treatment and nursing are available. The provision of an adequate medical service, however, difficult as it is in wars of ordinary magnitude, is multiplied tenfold in a struggle of the Titanic nature that has been forced on the world by the insane ambition of the German Emperor. So far as the British “casualties” are concerned, there can be little doubt that the resources of the Royal Army Medical Corps must be taxed to the utmost.

The first great conflict of our own troops, acting with the French, took place near Mons. Here our small force was opposed to the Germans in vastly superior numbers. By the sheer weight of their adversaries our soldiers were pushed back with great loss day by day in an action that lasted during the 23rd, 24th, 25th and 26th August. Lord Kitchener stated officially on Monday that Sir John French estimated the British casualties at between 5,000 and 6,000. As the fighting was continuous and the whole of the four days was practically spent in slowly retreating before a numerically superior force, it is clear that many of our wounded soldiers must have been left on the field of battle. The German losses, so it seems, clearly were far greater than our own, and as their time must have been fully occupied in pressing their attack and in looking after their own wounded, it is painful to think of the exposure and starvation to which the disabled British troops were of necessity exposed. Moreover, under the stress of a retreat the bearer and hospital arrangements share the general danger and confusion.

The Strain on the Army Medical Service. The plain truth appears to be that the care of the sick and wounded in this terrible war has thrown an enormous strain upon our medical men and the nurses. The ordinary needs of the population must be attended to, and all who can be spared are wanted at the front or the base hospitals, where, indeed, they cannot possibly supply more than a fraction of the skilled attention that is freely accorded alike to friend and foe, to combatant as well as to non-combatant. Those of our own wounded who can bear the journey are being brought over to England, where ample private and public hospital accommodation has already been provided. A great many medical men, both consultants and private practitioners, have thrown up their work and gone to the front, where they have been joined by what may be called the floating medical population, the men who do locum tenens work, the younger men who have not yet settled down to practice. This source of depletion in routine work has to be made up somehow, and it is to be feared that for a long time to come there will be a considerable shortage in the medical staffs of Poor Law and voluntary hospitals and asylums, not to mention other branches of public medical service. Some of the qualifying bodies have so far relaxed their regulations as to grant facilities for obtaining a diploma to senior students. The war has hardly begun in earnest so far as the United Kingdom is concerned, and it may pretty safely be predicted that sooner or later the demand for qualified medical men will be far greater.

The Extent of the War. Much the same thing will happen with the nurses. Already there is a shortage of nurses for private and public work at home. The Red Cross and St. John Ambulance Association are perforce utilising the services of women who are only partially trained. It must not be forgotten that the war more or less involves the greater part of Europe, and medical men and nurses are wanted, not only to tend our own troops, but also to carry on the work of mercy in the Servo-Austrian, the Russo-Austrian and Russo-Germanic lines, as well as the stupendous field of operations involved in the German invasion of Belgium and France. In a war of this scale and ferocity it may safely be assumed that the medical army will in many instances suffer more or less severe loss in spite of their non-combatant standing. The Germans have introduced into modern warfare the methods of their early barbarian ancestors. In not a few instances they appear to have deliberately violated the Red Cross badge, which is rightly regarded as sacred by civilised peoples. Apart from conduct of this kind there are many accidents that threaten army hospital staffs, especially in these days of rapid retreats and advances, and of battles carried on largely with long-range weapons.

Since our war with the Boers, Testing the great advances have been made in the organisation of the Army Medical Service, as in other branches of military administration. In that war
a great loss of life occurred amongst British troops from enteric fever and other preventable causes. The medical experiences of the present war will be followed with great interest, as a test of the efficiency obtained by our Army medical authorities. The small size of the British Armies has required a medical branch of correspondingly diminutive proportions. Now, with the sudden vast expansion of our combatant army a large addition is needed for its medical service, in order to bring it up to anything like a reasonable war footing. Whatever is to be attempted will have to be put in hand at once. It is probably far easier to enrol and train a second army within the allotted time of six months than to organise an adequate medical service in its behalf. In the period mentioned a man may acquire a good working acquaintance with drill, rifle-shooting, sword exercise, artillery and other warlike arts, but it takes four or five years to teach a man the fundamentals of medicine and surgery. Even then the young qualified medical man has to subject his theoretical knowledge to the test of practice before he gains the firm ground of experience. However, whatever the future may have in store as regards the medical men of the United Kingdom and this great war, the country will not lose in vain the members of the medical profession, young or old, obscure or distinguished, for that measure of duty, nobly and courageously discharged, which has been displayed in so marked a manner by all classes of our countrymen in the present crisis.

The report that cholera has already made its appearance among the British troops is only what is to be expected, even among the most favourable conditions of modern warfare. It is next to impossible to get men half dying of thirst to reject the muddy supply of water teeming with pathogenic bacteria within reach, and wait for the arrival of the field-carts containing aqua pura. The still small voice of science is silenced by the clamourings of human nature in its frailty and distress. So rapid is the multiplication of cholera vibrios, typhoid bacilli and coliform organisms under these circumstances that the specific diseases to which they give rise claim ten times the number of victims of those slain in battle. Nor as far as typhoid fever is concerned the danger is considerably enhanced from the probable presence in camps of "carrier" cases, and this source of risk is always an unsuspected one. During the past few days powerful pleas for the adoption of the practice of compulsory anti-typhoid inoculation have been advanced both in the profession and also in the lay press by Sir William Leishman and Sir William Ord. The method of anti-typhoid vaccination has the advantage of producing only a slight and seldom an incapacitating reaction and it is innocuous. It is earnestly to be hoped that strong pressure will be brought to bear upon the authorities with a view of rendering the practice compulsory. With regard to cholera we learn that a proposal is on foot to organise a special cholera corps to serve under the Russian Red Cross, consisting of ten medical men and twenty nurses.

The Danger of Unvaccinated Troops.

Another disease which is to be feared among troops is small-pox. LAughted by a feeling of a general fear felt by the absence of small-pox in epidemic form during the last few years, the populace in this country can hardly realise the gravity of massing large numbers of men together in camps, many of whom are insufficiently protected by vaccination or re-vaccination. In reply to a question in the House the other day, the Under Secretary for War stated that a circular had recently been issued informing General Officers Commanding that members of the Territorial Forces who had conscientious objections should not be vaccinated. It was felt, however, that the danger of an outbreak of small-pox among troops under the present conditions was far from being imaginary and that, consequently, every effort should be made to get men to be vaccinated while those who objected were being informed that unless they submitted to vaccination they would be of little service in the field. So far so good, but why leave anything to chance when so much depends upon the physical efficiency of each unit of the Forces? It should not be impossible to introduce a short Bill rendering vaccination compulsory for all fighting men, or, for that matter, for every citizen. The well being of a nation must predominate over the whims of a few unreasoning objectors. We cannot afford at this time in our history to take any unnecessary physical risks.
agencies that exist for the benefit of the vagrant. Through the help of the office established on Waterloo Pier a large number of homeless persons have not only been prevented from “sleeping out,” but have been actually brought into touch with those remedial agencies which place the applicants in a position to make a fresh start in life. The care of children has always constituted a special feature of the work of the Board, and it is satisfactory to note the progress made in connection with the reconstruction and enlargement of East Cliff House, Margate, which, when complete, will provide a sanatorium for children with 270 beds. The number of cases of ringworm of the scalp admitted to the Park Hospital during the year was 612, and, taking a date at random, it was found that out of 100 consecutive cases the number of days elapsing between the date of X-ray administration and that of the certificate of fitness for discharge was 30.2. It is satisfactory also to note that the treatment of trachoma by means of carbon dioxide snow has been carried out with success in a large number of cases. Turning to the report of the Statistical Committee we find that 33,994 cases of infectious disease were notified in the metropolis last year, as against 25,237 cases in 1912, the increase being due to a greater prevalence of scarlet fever, diptheria and enteric fever. Only one case of small-pox was admitted to the Board’s hospitals, and five cases of cerebrospinal meningitis. The difficulty which still surrounds the diagnosis of most of the exanthemata is once more illustrated by the fact that 9.0 per cent. of the total admissions into the fever hospitals were found not to be suffering from the diseases for which they were admitted upon notification. The number of admissions into the Board’s asylums was 943, as against 855 in the previous year. The ambulance service, both by land and river, has been kept very busy during the year, no fewer than 71,034 removals having been effected. The usual bacteriological laboratory examinations have been undertaken during 1913, and much useful work in connection with the preparation of antitoxin, tuberculin dilutions, etc., has been carried out. In the medical supplement to the report, after the usual comprehensive statistical tables, appear some interesting papers by various assistant medical officers of the Board, among which may be noted one on “Intramuscular Injections of Antitoxin in the Treatment of Diphtheria,” by Drs. J. D. Rolleston and C. R. Macleod; and one on “The Use of Physical Exercises in the Sanatorium Treatment of Pulmonary Tuberculosis,” by Dr. T. Nicol. Altogether the volume is a valuable record of the activity of a great public body, and it may be hoped that when the next issue appears it will bear the imprint of a newer and more comprehensive title than that of the Metropolitan Asylums Board.

Dr. Murdock Macdonald, M.D. Glasg., D.P.H., lately Assistant Medical Officer of Health and School Medical Officer for Huddersfield, has been appointed Tuberculosis Officer by the Deptford Borough Council.

CURRENT TOPICS.

**War and Humanity.**

The “naked fist” has fallen, remorselessly, murderously, upon poor defenceless civilians, men, women and children; upon wounded men lying helpless on the battlefield, claiming as a right the succour and the protection of humanity’s laws, and upon any inhuman and impious person, whose life has been brutally destroyed by the German troops. This is a dangerous system upon which to practise war in these days of civilisation. In the middle ages such wanton cruelty might have been excusable; excusable upon the ground that civilisation had not then sufficiently advanced to exert its refining influence upon the protection of human life and property. To revert, however, in this the twentieth century to practices which, in their murderous effects, could scarcely have been exceeded even in the days of savage warfare, has brought upon the vaunted Kaiser and his troops the execration of the civilised world. A nation whose military despotism has been based upon such foundation is common to every other. The world is not large enough to contain such braggarts, who, ruthlessly, deliberately, wantonly defy all dictates of humanity, and defile the name of humanity by their acts. There is “cricket” in warfare no less than in other things in life; warfare between civilised nations in these days does not imply, nor demand, nor does it create, a lust for blood, which no human instinct can control, even if we admit, as the Kaiser claims, that war cannot be successfully prosecuted “in velvet gloves.” There remains, therefore, the fact that no warfare can justify deluging the hands in the blood of defenceless women and innocent children, of which the German troops have been guilty, as eye-witnesses have testified. The advance of civilisation, if it has taught anything, has impressed upon humanity the sacredness of human life and its value: to the furtherance of that great principle the discoveries of science have been wholly directed. As medical men, we are in the position to judge, for example, how much the advance of medical science has diminished the horrors of war. The war has been a tremendous lesson to mankind, and of the advantages, and yet they deny to the poor victims of their savage cruelty the ordinary instincts of humanity, which the advance of civilisation has raised to so high a level of refinement. Thus has the Kaiser begun his megalomaniac war, not against the nations with whom he is fighting, but against humanity itself. Of course, we must assume that a War Lord, having adopted this plan of campaign, is conscious of what he is doing. At the same time he may have forgotten that history has shown that under these circumstances humanity is quite capable of taking care of itself, and of emphasising its power, not by reprisals, but by subjected to confound punishment the instigator of the violation of its principles.

**Circulars.**

There are certain small advantages that we owe to the present state of war. One of these is postal bombs and cartridges. We are used to circulars, universal and innumerable. There is no land within the Postal Union that does not constantly overwhelm us with soi-disant “literature.” The printed foreign pamphlet sometimes amuses us by the rich individuality of its alleged English. The most noteworthy thing about it is the endless variety of its postage stamps. Our English firms send us...
useful if monotonous packets of adorned blotting-paper. We use them and are thankful. The Continent relies on the printed word. Its reliance is often ill-founded. We are in no mood to appreciate ill-printed information in long-drawn hazy English. America is always trying to devise something new, and often succeeds in doing so. In this way comparatively expensive things that we hesitate to throw away for fear lest we should like to promote them to a position of positive utility in the vague future. Anyway, whatever goods the gods have provided us are gone. We shall have to buy blotting-paper and provide our own note-books. It is a hard fate to wake but exiguous spills, and when the maps are cut out, hardly that. It is one of the penalties of greatness. It is only now when the postman passes us that we see what we are missing. We used not to notice the advertising for the circulators. Now our supply is short and our memories are growing long. We remember. The gifts that we bestow in the days of their abundance are noteworthy because of their absence. Our interest in German synthetics is acute because we never hear from them and cannot get them if we want to. It is fate. It is always so. We are overwhelmed with what we do not want, and when we cannot get it, then, and not till then, we acutely realise our need.

The Husbanding of Energy.

In these days of high pressure and nervous tension it is astonishing that physical bankruptcy is not of more frequent occurrence. The human body can stand an immense amount of knocking about; in fact, the harder the blows the better. One thing our poor corpus vitreum cannot endure for long, even that is the continual ebbing away of vital energy, either from the expenditure of misdirected effort or as a result of perpetual fretting and worry over unimportant trifles. The hardest rock can be worn away in time from the constant impact upon its surface of tiny drops of water. Never was there such need for nothing all our resources and energies are at the present moment. As Sir William Bennett remarked last week at the opening of the Military Service Exhibition at the Institute of Hygiene, the great stress of the war will not come for some months yet, and then will be the time that the strain upon energy and resources will be greatest. Those workers who, under the stimulus of emotional excitement, are throwing tremendous energy into the work of preparation or of defence may be reminded that over-production always means waste and consequent loss of the power for doing good. A little judicious restraint and economy now will tell in the long run and will tend towards greater efficiency in the conduct of the war. "Self-control is the first secret of success" for individuals as well as for nations.

The Medical Profession and the War.

The response of the medical profession to the demands of the War Office for medical aid has been naturally gratifying. Young qualified surgeons of the necessary stamina are generally eager to engage themselves for war service. In doing so they not only supply one of the nation's needs at such a crisis, but they also benefit themselves by the opportunities afforded of gaining much valuable experience. The officers of the Royal Army Medical Corps, of course, are unable to provide the medical personnel required for war purposes. The medical establishment of the army is only sufficient for the needs of the Army on a peace footing. The ranks, therefore, of the Army Medical Corps have to be augmented by drawing upon the civil medical population when war supervenes. When the medical history of this war comes to be written it will probably be memorable for the high percentage of casualties in comparison with the losses from disease. The theatre of the war, as well as the arena of the lighting, are both in favour of the maintenance of the general health of the troops on either side. Again, the question of the commissariat department, at all events so far as the English troops are concerned, has been dealt with in a most perfect manner, judging from the reports which have reached us from men at the front. Again the need for medical and surgical consultants, it may be noted, has apparently not been so great in this war as it was in the Boer campaign, where the casualties occurred at so great a distance from expert assistance. Consequently there have been no lists of well-known physicians and surgeons appointed by the War Office for special duties at the seat of war, and yet we may be certain that if any such demand should be made by the War Office it would be readily and freely met, whatever personal sacrifice may be involved, in responding to the nation's requirements.

The Great Paradox.

We in these countries are watching, with a surprise gradually becoming dimmed by use, the hitherto unparalleled spectacle of a nation unanimously supporting the powers that it has raised up. Columns are written round the phenomenon and the utter marvellousness of the Anglo-Saxon is being fully dilated upon. No one seems to have pointed out that the nation is merely treating its experts as it has always treated its doctors. Medical men are not engaged for years on end by their professional instincts before their personal gains. That a reputedly sane people should give any body of men a pecuniary interest in cutting off its leg has been frequently pointed out as an instance of human imbecility. Mr. Shaw even manufactured one of his glittering insincerities to make so serious a subject as the average public trust in the people. We know the scrupulousness of the average doctor. He has got so schooled to do the best for his patient that it is a thing of the greatest rarity to find the trust abused. Of course, at first sight it seems absurd to make the executioner judge and then to pay him by the pound. Such a thing is outside the average common intelligence in theory. In practice the cutest business man follows the seemingly absurd principle with the utmost faith. And he is not disappointed. One may say that no other course is open to him, but we cannot believe that if the world thought its confidence chronically abused it would not have found a way out. The fact is that the average man rightly trusts his doctor. The Chinese way of paying the physician during health, and omitting all emoluments during illness seems logical, but we all know it would be no improvement. As a profession we are always cutting our financial throats, and we will keep on doing so. It is one of the queer kinks of human nature that, because we are trusted we justify the trust. Noblesse oblige is not yet out of date.

The Voice of the Doctor.

As America is about the only alleged civilised nation that has so far kept itself out of Armageddon, we may turn with confidence to her for the truthful things that used to interest us. She is actually discussing the voice of the doctor. We all
know the beefy tenor with the heaven-sent voice which he proverbially protects with a low collar and bottled stout. It seems that we must follow his star example if we wish to succeed in our calling. Commonsense and gentlemanly behaviour, we are told, are not rare in doctors, but a cultivated voice and a pleasing behaviour are said to be rather uncommon. The work often justifies the man, but unfortunately the man sometimes knows it. We all know the man who informs his patients that the cure will happen in the space of so many weeks if they do not follow his advice to the letter. That the statement is probably true, given an accurate prognosis, is beside the question. Listen to our urban American: "I cannot smoke; it would destroy my power of speech. I cannot use alcohol because it is so injurious to the tone quality and manner of expression that the harp J depend on to bring out the melodies of thought, counsel, and advice would be marred and broken." Now, to our shame be it said, a physician is accused of having used these words at a public banquet. Music is true it is the soft charm of heaven, but the man who is so self-conscious of his charms is clearly unfit for outside interests. He is of the sort of man that relies on his presence to make his patient feel better, though he does nothing for him. There is no doubt a grain of truth in this mass of objectionableness. Knowledge and power are no excuse for tyranny. The voice and manner may show confidence and the patient's interest in therapeutic properties of toxins. But more. Our most pernicious quacks are notorious for their charm of manner and consciously well-bred behaviour. They are as a sounding brass or a tinkling cymbal. To know is power. Dress it as you like. Appearance will never replace actuality.

False Charity.

We remarked last week on the large number of people who are at present demanding instruction in first aid and kindred subjects, and who may, if properly organised, fulfil an important function in the near future. It is with some reluctance we refer to another side of this popular movement. Much of it depends, and depends improperly and unnecessarily on the exploitation of the medical profession. In the present crisis medical men have not been lacking in performing the extensive duties called for by the nation's need. Many have relinquished their livelihood and the care of their families to take their places in tending the sick and wounded of our own forces and those of our allies. Others, who stay at home, are willingly taking the places of their brethren who have been called away, and performing their home duties without reward. In addition, medical men are offering their free services in attendance on the wives and children of soldiers at the front. Others are giving their services in the organisation and teaching of first aid and ambulance classes. It is on this last point we have a word to say. We believe that these classes are fulfilling a useful function. We believe, too, that it should be so arranged that every intelligent, able-bodied man or woman should, if he feels so called, have admission to a first-aid class. Where, therefore, classes are formed for working people, it may be necessary that the lecturer, who in most cases a medical man, should give his services gratuitously. In other cases the classes composed of well-to-do persons, we hold that the lecturer should invariably demand a remunerative fee. Unfortunately, this is not always done. We know of many centres where courses of lectures are being given by leading men in the profession without remuneration. These men are wasting their energies and resources needlessly at a time when these are especially needed by the country. They are forcing their charity on people who are not in need of it, and thereby debarring themselves from giving it where needed. By all means let any lecturer who chooses hand over his fees as a subscription to an ambulance association or a relief fund. We have no wish to limit the charity of our brethren. Charity wrongly directed is worse than a blunder; it is a crime. Giving free lectures on professional subjects to ladies who drive up in their motor-cars may be a good advertisement; it is not a public service.

The Mortality Rates and the Seasons.

The summer, now drawing to its close, has been exceptional for its healthiness. The years as they pass show how science has triumphed over the forces of mortality in lessening the toll from preventable disease. Formerly "a crisis in July," by which the disease was popularly known, used to claim a voluminous number of infants, whose deaths were mainly due to ignorance and carelessness during the heat of the summer months. With the progress of science, however, and the dissemination of the knowledge of hygienic principles, this toll of summer mortality has noticeably decreased within recent years, and the advent of an estival temperature has almost ceased to be a menace to infant life. The most fatal season of the year is now the period of the cold winter months, during which catarrhal attacks befall the aged, against which their enfeebled vitality is unable to contend.

H.M. THE KING, as Patron, has been graciously pleased to approve of the appointment of Sir William Bennett, Mr. Herbert Paterson, Mr. James Sherren, Mr. Lockhart Mummery, Mr. Crisp, Dr. William Hale White, and Dr. Charles Morris, C.V.O., as Honorary Members of the staff of King Edward VII. Hospital for Officers, 9 Grosvenor Gardens, S.W., during the period of the war.

H.M. THE KING, has been graciously pleased to sanction the following promotions in, and appointments to, the Order of the Hospital of St. John of Jerusalem in England (August 26th)—As Knights of Grace: Surg.-Gen. Sir A. W. May, M.R.C.S.; Col. J. E. Squire, C.B., M.D., F.R.C.P. (from Honorary Associate), and J. A. Sutherland, M.B.Edin. (from Honorary Associate).

Dr. Montagu Travers Morgan, M.B.Liv., D.P.H., has been appointed Assistant Medical Officer of Health for Herefordshire.

Dr. C. H. G. Ramsbottom, M.D., M.R.C.P., D.P.H., has been appointed Clinical Tuberculosis Officer in the Hampshire County Health Department.

Dr. Thomas Lewis, Assistant Physician to University College Hospital, and Editor of Heart, has been selected to deliver the Hester Lectures in October next at the Johns Hopkins Hospital Medical School, Baltimore.

The following consultants have been appointed by the Medical Department, Royal Navy, and in most instances have been detailed for special duties:—Sir Watson Cheyne, Sir William Macween, Sir Alfred Fripp, M.R. Turner, Dr. H. D. Rolleston, Mr. G. L. Cheal, Mr. Raymond Johnson.
CLINICAL LECTURE ON "FRACTURES."
By Sir Arbuthnot Lane, Bart., M.S., F.R.C.S.
Senior Surgeon to Guy's Hospital and Emeritus Surgeon to the Hospital for Sick Children.
[Specially Reported for this Journal.]

My experience of the operative treatment of simple fractures leads me to think that probably for the time being its indiscriminate use has done much more harm than good. The operative treatment has on the whole produced, I think, vastly worse results than if the patient had escaped that treatment, or even evaded the surgeon altogether. When you realise that in a series of cases published by Dr. H. B. Thomas in a communication read before the Chicago Surgical Society, March 6th, 1914, entitled "Bone Transplant," in about 48 per cent. there was suppuration necessitating the removal of a plate, the result must be regarded as simply disastrous. One feels inclined to employ an even stronger adjective to express one's views on the subject.

An American surgeon who came over here asked me how many of my plates I removed, I replied, "I don't remove any other than in the most exceptional circumstances." In support of this I referred him to the statistics of the Hospital for Sick Children, Great Ormond Street, where any infection of a fracture was unknown, although from the youth of the patients the operations are much more difficult than in adults. He inquired how he could find out how many were removed by surgeons generally. I advised him to go round and see the surgical registrars of the different London hospitals and obtain statistics from them. He did so, and he assured me that the statistics given to him showed that in between 35 per cent. and 7 per cent. of the cases operated upon for simple fractures the plates had to be removed. How far this statement is correct I am unable to say. It is approximately correct, those cases were examples of a defective or imperfect technique, or in plain English of incompetence to deal efficiently with fractures by this method, the failure being entirely due to want of care on the part of the surgeon. It is perhaps fortunate that the public are not aware of this fact. Some surgeons think that all they have got to do is to buy a certain number of instruments and to set to work. A proportion of surgeons would appear to have but an imperfect idea of the mechanics of the skeleton; otherwise you would never see bone-setters flourish as they do.

The bone-setter flourishes because the surgeon is deficient in a certain knowledge. Many surgeons do not realise that if you put a lot of foreign material, such as steel plates and screws, into a fracture or into any part of the body, you have got to exercise vastly more care than if you are doing an ordinary operation, only leaving in the wound a few little bits of silk or gut. That is the cause of infinite trouble. In the first place, the surgeon, sometimes knowing little about mechanics, has not a clear idea how to deal with a fracture when he sees it, and when he does operate he is likely to infect the wound, with disastrous results to the patient.

So far as the principles on which the operative treatment of simple fractures are concerned, I think there are three big flaws to which one can formulate in regard to influencing the growth of the body. Pressure produces certain changes, strain produces certain changes, and there is a third law, more extraordinary still, that if a new mechanism is useful to the individual or an old mechanism can be altered with advantage, that change may take place. Those three laws are at the basis of the growth of the body and are the foundation of evolution. That (pointing to a lantern view on the screen) is a perfectly normal skeleton of a man who carried barrels on his shoulder; he was a brewer's drayman. The peculiar pressure which he in consequence underwent for a long period of time produced certain changes which you see there. The general principle that nature goes on in attempting to meet a peculiar relationship of the individual to his surroundings is that of economy. If she can help you to do your work with the least expenditure of energy she does it, and you see how she has succeeded that he can carry his load easily by converting his normally flexible skeleton into a rigid shell so that he can do his work by an expenditure of the smallest amount of energy. The result is so marked and efficient that an old coal-heaver can handle a couple of hundred-weight of coal and do it all day long. You try to do it for five minutes and see the result. One curious thing about nature is this, that everything it does to develop this economy of expenditure of energy to help the individual in his particular labour tends to shorten the life of the individual. Take the coal-heaver, for instance. His spine, ribs and chest are all locked. That is all right for the man so far as coal-heaving is concerned, but let him have an attack of bronchiitis or pneumonia when he has to depend solely on the expansive action of the abdominal muscles to expel mucus from his tubes. Everything nature does to try and help us is only useful for a time; in the end it tends to act prejudicially to the interests of the individual.

Take the case of this coal-trimmer (a) who stands at the bottom of a hole and throws coal round to various points. In doing that he undergoes certain characteristic and remarkable changes. The man who carries anything on his head gets other changes. We all represent a definite mechanical relationship to our surroundings. Alter your mechanical relationship to your surroundings and you alter the machine. Go on repeating that for many generations and you transmit your tendencies to your offspring; although

(a) A remarkable example of the manner in which pressure changes in the skeleton may reveal the life-history of the individual.—Jour. Anat. and Phys., 1906, 383-406.
in the individual itself the actuality may not arise. (a) All these hard-working people die early simply because they are mechanically depreciated by their occupations.

As pressure produces change, so strain produces ossification in the line of traction. Anybody who has devoted much time to the study of the several occupation changes could recognise, for instance, the scapula of a shoemaker. (b)

I think I can best occupy the short time at my disposal by showing you radiograms of fractures taken before and after operation, as I imagine that by this means I can demonstrate the mode of treatment to the best advantage.

This radiogram shows a vertical fracture through the scapula. The fragments were situated in the neck near its outer limit. The outer fragment on the scapula is displaced downwards and forwards. The acromion has been torn away from the outer end of the clavicle and a considerable space intervenes between these bones.

Unless the scapula were restored to its original form the man who was a labourer would have been unable to follow his occupation because of the considerable displacement of the shoulder joint.

By cutting down on the fragments of the spine of the scapula which were grasped in strong forceps it was possible to bring them into accurate apposition, in which position they were firmly secured by a steel plate and four screws, which entered the free surface of the spine. Not only was the scapula restored perfectly to its normal form and function but the acromion was brought into its anatomical relationship to the clavicle. The man recovered with perfect function.

In this radiogram the fracture of the scapula was through the surgical neck, and here also the displacement of the outer fragment was considerable.

The fracture was exposed through the axilla. The fragments were placed in accurate apposition and were retained by a plate and four screws secured to the axillary or outer margin of the scapula. The result of operative interference was perfect functionally and anatomically.

This radiogram shows a fracture of the clavicle just outside its centre. There is very considerable downward and inward displacement of the outer fragment. By no means could these fragments be retained in anything approaching accurate apposition and it was of great importance to the man that the leverage action of the clavicle should remain intact and that the shoulder joint should be placed normally.

The fragments were exposed and accurate apposition having been effected they were secured by means of a plate and four screws, as is shown very distinctly in this radiogram.

Fractures of the clavicle are very readily dealt with by operation for the reason that the bone is always dense and strong and holds screws very securely, and also because it is very accessible, being immediately beneath the superficial structures.

The frequent presence of comminution adds to the advisability and advantage of operative interference.

The great objection to the operation is the presence of a scar. This only appeals to women. The scar can be made almost imperceptible.

The depression that results from an unsatisfactory return of the fragments in fracture of the clavicle is sometimes very great and usually very appreciable.

This radiogram shows a fracture through the epiphysial line of the upper extremity of the humerus. As is common in these fractures a portion of the shaft has remained attached to the epiphysis.

The fracture was exposed by an incision through the anterior limit of the deltoid made in this situation to avoid damage to the circumflex nerve. This fracture was restored to its normal position by means of an elevator. Once the fragments were in apposition, there was no tendency to displacement. The anatomical and functional results were perfect.

This radiogram shows a fracture through the upper part of the shaft of the humerus, commonly called its surgical neck. This variety of fracture always results from a direct injury. The upper portion of the shaft is displaced forwards, inwards and upwards. Perfect reduction by manipulation is usually impossible, while if the humerus is not restored to its normal form its function is impaired in a degree proportionate to the displacement of the fragments on one another.

This fracture was exposed by an incision similar to the last. The very marked overlapping was observed and the fragments being grasped with forceps were so manipulated as to bring the surfaces into accurate apposition. A stout steel plate was then secured to the fragments so that they were immobilised on one another. The result is shown in this radiogram.

This radiogram shows a spiral or torsion fracture of the shaft of the humerus through its centre. The displacement is very great, while the possibility of effecting any sort of apposition of fragments by manipulation of splints is very remote.

Contrast this radiogram with the last. It shows a transverse fracture of the shaft of the humerus just a little lower down. Here, as in other attempts had been made to so call "set" the fragments under an anaesthetic. In both these cases besides the mal-union of fragments which would necessarily result from the employment of the old and usual methods of treatment the risk of the musculo-spiral nerve being involved in the callus was by no means small.

In both instances as shown by these two radiograms the humerus has been restored to its normal function and form by operation and the fragments were secured by means of a steel plate and screws. All risk of damage to the musculo-spiral nerve was also eliminated.

In these as in all operations on fractures of the bones of the arm, great care must be taken to avoid damage to nerves or tendons. This risk is practically a negligible one in the case of the leg.

These radiograms illustrate the common fracture of the lower end of the humerus in young life. The exact position of the fracture varies; in some cases it runs through the junction of the shaft with the growing line while in others a variable amount of the shaft remains attached to the epiphysis. In some cases again only a portion of the lower epiphysis is broken off and displaced.
The objects of the surgeon are to effect accurate apposition of the fragments and to avoid the formation of a quantity of callus. The latter is a serious complication in these cases since the fracture traverses the olecranon or coronoid depressions. This is best avoided by keeping the fragments at rest for some time after they have been accurately replaced. Once the fragments are in apposition a retaining medium is very rarely called for. When a portion of the epiphysis is broken off and placed, it is sometimes necessary to employ a loop of silver wire to retain it where it has been replaced in position. It is always well to avoid any rigid control of a growing line in view of the law I formulated, viz.:

"The rates of bone formation in the several portions of a growing line vary inversely as the pressure."

The seat of fracture is best exposed by a posterior median incision through which the fragments can be replaced in accurate apposition.

The surgeon should not be satisfied with any result that is less than this unless equally to all operative treatment of fractures.

The radiograms that you now see represent fractures of the coronoid process, or of part or all of the head of the radius. These fractures call for very careful treatment. Should such a case unfortunately fall into the hands of a surgeon who is satisfied to treat all fractures by massage, etc., a bad result is certain to ensue. Nature resists any movement of such damaged joints, and endeavors to prevent its occurrence by the development of a bridge of bone which extends from the fragment of the coronoid process or radius upwards and backwards to the shaft of the radius. The term "ossifying myositis" has been applied by surgeons to this misdirected effort of Nature which stops pain at the cost of the destruction of the joint.

These radiograms show the condition in an early stage, and this the later stage when the articular surfaces are not only locked by a bridge of dense bone but are united to one another in an osseous junction. In such fractures it is wiser either to remove the broken fragment at once or to keep the joint at rest till the tendency to form callus has completely subsided. In other words wait till Nature has given up trying to help you.

The case which I have just shown you and which is illustrated by these two radiograms is typical and is constantly coming under observation. The patient was a girl, aged 13. She dislocated her forearm, backwards at the elbow-joint. The dislocation was reduced and the elbow at once massaged for twenty minutes. This massage was repeated on three occasions daily. On the third day an X-ray photograph was taken and it showed a fracture of the head of the radius with displacement of the fragments. The massage was still continued with the result that the range of movement in the elbow-joint became more and more limited. She then came under my observation. The second X-ray photograph which you have just seen was then taken. It shows that a bridge of bone has developed, extending upwards and backwards from the head of the radius through the muscle to the front of the shaft of the humerus. This is the earliest specimen of this condition which I have had an opportunity of observing. Numbers of late conditions as illustrated by this radiogram have come under my care. This shows a complete ankylosis of the joint with abundant bone occupying the angle of the joint.

In such cases a very extensive and difficult operation is required to obtain any sort of movable elbow-joint.

These two radiograms show fracture of the shaft of the radius in its upper third, each presenting considerable displacement of the fragments. This fracture requires very careful treatment because of the distribution of the musculo-spiral nerve in the supinator brevis where it surrounds the portion of the radius. It is impossible that the restoration of the shaft by the radius to its normal form and function would be dearly bought if paralysis of some of the small muscles supplied by the musculo-spiral nerve ensued. This can always be avoided if the operator takes care to avoid the nerves. An incision of a sufficient length to make exposure of the deep parts easy and effectual is particularly valuable in this fracture.

These radiograms illustrate the effect of operative treatment and the consequent showing perfect results. These four radiograms illustrate fractures of the olecranon in one case associated with fracture of the coronoid process. As seen in these other radiograms the fragments have been placed in accurate apposition, and have been secured by means of a plate and screws. In some cases two screws are sufficient, while in others four can be employed with advantage.

In the case in which fracture of the coronoid process was associated with that of the olecranon you notice that the frxation of the fragment of the olecranon resulted in the fragments of the coronoid process coming into accurate apposition. The patient who is an enthusiastic golfer tells me that his handicap has not been affected by the injury. When both radius and ulna are broken at about the same level, and there is marked displacement of fragments, it is always necessary to operate, if a good result is to be obtained.

These radiograms illustrate these fractures before operation. They show very considerable displacement of fragments. These other radiograms show the condition of the patient after operation, and you will notice that however severe the injury and however great the consequent displacement of fragments the bones have been restored perfectly and in every detail to their normal shape and function. Fracture of the lower portion of the shaft of the radius is almost always best treated by operation. When there is much displacement it is often very difficult indeed, if not impossible, to replace the fragments in accurate apposition. On the other hand the bone is subcutaneous here and is readily accessible so that the fragments may be easily replaced and secured by an operation. As in all operations for simple fracture the shorter the interval that is allowed to elapse between the receipt of the fracture and the operation for its restoration the better. This is true in an inverse proportion to the age of the individual. If there is much displacement or if the fragments and the displacement is not dealt with for a time, Nature makes great efforts to meet the situation by arranging for the laying down of a large amount of callus. The accurate replacement of fragments after an interval of time does not prevent the subsequent deposit of much of this callus though the necessity for its formation has ceased to exist. The resulting deposit of bone may be a great inconvenience
and may delay very materially the restoration of the bone to its normal form and function. This is a matter of great importance. These radiograms I am now showing you illustrate my meaning very clearly, showing the disadvantages of delayed operation. In the new-born babe who occasionally sustained a fracture during its exit every hour counts. Interference should be prompt. Such operations being very difficult at this age owing to the smallness of the bones, should not be undertaken except by those who are very familiar with their performance.

This radiogram showing fracture of the humerus at birth with extensive malmion and paralysis of the musculo-spiral nerve illustrates the disadvantage of delay. This second radiogram shows the humerus restored to its normal form. The musculo-spiral nerve was freed from the callus and the paralysis was cured. As some time had elapsed since the birth of the child the bones had softened and the operation was performed with great difficulty.

This radiogram shows a fracture of the femur of an infant. The bone is seen to be broken transversely an inch below the lesser trochanter. The displacement of fragments was very great. The operation was performed two days after birth, and you see the result in this radiogram which shows the femur restored perfectly to its normal form.

I regret that the time at our disposal prevents my showing you the conditions present in fractures of the leg and the mode in which they can be dealt with perfectly successfully by operation. The advantages of an operation over any other form of treatment are:—

1. The patient is at once relieved from pain, since all movement of the fragments is stopped.
2. He is freed from the tension and discomfort due to the extensive extravasation of the blood in the tissues, and from the inflammation that follows this.
3. The duration of his incapacity to work is as short as possible since union of the fragments is by first intention, no callus being required.
4. The bone being restored to its normal form the patient suffers in no way from the injury to his mechanics which he had sustained.
5. Since the fragments are united securely by one or more strong steel plates no controlling apparatus is required so that the patient can move the joints in association with the broken bone spontaneously from the operation and in consequence the prolonged convalescence owing to the stiffness which follows the use of splints, plaster cases, etc., is altogether avoided, and
6. The surgeon knows that by an operation he has secured the fragments firmly in accurate apposition and that he has no reason to dread the patient having his broken bone radiographed as soon as he is able to get about, and the necessity which may possibly arise to consult a solicitor to safeguard him against the results of his treatment as exposed to the patient by the photographs he obtains from the radiographers.

The only thing that is necessary is that the surgeon shall do his work efficiently.

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THE RELATION OF THEORY AND PRACTICE IN THE OPERATIVE TREATMENT OF GENITAL PROLAPSE. (a)

BY HENRY JELLETT, M.D.Dub., F.R.C.P.I.,
Master of the Rotunda Hospital, Dublin.

Mr. President, Ladies and Gentlemen,—

My first duty is to thank you for the great honour which you have done to the Irish School of Medicine, and to that branch of it which is represented by the Rotunda Hospital, in inviting me to deliver this address. I can only say that I know the honour is appreciated by all connected with the Dublin School of Obstetrics and Gynaecology. I have next to thank you on my own account, and to express my pleasure at the great honour which you have done me personally. I cannot tell you how great a pleasure it is to me to have been able to come to this great country, even though the shortness of my visit enables me to see only the fringe of it. Already, I think, I shall go back with very pleasant recollections, and I can only hope that I shall leave some pleasant recollections behind.

The subject which I propose to take as the basis of my address is one which has interested me for a number of years, and which must have the greatest interest for every operating gynaecologist, namely, "The relation of theory and practice in the operative treatment of genital prolapse." It is a subject on which a volume might be written, and yet it has not always received the close attention of the operative gynaecology in which one is more inclined to be led by the fashion of the moment, and to adopt such fashion without due consideration of its ultimate results, and without attaching sufficient importance to its anatomical effects.

I trust I have not infringed the spirit of my directions, which were to deliver an address on obstetrics. Personally, I regard obstetrics and gynaecology as more or less conjoined, but my inclinations lie more in the direction of gynaecological practice. I have therefore assumed that I may translate the word obstetrics in its freest sense. Even if one wished to divorce gynaecology from obstetrics one can say of the subject I have chosen, that although prolapse may be cured by the gynaecologist, it is, alas, often produced by the obstetrician.

I think that in the past the frequent failure of the operative treatment of prolapse has been due to two causes. The first of these is an insufficient anatomical knowledge of the relations and supports of the uterus, and the second is a desire to find a panacea which will be suitable for every case. The second cause is directly the result of the first. One can quite understand, for instance, how the routine treatment of uterine prolapse by ventral fixation appeals to one who does not recognise the abnormal strain to which a uterus once prolapsed is subjected in the future, and similarly one can understand the attitude of those who habitually recommend hysterectomy on the one hand, or extensive vaginal plastic operations—such as colporrhaphy and perineorrhaphy—on the other.

(a) Being the Address on Obstetrics delivered at the Annual Meeting of the Canadian Medical Association, held at St. John, N.B., on July 8th, 1914.
It is such an obvious truism that if one removes the uterus, it can no longer become prolapsed, that it is little to the point of gynaecologists consider hysterectomy can cure prolapse. Again, it is so obvious that a prolapsed uterus ought to descend through the vagina, and cannot do so if the vagina is markedly narrowed that it is not strange that other gynaecologists think colporrhaphy and perineorrhaphy alone can cure prolapse. While as to ventral fixation, what is more plausible than to think that once the fundus of the uterus is fastened in an irremovable position to the abdominal wall, that is prolapse can occur again? Yet each of these reasonings is based on fallacy. The extirpated uterus has prolapsed once and for all, and is gone, but that does not prevent subsequent prolapse of the vagina, and genital prolapse does not consist of prolapse of the uterus alone. Descent of the uterus through the vagina can be prevented by a narrowing plastic operation, but that does not prevent the vagina as a whole from becoming inverted. The fundus of the uterus can be firmly attached to the abdominal wall, but that does not prevent the uterus elongating until its cervix and the vagina again appear outside the vulva. One might multiply other examples, but there is no need.

There are two cardinal points that one must remember in considering the treatment of prolapse. The first is that the exact lesions present differ to a very material extent in different cases. The second is that any treatment to be successful must follow such lines as enable us to alter and modify its details in order to suit the special lesions and complications of each individual case. Each and every one of these conditions will come under the head of genital prolapse, with the exception, perhaps, of the case of simple vaginal hypertrophy of the cervix. Here, although the cervix may appear at or outside the vulva, still the condition is not primarily prolapse, but one is justified in regarding all the other conditions as phases or varieties of prolapse, each of which will require different and special operative treatment. With these points in one’s mind, we come to the bedrock of all operative measures, namely, the anatomy of the pelvic, and when we understand it thoroughly we shall perhaps be in a suitable position to criticise older methods, or even to devise new ones.

I begin, therefore, by calling your attention to certain points of importance in the physiological support of the uterus and vagina, and I do it in the shortest manner possible. In one respect I ask you to give me your consideration. There is a considerable amount of divergence of opinion in regard to many of the points which I bring before you, and I ask you to remember that, as time will not permit of a discussion of these differences, I bring before you what I regard as facts, and what are my own deductions from them. It is no wonder that much divergence of opinion exists in regard to matters which at first sight appear to be so very capable of direct proof. There is no one so coy as the anatomist who comes to deal with pelvic anatomy, and the reason is not far to seek. I understand that the intelligent anatomist who is a good dissector can demonstrate to his own satisfaction, and to the satisfaction of his audience, practically any ligament or structure in the pelvis that he chooses for the moment to create. He can harden connective tissue with formalin and turn it into ligaments; he can exhibit muscles which in the living are incapable of demonstration; and he can resolve strong fibrous bands into succulent connective tissue. I hope my audience will not think from this that I want to undervalue the work which has been done in pelvic anatomy. It is far from me to desire to do any such thing, but I want to impress on you the great difficulty, if not impossibility, of demonstrating in the dissecting-room subject the instructions of anatomy. I must tell you that my hands are cut out for the dissecting-room, and I come to you with these words. We are not able to offer you the usual anatomists. The knowledge of anatomy is essential to the treatment of prolapse, but it is a knowledge which must be gained not alone in the dissecting room, but in examination of the living.

The two organs which are primarily concerned in genital prolapse are the vagina and the uterus, while secondarily, we find that prolapse of the bladder is very common, and that prolapse of the rectum seldom occurs without the involvement of the pelvic fascia.

The vagina, under normal conditions, is kept in place by three different structures. First, it is supported below by the converging bands of the levator ani muscle, with the coincident help of the investing fascia. Secondly, it is fixed to the pelvic wall by the vaginal suspensory ligament, which is a fold of the pelvic fascia, usually described as springing from the pelvic wall in the neighbourhood of the ischiatic spine, and passing inwards and slightly forward to the side of the vagina, and slightly posterior to a coronal median plane. I do not think, however, that this description is quite accurate, as I shall presently show. Thirdly, it is supported by its attachments to the cervix, and by the parts of the endo-pelvic fascia, which have an insertion both into the cervix and into the upper part of the vagina.

The urethra is supported (I refer now to direct support) by its vaginal attachment, by the utero-sacral ligaments and by the layers of the endo-pelvic fascia which pass into it laterally and anteriorly. Its indirect support I will discuss in a moment.

Each one of these structures which I have mentioned can be demonstrated clinically, and can be definitely proved by any close observer to be responsible for the utero-vaginal support. It is an easy matter to recognize the relation of the levator ani muscle to the lower part of the vagina, and to see how the approximation of its lateral ligaments support both the perineum and the lateral vaginal walls. The suspensory vaginal ligaments are also capable of easy demonstration, and so are the utero-sacral ligaments. To demonstrate them, one finger is passed into the rectum, and a bullet forceps is applied to the point of the vagina or uterus at which one wants to demonstrate the ligamentous attachment. Suppose, for instance, the forceps first catches the cervix. As one draws it down, one feels the utero-sacral ligaments because their tension is sufficient to resist further descent of the cervix. If one then applies a second forceps to the upper part of the vaginal wall at the junction of the lateral and posterior wall and pulls upon it, the finger in the rectum will feel distinctly the fascial band which runs to that particular point becoming tenece. If the forceps is then applied successively to a number of different points lower
We must now see how the injuries of labour affect both the direct and the indirect supports. The first and most obvious change is in the relation of the levator ani to the vagina. Deep tearing of the perineum destroys the slight attachments of the muscle to the central point of the perineum, and so allows its lateral bands to diverge outwards, while actual tearing of the muscle itself destroys the continuity of its inner edge. The result is that the lateral bands are widely separated and that there is nothing to prevent the anterior or the posterior vaginal wall from bulging directly down through the vaginal orifice. Once the support of the lower part of the vagina is lost, there is a tendency for the middle part also to descend, because the posterior and lateral walls, instead of resting on the levator muscle, are unsupported, and have their pull transmitted directly to the suspensory fascia which I have described. This fascia must be a very potent factor in supporting the vagina under normal conditions, but it is apparent that it does not possess great powers of resisting a continuous strain, and that when such strain comes upon it, it stretches, thereby allowing the middle portion of the vagina to descend. Clinically, however, I do not think that one often sees this progressive inversion. What happens is rather that first the lower part of the vagina protrudes, then the vaginal fornices lose their support and descend, and that finally, as a result of continued traction, the middle portion descends also.

The earlier descent of the upper part of the vagina is due to the alterations that occur in the supports of the uterus, alterations which usually result in the uterine prolapse, so to speak, over-taking the vaginal prolapse, and eventually preceding it. The first direct step in the production of uterine prolapse so far as the uterus is concerned is backward displacement. This may occur as a result of the traction of a prolapsing anterior vaginal wall on the cervix, a traction which tends to pull the anterior cervical wall lower in the vagina, so carrying the body of the uterus back, or it may be due to simple falling back of a large uterus as a result of general relaxation of its ligaments. Whichever it is, the effect is very much the same. The axes of the uterus and of the vagina tend to come into coincidence, and the resistance which the uterus offers to its own descent is altered from a surface corresponding in size to its anterior wall to a surface represented by a horizontal cross-section. In other words, practically all the support furnished to the body of the uterus by the pelvic floor is lost, and the weight of the uterus is thrown directly on to the utero-sacral ligaments and the different parts of the endo-pelvic fascia. The utero-sacral ligaments are strong bands, as can be easily proved clinically, but, like the vaginal suspensory ligaments, and indeed like all other fascial ligaments, once a direct pull comes on them, they yield. Their normal function is probably to keep the cervix in its proper relation to the posterior pelvic wall, and by so doing to keep the body of the uterus in front, and, once they receive the entire uterine weight, they fail, and stretch. Once they fail, the weight of the uterus is transmitted directly to its vaginal attachments, and to the endo-pelvic fascia, both of which are entirely unsuited to resist a direct strain. They too eventually yield, and so with the uterus the upper portion of the vagina comes...
down. It is probable, then, that the most common sequence of events is, first, the prolapse of the lower portion of the anterior vaginal wall, with or without an accompanying prolapse of the corresponding part of the posterior wall, then the prolapse of the uterus and the upper part of the vagina, and lastly, the prolapse of the middle portion of the lateral and posterior vaginal wall. This order may, however, be altered, and, as one sees in certain cases not associated with labour, the uterus may be the first part to descend, the inversion of the vagina being directly consequent. In each case the condition of complete prolapse with invasion of the vagina has occurred. I refer to hypertrophy of the supra-vaginal portion of the cervix. This hypertrophy is not confined to the portion of the cervix between the insertion of the utero-sacral ligaments and the vagina, but it is most commonly situated there, and it seems to indicate that there has been a conflict between the pull of a prolapsing vaginal vault below and the support afforded by the resisting utero-sacral ligaments above. It is consequently reasonable, I think, to suppose that when a hypertrophy of the cervix is present, the vault of the vagina has been the first part to prolapse, and the body of the uterus the last. In some cases, indeed, one actually sees this stage before uterine prolapse has occurred, that is to say, the utero-sacral ligaments are of their normal length, the body of the uterus is in a practically normal position, the vagina is inverted and the cervix is at the vulva, being enabled to come to this position as a result of its supra-vaginal attachment.

So far I have not referred to the alteration in the position of bladder that accompanies genital prolapse. It is the direct result of the pull of the anterior vaginal wall and of the yielding of the ligamentous attachment of the base of the bladder and of the urethra to the posterior surface of the pubis. It may be the first step to follow in injury to the pelvic floor, or on the other hand, it may be one of the later steps that result from the primary descent of the uterus. Once it has occurred it is only by hysterectomy that prolapse is certain, because it leads to straining and increased intra-abdominal pressure during micturition, and because it causes direct traction on the cervix of the uterus.

So much, then, for theoretical considerations. The more one studies prolapse, the more one sees how in its complete stage it is the result in most cases of an initial fault, which, by altering the normal strain to which the suspensory mechanism of the uterus is intended to be subjected, throws them out of sympathy with one another. This is the most essential point to grasp in planning a successful operation for prolapse, because just as the prolapse follows initially a single fault, so it will tend to recur after operation if a single weak point is left. Ventral fixation alone failed because the cervix was free to drop into the axis of the vagina, and so again to bring a direct pull on the utero-sacral ligaments. Vaginal plastic work, alone, failed because the descending uterus was capable of again dilating the vagina and forcing the muscles apart. Hysterectomy failed because it took no account of the fixation of the vaginal vault.

We have now to see conversely if, when once prolapse has resulted, it is possible not alone to bring back the different structures to their normal relation, but also to abolish all abnormal strains which may be thrown upon them. I think that one may consider rational prolapse operations to be divided into three periods:—First, the restoration of the normal direct support of the uterus and vagina so far as possible; secondly, the placing of the uterus in such a position that it offers the maximum resistance to descent; thirdly, the removal of complications and associated conditions, the result of prolapse. I will deal with these three parts separately.

**The Restoration of the Normal Direct Support of the Uterus and Vagina**

We have already seen that these supports are four in number:—First, the utero-sacral ligaments; secondly, the endo-pelvic fascia; thirdly, the suspensory ligaments of the vagina; and fourthly, the levator ani muscle. The shortening of the utero-sacral ligaments with a view to restoring their normal action on the cervix is advisable in all cases in which they are stretched. It is essential when one is dealing with a small uterus, because such a uterus cannot be made to offer sufficient resistance to its own descent unless its direct supports are also re-constituted. Wertheim was, I think, the first to recognise the importance of shortening these ligaments, and his operation is carried out by the vaginal route, but through the peritoneal cavity. I have also described a method of shortening the ligaments through the vagina at their point of attachment to the uterus, and this is the method which I usually adopt, as I consider it to be more easily worked in with the other stages of a prolapse operation than is Wertheim's method. It is unnecessary to enter into its details here, though I hope, if time permits, to say a word about them later. It is, however, necessary to say why utero-sacral shortening is so essential in the small uterus, and the reason, if one thinks of it, is obvious. In a moment I shall go on to say that I consider Wertheim's interposition operation to be one of the best methods of increasing the resistance of the uterus against prolapse. In this operation, the uterus is placed between the anterior vaginal wall and the bladder. If the uterus is of sufficient size, it is then directly supported by the levator ani muscle, as well as by the vaginal wall, and, furthermore, since it is too large to allow its body to remain in position while the cervix rotates round it and comes down again to the vulva, the result of the operation is usually excellent. If on the other hand, the uterus is very small, the cervix if free, can drop through the vagina, pull the remainder of the uterus after it. If, however, we fix the cervix by shortening the utero-sacral ligaments, it cannot rotate round the body and drop, while, at the same time, the strain on the shortened ligaments is slight, and they do not tend again to elongate.

The shortening of the band of endo-pelvic fascia, known as Mackenrodt's ligaments, has also been advised in cases of prolapse. Some of the advocates of this procedure support their view by saying that Mackenrodt's ligaments must give a great deal of support to the uterus, because their division during the course of Wertheim's hysterectomy allows the uterus to be pulled to a much
higher level. This argument, however, in my opinion, is based on an inaccuracy. It is not the division of Mackenrodt's ligaments that allows the uterus to be pulled to a higher level, but rather it is the division, first of the uro-sacral ligaments, and then of the vaginal suspensory ligaments, as I have already mentioned. At the same time, although I do not believe that Mackenrodt's ligaments have all the effect on the uterus which is sometimes attributed to them, I think that when they are shortened they are capable of adding to the general support of the cervix. Such shortening, to be effective, must be considerable, and if it is to be a safe procedure, it must be done with the greatest care, because, as we know, this part of the endo-pelvic fascia is pierced by the ureters, and if it is drawn out too far I think that it is quite possible that kinking of the ureters may result. A moderate degree of shortening is always brought about when supra-vaginal amputation of the cervix is performed, in consequence of the insertion of these ligaments into the upper part of the vagina as well as into the uterine cavity, and, personally, I am not inclined to try to shorten them to a greater extent in this way.

The support given by the vaginal suspensory ligaments is of the greatest importance, and if it was feasible to restore them to their original condition, such a step would be most desirable. At the present time, however, I am not aware that any operator has suggested any effective method of dealing with these ligaments, and for my own part, I can only say that I do not see that it is likely that such a method can be brought forward, owing to their position. The nearest approximation to them is the fixation of the vault of the vagina to the peritoneum covering the anterior surface of the sacrum, as was suggested by Stanmore Bishop some years ago. The only objection I can see to this procedure is that it necessitates an abdominal incision, and this adds on rather too much to an already prolonged operation. Personally, I have not performed Bishop's operation, and I do not think that it has received from anyone the attention which, on theoretical grounds at all events, it deserves. Further work on the fixation of the vagina is very necessary, and, if it is carried out, it is possible that an effective procedure for the restoration of the important fascial connection of the posterior vaginal wall may be devised. For the moment, however, we must consider that our efforts to restore the direct support of the vagina break down at this point, and that we are not capable of restoring effectively the vaginal suspensory ligaments.

The restoration of the levator ani muscle to its proper position according to its normal strength, a matter of ease and simplicity. It is an essential part of all perineorrhaphy operations, and is a step of the utmost importance in prolapse operations. I do not propose to enter into the method of suturing it on the present occasion, but will confine myself to saying that it is always possible and usually easy, except when the muscle has practically disappeared on one or both sides in consequence of atrophy or excessive retraction.

The Placing of the Uterus in Such a Position That it Will Offer the Maximum Resistance to its Own Descent.

We have seen that under normal conditions the uterus lies practically horizontally in the pelvis, and that its resistance to descent may be expressed as that of a surface corresponding in size to the anterior surface of the uterus. On the other hand, when the uterus comes into a position of retroversion, usually the first stage of prolapse, the resistance that is offered may be expressed as that of a surface the size of a horizontal cross-section of the uterus. Furthermore, when in a position of retroversion, the uterus descends into the pelvis as a wedge, point downwards, and so readily forces or dilates a way for itself through or between any opposing structures. Finally, when the uterus offers a maximum resistance to its own descent, not only does this increased resistance directly hinder descent, but it also lessens the strain which is thrown on the direct supports, and this is a most important matter. I do not think that it is possible by any means to reconstruct the direct supports in such a manner that they will resist the entire strain of the unsupported uterus, but if this strain can be brought back to its normal limit, then, in association with the reconstituted direct support, the tendency to prolapse will be overcome. The simplest method of bringing back the resistance of the uterus to the normal is by fastening the fundus in a position of anteverision. This can be done either by the shortening of the round ligaments or by the direct suture of the uterus to the abdominal peritoneum as is done in ventral suspension, and, as neither of these procedures in any way interferes with a subsequent pregnancy, one or other of them is indicated in the case of women still within the child-bearing period. It is, however, possible to increase the resistance of the uterus beyond the normal, but such a course inevitably affects detrimentally a future pregnancy, and may lead to the most serious results. Therefore, it is obviously only permissible in women who are past the child-bearing period, or in women in whose case there is no objection to producing an artificial sterility. The most important and the most reliable of such operations is undoubtedly Wertheim's interposition operation, and I have no hesitation in saying that it is the most valuable procedure which has been introduced of late years, for the cure of prolapse, because, not alone does it increase the resistance of the uterus to its own descent, but it also helps to fix the vagina in position, and to remove the prolapse of the bladder that both complicates and tends to perpetuate vaginal prolapse.

I have stated briefly of what the operation consists, namely, the bringing of the body of the uterus to lie between the bladder and the anterior vaginal wall. In this position, it is entirely extra-peritoneal, and so undergo proper development during pregnancy. The bladder is brought to lie wholly above it, and, provided the size of the uterus is sufficient, and that the cervix is fixed by the shortening of the uro-sacral ligaments, I consider the result cannot at present be surpassed. On the other hand, where the uterus is small, and the cervix is not fixed, recurrence of the prolapse is very liable to occur.

We now come to the third part of the rational prolapse operation, The Removal of Complications and of Conditions Associated With Prolapse.

There are a number of conditions which are either the direct result of uterine prolapse, or one
or more of its predisposing causes. In the cervix we may find hypertrophy—vaginal or supra-vaginal, so-called erosion, true ulceration, and laceration. In the body of the uterus we find endometritis and the different conditions which are usually grouped under the head "metritis," and which lead to uterine enlargement, and tumours such as myomata. In the pelvic and abdominal cavities we find adhesions and adhesions arising either in the uterine appendages or from other organs, and ascites, while, lower down, we find very frequently prolapse of the bladder, more rarely prolapse of the anterior rectal wall, and, most commonly of all, perineal laceration. It is obvious that these conditions must be removed if a successful result is to be obtained, and it is only necessary to say a few words about them. Erosion, laceration, and hypertrophy of the cervix are best treated by amputation of either vaginal or cervical myomata, according to the nature of the case. Endometritis is treated by curettage. Uterine tumours and abdominal pelvic tumours call for removal, while increase in the size of the uterus, apart from tumour formation, calls for reduction in its size by the amputation of a wedge-shaped portion from the body. This procedure is particularly necessary if Wertheim's interposition operation is to be performed, and, if it is omitted, trouble is likely to occur during the operation, owing to the impossibility of properly fixing a subjacent vaginal mucous membrane to cover the large uterine body, and also later, owing to the pressure which the large uterine causes at the lower part of the vagina. In such cases, the excision of a wedge-shaped portion of the body is essential, and does not add much to the length of the operation. Prolapse of the bladder is cured whenever the interposition operation is performed, and when the latter is contra-indicated, it can be cured by the performance of anterior colporrhaphy, which can sometimes be done by passing the displaced bladder back into its proper position before suturing the edges of the vaginal mucous membrane. The cure of a prolapsed rectal wall is directly associated with the cure of perineal laceration, and as this operation involves the suture of one of the direct supports of the vagina, namely, the levator ani muscle, I have already referred to it in its proper place.

Mr. President, Ladies and Gentlemen,—I have tried to place before you the theories on which I think the proper treatment of uterine prolapse must be based, and to indicate briefly the manner in which one transforms them into practice. To suggest that the result of operating along these lines is uniformly successful would be equivalent to saying that we had reached finality, and this is very far from being the case. All one can say is that we are beginning to adopt measures because of their probable permanent result, as opposed to measures which merely give a temporary benefit. There is, however, much room for improvement. So long as the posterior vaginal wall is left, as it is at present, with its supports in an imperfect condition, so long must operative procedure be defective. There are other points, too, in which improvement must come. The interposition operation is excellent in a suitable case, but it is incompatible with pregnancy. The restoration of the pelvic floor is in most cases effective, but it may be again destroyed during a subsequent labour. The very means which we adopt to reduce an enlarged uterus to a normal size may subsequently result in producing uterine atrophy, and so in removing the most effective part of the modern prolapse operation, namely, the placing of the uterus under such conditions that it resists, not alone its own descent, but the descent of the structures by which it is surrounded.

I have thanked you on my own behalf for the honour you have done me, and I could only wish that, for the reputation of the school which I represent, you had selected one who was more suited to put before you some of the problems of modern obstetrics and gynaecology, and their solution.

ACQUIRED AND HEREDITARY SYphilis.

By Prof. Paul Rostaine, M.D.,
Late Director of Claires at the Faculty of Medicine of Paris.

[Specially reported for this Journal.]

It is generally supposed that heredo-syphilis cannot contract syphilis de novo, and this view is not confined to the latty, indeed it is shared by certain practitioners. Instances of this are by no means rare. Here is one under my own observation. A gentleman whose son had just finished his college course informed the latter that he had had syphilis in years gone by, and recommended him to mention the fact to any medical man to whom he might have occasion to apply by reason of venereal disease in order to prevent their falling into error. This may be taken to mean that he was under the impression that the syphilis which he had contracted before the birth of his son protected the latter against infection. This idea must have been firmly anchored in his head for him to undergo the humiliation of communicating the fact to his son. Tarnowski relates a similar instance. The patient in question was suffering from manifest syphilis calling for a prolonged course of treatment, but this the patient absolutely refused, saying that he had not been in a prostitute for at least twenty years, and had on several occasions had exactly similar ulcers which had healed up without trouble. Anyhow, he added, he could not have contracted a fresh infection seeing that his father had had syphilis, and that his birth was subsequent to the paternal infection. He was firmly convinced of his invulnerability on the strength of what his father had told him, and later on, he said, he had had plenty of opportunities to satisfy himself of the impunity of connection with syphilitic women.

The persistence of this error is due to the fact that the question of syphilis being acquired by heredo-syphilis is never properly formulated. There are degrees in heredo-syphilis which are not taken into account. We talk en bloc of heredo-syphilis without allowing for the categories which nature has established according to the virulence of the lesions which these subjects present.

The question was for the first time postulated clearly and categorically by Professor Gaucher in 1903. In one of his clinical lectures he showed that it is only in certain conditions that inherited syphilis affords any protection against infection. In speaking of inherited syphilis we must be careful to specify the form in which it was manifested. There is considerable difference between a subject of inherited syphilis who is dystrophic, presenting dental lesions and one who displays
the secondary and tertiary accidents of inherited syphilis. It is therefore indispensable to subdivide these cases of inherited syphilis into several groups before we start discussing the degree of immunity conferred by parental syphilis towards subsequent direct infection.

In the following year Professor Gaucher elaborated a classification of cases of heredo-syphilis according to the different clinical types and the degree of virulence of the transmitted disease. In enumerating the manifestations of inherited syphilis in living infants born at term he pointed out that the disease may give rise to various manifestations throughout their entire existence, because hereditary syphilis does not merely mean congenital syphilis or infantile syphilis, but comprises all the accidents dependent on the transmitted disease from birth onwards.

We require to classify these multiple manifestations in order to study them as a whole. They have been placed in two groups: (1) the manifestations of what has been termed early hereditary syphilis; (2) late manifestations of hereditary syphilis. This classification is not quite accurate because, in the so-called early hereditary syphilis, we get lesions of very different standing. In cases of premature delivery, for instance, we may meet with certain focus which are born with dystrophies which are the delayed lesions of a distant, attenuated infection, while others come into the world with generalized lesions of secondary syphilis. To retain this classification we should have to specify that the symptoms of syphilis occurring immediately after birth or during the first few months of life are of different standing, that there may be hereditary, secondary or tertiary accidents, parasyphilis and dystrophies. Professor Gaucher classifies them as follows:—1st degree: Secondary heredo-syphilis, which resembles in respect of its manifestations the acquired secondary syphilis of the newborn. This is what Fournier calls "decapitated" syphilis, which, except for a different origin and the absence of a chancre, presents all the features of secondary acquired syphilis with which it may be assimilated. 2nd degree: Tertiary heredo-syphilis, an attenuated form of syphilis presenting tertiary lesions which are generally the delayed manifestations of a syphilis that is on the decline. 3rd degree: Quinary heredo-syphilis, represented by manifestations of what we may call dystrophic hereditary syphilis, in the shape of congenital malformations developed in utero under the influence of parental syphilis and caused by the disturbance of nutrition and development entailed by the infection.

These four main divisions enable us to approach the question of syphilis acquired by heredo-syphilitics under the various aspects in which it may present itself. They establish clearly enough that heredo-syphilitics do not all receive from their parents an infection identical in virulence, and to grasp the probability that the immunity conferred by reason of parental infection cannot be the same in all cases, in fact that there are "degrees of wickedness." I will now discuss each of these categories separately from the point of view of the protection afforded to the subjects in each.

Before discussing acquired syphilis in heredo-syphilitics properly so-called, we must enquire how the descendants of syphilitic parents who have never presented any signs of heredo-syphilis behave in respect of acquired infection. An infant born healthy, of syphilitic parents, is not, as a matter of fact, a heredo-syphilitic in the ordinary acceptance of the term since he has not inherited any pathological strain. He is not syphilitic and cannot therefore have inherited any degree of immunity to syphilitic infection.

Quinary heredo-syphilis manifests itself by dystrophies—the characteristic dental anomalies, skeletal dystrophies such as the OhlHappy forehead, the arched palate, the platybasium, dystrophies of other organs, e.g. marginate exfoliative glossitis and squint, the importance of which in the diagnosis of heredo-syphilis has been worked out by Professor Fournier.

Quaternary heredo-syphilis comprises the so-called para-syphilitic affections such as hydrocephalus, juvenile tabes and infantile general paralysis.

I have collected some fifty cases of acquired syphilis in quaternary and quinary heredo-syphilitics. This means that in these two groups the individuals behave exactly like normal subjects when exposed to the infection of syphilis. This is readily explained by the attenuation of the virus of the inherited syphilis either on account of the length of time that has elapsed since the parental infection or the effects of specific treatment. We may therefore conclude that quaternary and quinary heredo-syphilics are liable to contract syphilis in the same way and with the same case as the normal individuals.

The tertiary manifestations of the heredo-syphillic differ in no essential particular from similar manifestations in acquired syphilis. I was able to bring together in my thesis sixteen instances of this class, two of them under my own observation and the others published by syphilographers of renown, such as Hutchinson, Merkel, Wolf, Lang, Emery and Jullien.

These cases are rare but they are unquestionable, and I think it must be conceded that under certain circumstances, when the virulence is much attenuated, tertiary heredo-syphilitics are liable to contract syphilis.

To talk of acquired syphilis in the subjects of secondary heredo-syphilis is to raise a question involving doctrinal conceptions and problems of general pathology which I shall not attempt to solve. It opens up the whole question of the possibility of reinfection. "What one would like to see," says Professor Fournier, "would be an hereditary syphilitic presenting the accidents of secondary syphilis at birth who, in later life, contracted syphilis. Personally I know of no such instance."

I have only been able to find one instance in medical literature of syphilis acquired in a subject who presented the accidents of secondary heredo-syphilis, viz., a case reported by W. Taylor, and it would not be safe to dogmatise on the strength of this single observation in favour of the possibility of the reinfection of syphilis.

It follows that although syphilis in the form of tertiary heredo-syphilics does not always afford immunity against reinfection, inherited secondary syphilis, true "decapitated" syphilis, does confer that immunity, and that in cases in which syphilis was acquired by the subjects of secondary heredo-syphilics this would really amount to syphilitic reinfection.
CLINICAL RECORDS.

A CASE OF RUPTURED UTERUS FOLLOWED BY RECOVERY.

By THOMAS RARBY, M.D., R.C.H., D.P.H., Thurl.

On July 12th, at seven in the evening, I was called to see Mrs. C., a farmer's wife, and got a history that she had had six children previously, all born without difficulty or even the attendance of a professional nurse. She was at work as usual the previous day, when pains came upon her, but to try to bear down. A few hours later, the pains became more frequent, and remained about three hours and left as the pains ceased. She was again called at 8 in the morning, as the pains had returned. They persisted at intervals until two in the afternoon, when they ceased altogether, after which the patient got gradually weak, and I was sent for in the evening at seven o'clock.

The account given that at question, was the labour severe, nor was there any sudden internal pain or sensation of "something giving way," which is commonly described in cases of rupture of the uterus.

On examination I found the patient in a very collapsed condition. The face was pale and drawn; the pulse rate was 160 per minute, and appeared very unnecessarily alarming. The abdomen presented a curious appearance, as if the uterus were in two parts. No vaginal examination was done, but severe, hemorrhage, and the presenting head, which was far up, could be felt.

From all the conditions, I suspected rupture of the uterus, and sent for Dr. Jackman, of Thurl, in consultation. On his arrival the careful search for the entrance of the patient had become even more extreme, and, on vaginal examination, no presenting part could be felt, which suggested that the fetus had by this time escaped from the uterus. Dr. Jackman confirmed the diagnosis, and we decided to deliver, if possible, as an abdominal operation was out of the question. There was no haste, but we were ready for any eventuality. The abdomen was opened, and the uterus found to be in two parts, one lying quite beside the other, and appearing quite normal. The abdomen presented a curious appearance, as if the uterus were in two parts. On vaginal examination there was some, but not severe, hemorrhage, and the presenting head, which was far up, could be felt.

I reached the child's feet and brought them down, and delivery of the body and shoulders was accomplished without difficulty, but the head was quite difficult, and the birth was attended with much trouble. It was brought out with difficulty, and the head was squeezed, and the birth was attended with much trouble. It was brought out with difficulty, and the head was squeezed, and the birth was attended with much trouble. It was brought out with difficulty, and the head was squeezed, and the birth was attended with much trouble. It was brought out with difficulty, and the head was squeezed, and the birth was attended with much trouble. It was brought out with difficulty, and the head was squeezed, and the birth was attended with much trouble. It was brought out with difficulty, and the head was squeezed, and the birth was attended with much trouble. It was brought out with difficulty, and the head was squeezed, and the birth was attended with much trouble. 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It was brought out with difficulty, and the head was squeezed, and the birth was attended with much trouble. It was brought out with difficulty, and the head was squeezed, and the birth was attended with much trouble.

Next morning she was much better with a pulse of 110. She complained of great tenderness, and vomited slightly. I changed the gauze packing which was blood-stained. The abdominal tenderness was followed by swelling and hiccough, and there was plainly a certain amount of peritonitis.

The gauze was changed for four or five days, and then dispensed with altogether. Vomiting was very troublesome for some days and caused great pain which was located in the womb. The latter organ could be felt in a hard mass in the right iliac region. After two days the bowels moved naturally. Diarrrhea set in and was present at intervals for two weeks. The urine was dysuria, and had a disagreeable smell. It began to appear from the vagina and continued for a week, the abdominal swelling and tenderness gradually disappearing at the same time. It was clear that the inflammatory fluid was being drained from the peritoneum through the rent in the uterus.

At the end of three weeks all signs of abdominal trouble had disappeared and the woman had recovered, but, unfortunately, she had been confined in a lunatic asylum some years ago and mental symptoms again began to appear, which have not as yet quite passed away.

I think this case is quite worth bringing to the notice of the profession as many of us in country districts would have little hope that such a one would recover under non-operative treatment.

OPERATING THEATRES.

ST. THOMAS'S HOSPITAL.

Having operated upon an inguinal hernia in a child and an umbilical hernia in an adult, Mr. Corner said that there were three important clinical considerations about each of these sets of hernia. Hernia is a very common condition, and in consequence it behoved all men to understand the symptoms and wherefore about them.

Why did we operate on these hernias? Operation is recommended or done on all hernias, unless there is a contra-indication special to the patient. In other words, operation is the first line of treatment. Why? Chiefly for two reasons: the disabilities of the patient and the quality of the operation. Let us begin with the disabilities of the patient. Firstly, the condition is incurable without operation: apparent cure is hazardous, and a hour is dangerous, especially in those of the sure of security it gives. Secondly, a man is a incurable, distressing thing to wear, fraught with disadvantages to the rubbed and squeezed tissues, as well as to the patient. Moreover, it is a danger, being often worn on the hernia, does not come instead of under the hernia, in this way being responsible for inflammation, adhesions, irreducible and graver accidents in the contents of the hernia. Thirdly, and a business consideration, no service, civil or military, will accept a person with a hernia. He is rejected for any active life, civil or military, and is a "cracked pot." In fact, the disabilities of the hernia-patient can be made into a long list of thistles and thorn's, and as it might bring weedy recollections of the Sabbath's sermons, it is well to be satisfied with indicating that the presence of a hernia is a great nuisance, a great disadvantage, and a possible source of danger. Moreover, the disadvantages and dangers are greater in femoral hernia than in inguinal, and still greater in umbilical than in femoral, whilst internal hernia which need not easily declare themselves, and are ever so dangerous the external hernias which show their presence. Obturator and diafragmatic hernia may be classed with internal hernia.

Mr. Corner then pointed out that special reference must be made to the hernia of children, because in them operation was aided by the subsequent growth of the region, and it was possible to do more for children than for adults.

As to the qualities of the operation. These operations have changed much in the last ten years: they have risen from 342 (practically one a day) to
about 700 (two a day). This shows the great appreciation of the benefits of the operation by the working classes. The duration of the convalescence is short—a fortnight in bed. The danger of the operation is practically nil. The pain of the operation is much less, owing to the absence of inflammation, than it was ten years ago. The possibilities of cure are nearly as good as those observed by Sir John Galt, who met a sure ground of dispute, recently recurred took place in about 4 per cent., and ten years ago in about 3 per cent. These numbers appear too small, but they serve to indicate the progress, by bearing witness to the improvement in technique, the percentage of recurrence of hernia after radical cure has not fallen in the last ten years—it is the patient’s misfortune or fault, not the surgeon’s fault or failure; secondly, more or less fit people are seeking the benefits of operation for their hernia.

For a third consideration are the essential points in an operation for the radical cure of a hernia. In order of importance they are: Firstly, the complete removal of the sac; secondly, healing by first intention (i.e., of the deeper parts of the wound); thirdly, suture of the canal. This order of merit for consideration is designed for its application to inguinal, femoral, and obturator hernia. But an suture of the canal is of prime importance in the radical cure of umbilical and ventral hernia. Hence the surgeon’s work can be easily done well, and the result must be great. It is only necessary for the surgeon to work with. Simplicity of operation, so long as it is sufficient for success, is the best. Do not waste time in the exact suturing of inguinal canals.

The question of operation for all kinds of hernia has been considered briefly, and it is explained why operation is desirable in all cases, unless some condition of the patient indicates otherwise. Further, operation is more necessary for umbilical and ventral hernia than for femoral hernia. Operation is more needful for femoral than for inguinal hernia. In the last is seen more the operation of expediency than the operation of necessity, which figures first in umbilical and femoral hernia.

CORRESPONDENCE.

FROM OUR SPECIAL CORRESPONDENTS ABROAD.

UNITED STATES OF AMERICA.


AN ACT TO CONTROL OPium TRADE IN U.S.A. AT HOME AND ABROAD.

(Concluded from our last issue.)

Dr. Hamilton Wright has sketched the principles to be contained in such an Act, and has embodied them in his report to the Secretary of State on behalf of the American Delegates to the International Commission which sat a Shanghai in 1909.

(1) That such an Act should demand the registration of every person who imports, produces, manufactures, compounds, distributes, or otherwise handles habit-forming drugs in interstate or foreign commerce.

(2) That importers, wholesale compounding pharmacists, and wholesale dealers should pay a small per annum tax, and that retail pharmacists and other retail dealers, including physicians who buy in interstate commerce and who carry large supplies of the drugs, should pay a tax of from $1 to $3 per annum; that everyone engaged in handling drugs should register and pay a tax.

(3) That, without attempting to derive a revenue beyond the amount necessary to administer the Act, all of the habit-forming drugs should have imposed upon them an internal revenue tax, and that such tax should be paid by affixing to packages or other receptacles containing the drugs, an engraving stamp, to be affixed and cancelled according to law.

(4) That all compounds or preparations manufactured from the original tax-paid drugs should be marked or branded in such a manner as to show the payment of the tax on the original drug.

FROM OUR SPECIAL CORRESPONDENTS AT HOME.

SCOTLAND.

GLASGOW.

UNORGANISED HOSPITAL AID FOR WOUNDED.

The Scottish Branch of the British Red Cross Society have issued a statement deprecating the well-meaning but unauthorised endeavours that are being made in some places to form local hospitals. This action on the part of voluntary aid detachments of the Society is calculated, they say, only to cause confusion and unnecessary trouble, without fulfilling any useful purpose. The control of the voluntary aid detachments is now in the hands of the Territorial Force, and the Territorial Force is mobilised, from the Red Cross Society to the military authorities. Ample provision for the care of the normal per centage of sick among those troops that are present and quartered in the country has already been made, and the only chance of large numbers of wounded being in any particular part of the country, unless transported there, is if there is actual fighting in that part of the country. The military and naval authorities are better able to judge than any private parties as to the places in which fighting is likely to occur. What is desirable is that people should be prepared to take up such enterprises if they become necessary in any locality in the future.

MILITARY HOSPITALS.

The recently instituted military hospitals, such as that at Stobhill, Springfield, Glasgow, are not under
the control of or supported by the Red Cross Society, has been equipped and are supported by the Government, while their sole management and control lie with the military authorities. There is no Red Cross hospital in Scotland at the present moment, nor will there be until the necessity for it is indicated officially by the military authorities. It is more probable that Red Cross units or even an hospital may be asked for abroad, and a large amount of money will be wanted for these.

**Dumbartonshire Doctors' Arrangements.**

The Dumbartonshire Branch of the British Medical Association has held a meeting in Glasgow with the County Panel and Local Medical Committees. It was unanimously resolved to recommend to all medical practitioners in the county that, during the war, wherever possible, medical aid should be given free of charge to the necessitous dependants of all men on active service at home and abroad; and, further, to suggest that the best way to carry this recommendation into effect would be by affording gratuitous attendance to such necessitous cases as are vouched for by the Soldiers' and Sailors' Families' Association or by its local committees throughout Dumbartonshire. A resolution intimating willingness to co-operate was also passed unanimously within the county was also passed unanimously. It was decided to assure those doctors in the county who have been or may yet be called up for service that the interests of their practices will be safeguarded by the Board of Health.

**National Health Insurance and the War.**

The Scottish National Health Insurance Commissioners have intimated that no arrears need be paid up by Reservists or Territorials on service. Their wives need not pay arrears on their behalf. While the husbands are serving, their wives will be entitled to maternity benefit, even if they are in arrears, provided the usual 26 qualifying contributions have been paid. No matter how great the arrears are, the maternity benefit is payable. Societies will continue to deduct pay made for maternity benefit even if, as in the case of a man who had remained ordinary employed contributors.

**LETTERS TO THE EDITOR.**

**Sir Victor Horsley and Forcible Feeding.**

Sir.—As a small and obscure one I have always felt a vast admiration for those that seemed really strong and deservedly prominent in our profession. I have been always greatly drawn to the personality of Sir Victor Horsley. I saw him show his strength at about the opening of my career in his fight against the fanatical—or perhaps maniacal—opponents of physiological research; I saw him standing alone as a strong man confronting the great gathering at the procession at Queen's Hall at the opening of the Insurance Act campaign. He has always seemed to me scientific, logical, and strong, and yet we now see him taking up an attitude in the forcible feeding question that seems a negation of all these qualities. It seems to show that there exists a great deal of humanity in mankind, and that the strongest man has a weak spot on his sentimental side through which he makes himself susceptible in the eyes of all those who have preserved their mental equilibrium in the controversy. Sir Victor Horsley's main arguments in his letter in your last issue seem to me to be simply fantastic. The Suffragettes demand the vote which Parliament refuses, and in fact claim that the State has no right to punish them when they attempt to coerce the law. The threat of law and terror. They say, in fact, that being convicted and sent to prison, they ought to be released because they attempt suicide.

It is the duty of the authorities to keep them in prison and prevent suicide, and when the attempt at suicide takes the form of a hunger strike they justly prevent it by forcible feeding. It is a grotesque quibble coming from an accomplished man of scientific intellect to suggest that the Suffragette deserves treatment any different to what would be meted out to an armed burglar or other criminal of the kind. The burglar has as much right to help himself to other people's goods by force as the Suffragette has to coerce the State into compliance with demands which they refuse. Sickly sentimentality is one of the many causes affecting our country during long years which have contributed to prevent any change on Empire and on the position in which we now stand. The sickly sentimental treatment of the Suffragettes has brought upon us the scorn of the civilised world, and has helped at least in some degree to imbue the foreign public with the belief that the Empire is no longer worthy to hold or fit to govern the vast domains across the seas over which the flag still continues to fly.

I am, Sir, yours truly,

**An Obscure Practitioner.**

**FORCIBLE FEEDING.**

**To the Editor of The Medical Press and Circular.**

Sir.—I fail altogether to follow Sir Victor Horsley's line of argument in the last number of The Medical Press and Circular. Sir Victor says: "Forcible feeding is certainly not employed as Dr. Sers asserts it is, to keep militant hunger-striking Suffragists alive, because if it were, then all such prisoners the latines are missing, including Mrs. Pankhurst, would have been killed." The fact that some are forcibly fed and others are not is in no wise controverts the truth of my statement, viz., that "they are fed to be kept alive," because in those cases where they are fed, the Government in their weakness have yielded to the "attempt to commit suicide," hence the necessity of forcible feeding, as in the case of Mrs. Pankhurst, does not arise. On the other hand, in those cases where refusal has occurred on the part of the inmates to themselves, acted with more resolution and determined to detain the prisoners alive in prison as long as possible, the necessity for forcible feeding does arise in order to prevent starvation. How, therefore, in the face of this can Sir Victor say an "error in my statement"?

I entirely agree with the Home Secretary and Sir Victor Horsley that forcible feeding is a most objectionable phase of the whole subject of starvation of any kind; but until some better method is discovered as a deterrent to homicide we retain it, notwithstanding its repulsiveness and objectionable features. The Governments all over the world are quite determined that we should retain to prevent starvation, and I venture to state it surpasses the wit of man to deal with voluntary starvation by any other method, unless possibly under some hypnotic process or "suggestion." May I ask Sir Victor, as he lays so much emphasis on the objectionable phase of forcible feeding, why the militants so directly concerned do not obviate the necessity for it by eating their food after the manner of human beings,payment with starvation for forcible feeding is in some sense "punitive," because it detains the militants in prison longer than convenient, and ensures for the time being their inactivity for further crime; but none save the most premeditated could conceive forcible feeding is resorted to in order to inflict pain. On the contrary, artificial feeding is incomparably less painful than hunger-striking, and I venture to state, as in the case of the present war, where a large number of cases has been discussed, the overwhelming majority would accept forcible feeding as an alternative to starvation if need be, even to the end of their days.

With respect to the trouble as to whether forcible feeding is "medical treatment" or otherwise, this appears to me arbitrary, but speaking for myself I should say forcible feeding in the hands or under the supervision of a qualified medical man should certainly be regarded as medical treatment, in the
same sense as artificial respiration in the case of a person all but dead from asphyxiation or through drowning would, if performed by or under the supervision of a medical man in time.

There is one question somewhat vague to me and which might open too wide a field for discussion which Sir Victor asks in the last paragraphs of his letter. He had better, I suppose, have replied to me irrelevant to my letter, and I have already encroached too much on your valuable space, so I would rather focus attention to my original and simple question—viz., *What do those who propose discarding artificial ventilation do as a substitute to prevent death from starvation?*

I am, Sir, yours truly,

CLEMENT H. SER.

5, Chancetby Road, Hove.  
August 27th, 1914.

REPORT OF SELECT COMMITTEE ON PATENT MEDICINES.

To the Editor of The Medical Press and Circular.  

Sir,—For my present knowledge of the above-named report issued on Wednesday last, I am indebted to the excellent summary in the *Times* of the following day. It is evident that the Committee is unanimous. The necessity for changing the law where it is alleged to be to the last degree simple and practical. The members of the Committee either alone or in combination will be able to make plain to the Government the urgent need for legislation; and there need be no doubt that, unless in the meantime we fall under the heel of Germany, we shall before long see an end put to a villainous traffic left too long immune against the law. It is a good deal more than 30 years ago that I began to help in exposing quackery. I always urged that the case for legislation was overwhelming and needed only exposure before some authoritative tribunal to compel the activity of Parliament. I advocated a Royal Commission; but I now see that the work was quite within the power of a Select Committee. The present Committee has dealt with only one half of the question; another Committee on the same lines is capable of dealing as deadly a blow at quackery as represented by fraudulent unqualified practitioners and those of their assistants who, as frequently happens, have been struck off the Register for infamous conduct, and yet go on practising screened by a quack.

I am bound to say that in the long fight against quackery the Medical Press and Circular has always stood in the front, and in spite of the apathy and even occasionally the sners of other medical papers has stuck to its guns in a righteous campaign.

SIR:—I have for some time past been engaged in a review of Select Committee leaves very little doubt that they are determined to see the matter through; but at the same time the profession through all its organised bodies ought to prepare to back them up in every possible manner. It was, I think, a great advantage that when I gave my evidence with regard to advertising, the Chairman of the Committee should have given place to the Hon. Harry Lawson, one of the proprietors of the *Daily Telegraph*. My evidence was printed, and I hope will be issued with the report. The long list of remedies the advertisement and sale of which the Committee advise should be prohibited will remove the last shred of excuse for newspaper proprietors; and it can hardly be doubted that there are, of course, a considerable number of people who are quite blameless—among the great papers that have up to now admitted objectionable advertisements will have to reconsider their position. It is the majority of the great papers that have done the least harm and have justified the law journals in more disgraceful methods including the insertion of puffing articles written and displayed in the style and place of editorial matter. I quoted to the Committee the statement made by one of the managing directors of a country newspaper company on the subject. He said they were a purely trading company, and it was out of the question that they could refuse quack advertisements which appeared in the majority of leading London papers, including most of those that set themselves up as exposures of humbug and fraud.

I am, Sir, yours truly,

THOMAS DUTTON, M.D.

London, August 24th, 1914.

— [Our correspondent will note that the statement to which he takes exception occurs in a "Letter to the Editor," which does not constitute an expression of editorial opinion.—Ed. M.P. and C.]

REVIEWS OF BOOKS.  

CLINICAL EXAMINATION OF THE BLOOD. (4)  

We are told that this small book is written with the idea of furnishing a very elementary guide to the most important and essential methods of blood examination regarded from the standpoint of the chemist and of the pharmacist.

There are three chapters—one on the blood film, one on haemoglobinometry and one on haemocytometry. Two very useful plates from Pappenheim's atlas are included. Only the methods preferred by Pappenheim are described. In spite of the elementary scope of the book it contains some strong features. Distinctions between cell types are drawn which are far beyond the realm of practical utility, and this appears to be admitted on page 36. On page 33 we are referred to the leucopenic type of leucocytosis and the leukemic form of leukemia. We are at a loss to know whether this is the wise type of nonsense or the nonsensical type of wisdom.

As a sample of the author's style we may quote the last paragraph—"The key to an increased anemic index in oligochromic oligochromatoma is the hyperchromatoma malformed cell." True, but not safe that we cannot establish whether the late Domine Sampson in ejaculating "Prodigious!"

(4) "Clinical Examination of the Blood and its Technique," by Prof. A. Pappenheim, translated and adapted by R. Donaldson, Bristol: John Wright and Sons, 1914. Price 3s. 6d. net.
PROBLEMS OF SCHOOL HYGIENE. (a)

This Conference was held at Edinburgh in May, 1913. It was attended by some seventy delegates from all parts of Scotland. Various subjects were discussed, such as the Hygiene of the School, the Medical Treatment of School Children in Towns, and Physical Education. Attention was given to the treatment of scabies and verminous conditions, very commonly presented by children attending Scottish Board Schools. Here the Board and the Public Health Department must co-operate. There are, in our experience, very few children attending city board schools whose heads are free from pediculi.

This is a matter calling for very stringent measures, much more so than we fear, is the case at present. This report is very interesting reading, but conferences of this nature do not give the full light of practical value when the suggestions given are acted upon. There is evidently a great amount of really good pioneer work being done by School Medical Officers, but much of it is necessarily hampered by conditions over which they cannot possibly have control.

SURGERY OF THE STOMACH, (b)

Good wine needs no bush, and this old axiom may be applied to Mr. Paterson's book on "The Surgery of the Stomach." That this work has been well appreciated by members of the medical profession is proved by the fact that the third edition of the work has already been exhausted. The popularity of the volume may be explained by the fact that it contains a remarkably clear exposition of the present situation of treatment of diseases and affections of the stomach from the surgical standpoint. For the eyes of the author are in some respects original and not in agreement with the opinions of the majority of surgeons. Mr. Paterson's conclusion in that the event of true pyloric obstruction the outlet from the operation of gastrojejunostomy is owing to functional changes and not solely to the formation of a direct passage from the stomach to the jejunum is dealt with at length, and his assertions to this effect are supported by examples and data drawn from his own experience. Undoubtedly the evidence he brings forward makes out a strong case for his contentions. To use a common English simile, "the proof of the pudding is in the cake." The author shows that his views are at least worthy of careful consideration. In the present edition the photographs illustrating the operation of gastrojejunostomy have been reproduced in pairs, and by using a stereoscope the minutiae of the operation are rendered exceedingly distinct. Plates from radiographs prepared by Dr. A. C. Jordan directing attention to the value of the method of diagnosing lesions of the abdomen have been also inserted. The practical charts for the orderly, e.g., as it does from the hands of a capable surgeon, are likely to be found; this, the second edition, to a still larger audience.

**LITERARY NOTES.**

Professor Calot's monumental work entitled "Indispensable Orthopaedics," with coloured plates and 1,252 illustrations in black and white, has now reached its tenth edition. The "Problems of School Hygiene" has already appeared in five different languages, and the present English edition is translated from the sixth French edition. It is written for general practitioners, and impresses upon them the necessity of beginning to treat all orthopaedic affections from the very commencement. It is divided into four parts dealing with acquired orthopaedic affections of a tuberculous origin, of a non-tuberculous origin, congenital orthopaedic affections, and an appendix. The splendid illustrations are quite a feature.

**"Keep Breathing: How to Do It and Why."** This short brochure, by Madame A. M. Carr, "Professor of Audiology, Voice Production, and Singing in All Branches," purports to be a textbook and guide to right breathing, singing, speech, and every purpose in life. The author states that the "key" to the initial method "came to her" in 1870 when she found the true way to restore her own voice and as she grasped the system, a great desire to tell others about it came to her, for she realised it was in the nature of a discovery—a revelation. This method of acquiring expression, which appears simple and easy, and really one begins to wonder, in view of this and other like "discoveries," whether the painful, laborious and expensive process by which a scientist is made is not indeed a work of supererogation? The method is arranged in the form of questions and answers, and the keynote to the so-called system propounded by the author is a knowledge of automatic deep breathing, which "consists in 'letting yourself breathe,' just as you 'let yourself live' as an infant."

Matthew's "Manual of Nursing Homes" is a concise guide to spas, health resorts and hydros of the British Isles, together with a list of nursing and mental homes. This book is similar to a great and little body in view is an endeavour to supply a handy reference manual for the use of medical practitioners and the general public. On the left-hand side of each page is a photographic reproduction of the health resort, arranged in alphabetical order, followed by a description of the chief attributes of each; the right-hand page is devoted to notices of the various homes and institutions, the whole forming a concise and comprehensive list of the information which one desires to see in such a work.

The guide fails in complete utility owing to the omission of practically all the nursing homes in the central part of London, not one of the well-known ones being included, and the same objection still is found in the almost universal absence of any indication as to fees in the case of private nursing homes, about which an intending patient usually desires exact information.

**"Auricular Flutter" is a pathological action of the auricles characterised by rhythmical coordinated contractions of their musculature at a rate that is greatly accelerated, usually between 250 and 300 per minute."** The term "auricular flutter," as applied to the human articles, is described for the first time by Laennec in 1811. The clinical disorder is identical with the flutter induced experimentally by MacWilliam, and the present work forms a compendium of everything worth knowing with regard to this condition of auricular acceleration. The physiological, pathological and clinical facts regarding this disorder, together with the features which distinguish it from other disturbances of the heart's action, are here clearly described by Dr. Jordan, and well illustrated by numerous electro-cardiograms and tracings.

We are glad to welcome the appearance of this book at the present time as an authoritative pronouncement on this very interesting and important type of clinical abnormality, of which we think those who may have had experience with it will find it most valuable, and we cordially recommend the work before us, as it embodies a carefully written statement of the extent of our present knowledge.
Criticalism of a Bone-setter.

An inquest was held at the Durham County Hospital last week upon a youth of seventeen who was injured on July 16th in a colliery. The father stated that his son told him that he was putting at a flat. An empty tub was to be taken to a heavy place on the face. In hand putting this tub he slipped and fell on his knee, bruising it, and he was afterwards taken to a bone-setter.

The Coroner: Why on earth should the boy be taken to a bone-setter with a bruised knee when he was being medically attended?

Dr. Hare said that what the bone-setter had done was to give the boy an inflamed joint. The leg was made a hundred times worse.

The Coroner declared that the inquiry showed how very foolish it was for people to go from a skilled medical adviser to an ignorant, unskilled man, who might fancy that he would be able to do it, and probably would be able if there were a dislocation.

The bone-setter had inflicted pain upon the boy and rendered the work of the skilled surgeon more difficult.

A verdict of "Death from heart failure following the accident" was returned.

A Sanatorium for Hull.

It is announced that the Hull Corporation have decided to borrow £14,438 for the erection of a sanatorium and hospital at Cottingham.

The Incorporated Sanitary Association of Scotland.

The fortieth annual Congress of the Incorporated Sanitary Association of Scotland will be held at St. Andrews from September 2nd to 5th. In a circular it is stated that the Council of the Association, acting in concert with the Town Council of St. Andrews, have decided that it is right, and indeed patriotic, to proceed with the business of the Congress as usual, but all the social functions which were arranged in connection with it have been cancelled. The business arranged in connection with the Congress will be a lecture on "Health and the State," by Dr. W. Leslie Mackenzie, medical member of the Local Government Board. Mr. Francis Braid, sanitary inspector, Kirkcaldy, in his presidential address, will deal with "The Housing Problem as it presents itself today," and "The need of a sanitary definition and fixed standard for milk," will be introduced by Mr. W. W. Kelso, sanitary inspector, Paisley.

Other subjects to be discussed are "The handling and distribution of milk at railway stations and the inroads about disinfection," and "The question of establishing a uniform system and standard of meat inspection."

MEDICAL WAR ITEMS.

The following resolution has been passed by the Chadwick Trustees:—That in view of the immense importance of encouraging in every way the promotion of careful sanitary organisation in the naval and military services during the present campaign, the Chadwick Trustees have resolved, under the powers conferred upon them under the Scheme they administer, and under the provisions of their indenture to award at the close of this year the Chadwick Gold Medal to £50 each to the naval and military Medical Officer respectively in the British service who shall have distinguished himself most in promoting the health of the men in the Navy and the Army. The nomination for such presentations to be, as provided by the terms of the Trust, by the Directors-General of the Naval and Military Medical Services respectively.

The Board of Chadwick Trustees have also making arrangements for providing, or assisting in the provision of, lectures and demonstrations on naval, military and hospital hygiene. Particulars of these lectures will shortly be announced.

It is good news to hear that "Salicine," which was referred to in the "Confidential Circular" addressed by H.M. Government to the medical profession as being in short supply in the salicylic group, is now guaranteed by the British manufacturers to be sufficient for at least two years' normal consumption.

Two hundred beds are at the disposal of the Admiralty in the Dreadnought Hospital at Greenwich for the reception of sick and injured who may arrive in the Thames at any moment from the Fleet. These beds are fully equipped and in close proximity to the operating theatres, etc.

The Cambridge Research Hospital, through the generosity of Mr. Otto Beit, has been offered to the War Office as a completely equipped hospital for sick and wounded medical, surgical, and nursing staff for 20 beds. The War Office have intimated that they will be glad to avail themselves of this offer should additional hospital accommodation for officers be needed.

The Queen Victoria Memorial Hospital at Nice, of which Sir George White, of Bristol, is the Chairman, has been placed at the disposal of the French Government for the reception of wounded officers.

Sir Thomas Shangnessy, President of the Canadian Pacific Railway Company, has offered on behalf of his company, a ship to be equipped and opened as a hospital by the Women's Empire League.

The Council of the Royal Institute of Public Health has placed its laboratories at the disposal of manufacturers and others who wish to avail themselves of the Institute's bacteriologists and chemists.

The British Field Hospital for Belgium, which is recognised by the War Office and is officially under the Belgian Red Cross organisation, has an honorary staff of 600 doctors and 400 nurses. The equipment includes 40 beds for wounded, X-ray apparatus, motors, ambulance cart, and four horses, and every requisite for hospital and emergency work.

With the object of giving financial assistance to the British Red Cross Society, Red Cross stamps in six different designs have been prepared, and a first issue of them, the 200 million stamps has just been put into circulation. The disposal of the committee free of cost. The stamps will be sold at a halfpenny each or threepence per set of six different designs.

A hospital of 200 beds, known as the "Allied Forces Base Hospital," under the charge of Major Ernest Miles, F.R.C.S., Surgeon to the Cancer Hospital, has been fully equipped and is ready to start for any locality on the Continent which the military authorities may deem advisable.

The number of wounded British soldiers back from the front up to Tuesday morning last is stated as follows:—500 in the Royal Herbert Hospital at Woolwich, 316 in the London Hospital, 100 at Plymouth, and 140 at Cheltenham. The number of British wounded in the legs and feet, and, with the exception of some at Woolwich, there are few serious cases.

NOTICES TO CORRESPONDENTS, &c.

Correspondents requiring a reply in this column are particularly requested to make use of a Distinctive Signature or Initial, and to avoid the practice of signing themselves "Reader," "Subscriber," "Old Subscriber," etc. Much confusion will be spared by attention to this rule.

SUBSCRIPTIONS.

Subscriptions may commence at any date, but the two volumes each year begin on January 1st and July 1st respectively. Terms per annum, 25s; post free at home or abroad.
Appointments.

FLEMING, G. M., M.D., M.R.C.P.E., Medical Superintendent to the Blue Cross Hospital, Canada, For South Africa, The Record Publishing Co., Cape Town, Mesers. Geo. Small Fob South necessarily skin the authenticated in re-open and Manchester have full the Sherburn City Herefordshire The Foreign F.R.C.S.Edin. Dr. the insertion Quarter 13 so-called it to Hospital, to the Annals of the Medicine, to the hospitals of the late Surgeon, London, E. R. T. New York 18 of the Royal College of Physicians, London, M.D. Lond., B.M., F.R.C.S., R.C.S., R.C.S., L.R.C.P., R.C.S., E. B. and R.C.S., for a daughter of John Edele. The University of Sheffield—Department of Pathology—Junior Demonstrator in Pathology, Salaries £200 per annum, with board, apartments, and laundry. Applications to W. A. W. Price, F.C.S., Secretary.

BIRTHS.

CON—On August 25th, at Bromee Place, Norfolk, the wife of Ivo Geake Cobb, M.D., of 10 Seymour Street, Portman Square, of a daughter.

BEATTY—On August 27th, at Craigirr, Banffshire, the wife of Samuel Beatty, M.B. and C.M.Edin., of a son.

BROWNLOW—On August 27th, at Ambleside, in the County of Westmorland, the wife of William M. Brownlow, R.S., of a son.

CHRISTIE—On August 25th, to Dr. and Mrs. Brian Crichton, 59 Park Lane, Croydon—son.

EARLE—On August 26th, at 33 Clevendon Mansions, Highgate Road, N.W., the wife of John Grundy, M.B., of Middlesex Hospital, of a son (John Esmon Grundy).

GEORGE—On August 27th, at 17 Upper Wimpole Street, W., the wife of Cecil Graham, F.R.C.S., of a son.

LAWYALL—On August 23rd, at 38 Linthorpe Road, Middlesborough, Hugh, the wife of Major F. W. Lawall, R.A.M.C., of a son.

MATHER—On August 24th, at the Medical Officer's House, H.M. Hospital, Whitehall, London, the wife of Thomas Mather, M.R.C.S., L.R.C.P., for a daughter.

RAINEY—On August 25th, at Wakefield House, Crompton Street, Eastbourne, the wife of E. Holmes Rainey, F.R.C.S., of a daughter.

WATERFIELD—On August 27th, at Strathie House Beccles, to the wife of E. Noel Waterfield, F.R.C.S., Sudan Medical Service—Wilson—On August 28th, at 66, Holland Park Avenue, W., the wife of J. Horne Wilson, M.D., of a son.

Marriages.

HARBISON—HULK—On August 26th, at Harwich, very quietly to the war, Staff Surgeon William Rhodes Harbison, Royal Navy, to Irene Woodworth, only daughter of Mr. R. M. and Mrs. M. R., of Bury St. Edmunds, Suffolk, £180 per annum, with apartments, and board. Applications to the Secretary, Hulme Dispensary, Dale Street, Stretford Road, Manchester.

MELLADREW—RAIN—On the 24th inst., at Christ Church, Mayfair, Henry Frederick Lawatson Meldrew, late Surgeon Lt.-Col., Royal Horse Guards, to Elizabeth Mackenzie Rain, a daughter of the late Rev. William Rain, D.D., Stowe-Smyth for the 15th August, at Hommony Abbey, New Forest, Douglas N. Smith-Smith, B.A., M.C.(Canb.), M.R.C.S., L.R.C.P., only son of Newton Smith-Smith and the late Mr. and Mrs. Smith, of a daughter, to Hetty Mary, only daughter of Robert Gilman and Miss. Lilian, of Hythe, Southampton (formerly of Sunapur, Assam, India).

SCHMANN—BROOKS—On August 27th, at St. Mary's Church, Twyford, in the county of Berkshire, to the daughter of Sir Walter and Miss. Homerville of London, Canon, of a daughter, to Mr. and Mrs. John W. Hamilton, of London, M.R.C.S., L.R.C.P., of Erchifield, Henley-on-Thames, to Lena Mary, only daughter of the late Dr. Brancky and Mrs. Brancky of Henley.

TRENT—MACKEZIE—On August 25th, at the United Free Church, Torquay, to the daughter of Mr. and Mrs. Thomson of London, to Henrietta Mary, of the Indian Medical Service, to Isabel Blanché, eldest daughter of the Rev. D. F. Mackenzie, B.D., Tain.

Deaths.

BAIN—On August 24th, 1914, at Strathtiber, Harrogate, Leslie Cortis, younger son of Dr. and Mrs. Bain, aged 18 years.

HAMILTON—On August 27th, at his residence, Maghera Burry, Portrush, Robert Hamilton, Esq., F.R.C.S., late of Liver- pool, aged 87.

HENDERSON—On August 27th, at Impendle, Natal, South Africa, Dorothy Winifred Feather, only daughter of Dr. William Warner Henson, and second daughter of the late C. M. Major, of South Africa, aged 25 years.

HELZ—On August 25th, at his residence, St. Domingo, Beach Road, Hove, Charles Alexander Hill, M.R.C.S., L.R.C.P., of 13, Upper Street, Liverpool, aged 47.


WEIR—On August 31st, at 15, Espanade, Waterloo, Dr. Arthur Weir, Physician to the Late Dr. Shakespeare, Liverpool, aged 59 years.


HULME DISPENSARY.

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WANTED A HOUSE SURGEON duly registered and fully qualified. Salary £180 per annum. Annual increase to £200 with accommodations, with testimonials, at once to Honorary Medical Secretary.
NOTES AND COMMENTS.

The first great battle has resulted in a casualty list of between 5,000 and 6,000 British troops. This loss occurred in the course of continuous fighting for four days or more, during which our force appears to have retreated gradually and in good order over a distance of thirty miles or upwards. Details of the conflict are necessarily meagre at this stage of the proceedings, but one need not turn to newspaper accounts to realise that an enormous stress must have been thrown upon the Army Medical Service in dealing with large numbers of wounded men amid the confusion of a retreating army in continuous action. It is gratifying to note that within a few days many slightly wounded men were landed safely in England. Accounts have come of others who travelled long railway journeys with little or no food, and found difficulty in securing sea transport on reaching the French seaboard. The matter was very properly brought forward in the House of Commons, and was answered by Mr. H. J. Tennant on behalf of the Government. He stated that elaborate arrangements had been made for the rapid transport of wounded soldiers, and suggested that any difficulties that may have arisen were due to the soldiers having gone to ports other than those officially prepared for them. At the same time his attitude was more or less resentful of criticism—an official position that calls for some little comment.

The Duty of a Medical Journal.

The duty of a medical journal is clearly to point out any defects that are due to lack of foresight or bad administration. To do otherwise would be to foster that fool's paradise in which the War Office of former days was wont to pass its days. As a matter of fact the present system shows an almost incredible advance in efficiency since the Boer War, in which we were engaged a few brief years ago. The Army Medical Service, in point of fact, has shared to the utmost the general advance towards scientific and businesslike efficiency that has transformed the military service of the United Kingdom. The conditions of warfare have undergone a great alteration. The size of the modern army has been multiplied five-fold to seven-fold, or even more—a fact that has a weighty medical significance. Long range weapons and high explosives—not to mention the advent of aerial warfare—have modified to a great extent the nature of the injuries sustained. Then again, so far as the medical service is concerned, the personal risk to stretcher-bearers, and to surgeons and nurses at or near the fighting lines, is probably far greater than that to which they were exposed under former conditions. At long range it is obviously difficult or impossible to avoid hos-
NOTES AND COMMENTS.

Sept. 9, 1914.

The Medical Press.

The foregoing paragraph anticipating heavy losses was written on Wednesday, September 2nd. On the following day appeared a detailed official first list of casualties, among British officers. The number killed was 35, wounded, 52, and missing; and the list appears to be incomplete. It seems, further, not unlikely, considering the deadly nature of the conflict, that the "killed" will in the end be considerably augmented. Reports as to German barbarity in the field have been so continuous, so detailed, and given on such responsible authority that officers, however cautious, are not likely to avoid the conclusion that the enemy kill—in other words, murder—many of the wounded. If that be so the probability of a large proportion of the "missing" being really dead is correspondingly increased. The fact has an important bearing upon the losses reported in the Royal Army Medical Corps and Army Medical Service Corps of the Allies. Although there were 76 killed, one was wounded and thirteen missing. In other words, a fourth of the total came from the medical branch. To some extent this disproportionate loss may be accounted for by the fact that as our troops fell back R.A.M.C. officers were left behind in charge of wounded men under the protection of the Red Cross. This list, it must be remembered, refers simply to the first part of the great battle begun at Mons on August 23rd, and gives no indication of the more or less continuous fighting that has taken place in the stubborn falling back of the Allies upon Paris before the overwhelming forces of the German Army.


The ruthless way in which the Germans are carrying on the war is testified to by many War Correspondents. In all wars a certain amount of barbarity must be expected, but in the present instance so many accounts have come from responsible quarters of the killing of the wounded, of the massacre of non-combatants, including women and children, of reckless firing, sack, pillage, and wanton cruelty that it is impossible to doubt its existence. Apart from the evidence of the witnesses, there is the silent testimony of devastated villages and towns burnt and depopulated. The destruction of the university town of Louvain, the Oxford of Belgium, with the loss of its priceless treasures of art, its ancient records, its magnificent library, and its splendid buildings fastens for all time an stain upon the Kaiser Wilhelm the Second. With regard to this deplorable event, the University of Ireland has adopted and placed on record the following resolution:—"The Senate of the National University of Ireland desires to offer to the illustrious University of Louvain its deep sympathy in the calamity which has befallen her, and to place on record a protest against any act so disastrous to the progress of mankind." It is to be hoped that this spirited protest will secure world-wide sympathy and approval. Now that the "Call to Arms" is resounding through the length and breadth of the land, the question of the physical fitness of candidates for the ranks looms large among others of equal importance. It is astonishing how many persons who believe themselves to be sound in wind and limb present, after due medical examination, some physical defect which, if not serious enough actually to debar them from enlisting, may prove a material drawback in the testing time of real warfare. Hence the strictness with which the medical examiner performs his duties. It is a mistaken kindness and an unwise patriotism that would pass a man with bad dentition or whose hearing is defective, though the man-in-the-street, in his eagerness to come forward, may think otherwise. Several of the dental schools and dental departments of the medical schools, as well as private dentists, have agreed to render free conservative treatment to recruits whose poor dentition has been the cause of their rejection. It permits of the assembling of a series of dental treatment all well and good, but under the pressure of existing circumstances it may be allowable to relax the usual strictness regarding this part of the examination, greater attention being paid, meanwhile, to the candidate's sense of sight and hearing. A sound heart and a keen eye plus good health and fair muscular development will ceteris paribus more than atone for a slight dental shortcoming. The marvellous response of the nation to Lord Kitchener's appeal for soldiers has thrown a light on our national character. Recruits have flocked literally in tens of thousands to the various stations. In London complaints have been made of the delay in medical examination, due to the paucity of medical men appointed to that special duty. With every appreciation of the sudden stress thrown upon the Army Medical Department and the marvellous competence they have shown in their organisation on a war footing it may nevertheless be permitted to make a few comments upon this quite understandable and minor defect. The cause of the trouble being a lack of medical officers, why should not sufficient numbers thrown upon the Army Medical Department?
by experience to discharge the responsible duty of the medical examination of recruits. As a matter of fact the War Office could get a hundred medical men offhand in London alone, many of them qualified by hospital and military experience for the work, and capable of the precise application of any standard fixed by the War Office. Many asylums, which had been taken for the work, would be spared the many hours and many days of weary waiting and consequent discouragement to which they are at present subjected. It is clear that all avoidable obstacles should be as far as possible removed from the path of the men who are so nobly responding to the call of their country, and it is with this point in view that these remarks are offered for Lord Kitchener's consideration. As a matter of fact a fee of half-a-crown is payable for each examination, and it is of course impossible to think that there is any objection on the part of the War Office to pay civilians.

The full results of the war upon the profession will not be fully realised for some time to come. For years past it has been customary to bewail the redundancy of medical men—and without doubt there was a good deal of truth in the general belief. Now there is likely to be a shortage for several years to come, and this will probably lead to an increase in the number of students. There seems to be a tendency to better remuneration of medical services in more than one direction. The National Insurance Act has affected an enormous improvement in the income to be derived from practice amongst the poorer classes. Not only is the panel doctor able to command, sooner or later, a fair and sometimes a large income from insurance practice, but payment is moreover guaranteed by the State. Then again, thanks to the efforts of the medical profession, the remuneration of many public appointments has been maintained at a fair standard. It is not unlikely that the rates of pay in the Government services may be raised before long and that after the present war there will be a permanent increase in the staffs of the army and navy medical service.

The war has already absorbed a large proportion of what may be termed the floating section of the medical profession—that is to say, those of its members who are not engaged in private medical practice or in one of the public services. Many newly qualified men are resident in hospitals, where they gain a valuable insight into professional work. Others of various ages act as assistants or do locum tenens work. Naturally many of this class have joined the army as surgeons on the comparatively liberal terms offered for service during the war—namely, twenty-four shillings a day, with allowances, and a grant at the end of the term of service. In addition not a few practitioners have thrown up their work and gone to the front. A large number of hospital surgeons have followed their example, with the result of a serious dislocation of medical practice throughout the Kingdom. Before the war there was a shortage of medical men, and has now been seriously aggravated. Many asylums, poor law infirmaries and voluntary institutions are at their wits' end to find resident medical officers to carry out their routine work.

Brighter Financial Prospects.

The German Drugs.

It is evident that a good deal of inconvenience may be caused by the stoppage of supply of various synthetic and other drugs derived from German sources. In some instances the drugs are manufactured entirely in England, and if their use be discontinued by medical men their action will tend to throw a number of their own countrymen out of employment. In other cases, the nature of a trading name of Teutonic aspect is apt to give rise to an entirely mistaken conclusion. As an example may be taken the Hoffman-La Roche Company who have written us to say that although they have works in Baden yet their head office and laboratory are in Basle, Switzerland. This firm announces that it has large stock in England, and will have no difficulty in fulfilling orders now or at any future period. This point suggests another fact that medical men in the United Kingdom will do well to consider before finally deciding to delete drugs of near or remote German origin. The point is that many English firms hold large quantities of such remedies and it is again our countrymen who will suffer if they are left unsold. The best plan will probably be for our medical men to go on prescribing whatever drugs may be in their judgment most suitable for their patients, regardless of the country from which they have come. It would be little more logical, to put a ban upon German music, or to resolve in future to disregard all scientific research work: "Made in Germany."

PERSONAL.

The King and Queen went to King Edward VII's Hospital for Officers in Grosvenor Gardens to visit wounded officers who have arrived from the front.

Dr. Frances Ivens will deliver the Inaugural Address at the London School of Medicine for Women in October next.

Sir Victor Horsley, F.R.S., will deliver the William Mitchell Bankes Lecture in the University of Liverpool on October 9th.

Professor Arthur Keith, M.D., F.R.S., will deliver an address at the opening of the winter session of the Medical School of the University of Leeds.

Dr. C. Hubert Bond, Emeritus Lecturer in Psychiatry, will deliver an address upon the occasion of the opening of the winter session at the Middlesex Hospital.

Surgeon-General Sir Anthony Dickson Home, V.C., K.C.B., M.D., aged 87, of 7 Palace Gardens Terrace, W., a Crimean and Indian Mutiny veteran, successively Principal Medical Officer in Ashanti, in Cyprus, and in India, left estate of the gross value of £24,907.

Major F. S. Irvine, R.A.M.C., whose name appears among the "Missing" in the recent battle at Mons, took part in the famous siege of Ladysmith, and was also in the action of Spion Kop, Vaal River, and Heights, as well as in subsequent actions in the Orange River Colony.

Note.—A Clinical Lecture by a well-known teacher appears in each number of this Journal. The lecture for next week will be by E. Arthur Dorrel, F.R.C.S. Eng., Assistant Surgeon Royal Eye Hospital. Assistant Ophthalmic Surgeon, Prince of Wales's Hospital, etc., etc. Subject : "Lachrymal Obstruction."
EDUCATIONAL SUMMARY FOR 1914-15.

INTRODUCTORY REMARKS.

With the advent of each October and the opening of the winter session of the medical schools, it is the custom of the leading medical journals to issue a special students’ number dealing with matters of current and potential interest to those about to join the ranks of our great and learned profession. The following remarks have been drawn up with that end in view, and are offered in a spirit of full sympathy with the aspirations that should inspire the will and determination of all students who have chosen a career in medicine.

The necessity of a wide culture is registered in the scope of the preliminary examination. For those who aspire to its highest honours it is necessary to possess a knowledge of many things outside medicine, and above all to acquire an intimate acquaintance with men and manners. Happily, this does not mean that the aspirant must needs have a University training, for some of the men whose names are household words in the profession have not enjoyed that advantage, while others have started from the lower steps of the social ladder. The prizes of the profession, in fact, are open to all, assuming, of course, that they are able to obtain an adequate preliminary education and the funds necessary to meet the expenses of qualification. Of late years the tendency has been to include in the preliminary examination subjects that would be of direct use to the student in his later career in the schools. It would be difficult to imagine a better training for a young man than that required in mastering the elements, say, of botany, zoology, and chemistry. At the outset of our remarks it has seemed natural to dwell upon the intellectual side of the career of medicine, for in that will be found a solace for the trials and difficulties that must be faced in that as in all other walks of life. From the monetary point of view it is open to any man of ordinary gifts and application to secure a competency, although he may have at first to go through a more or less extended period of years spent in the weary task of waiting for practice.

It has been our duty year after year to warn those entering or about to enter the medical profession that they must not, as a rule, expect to make a fortune. There are prizes not only for consultants and specialists, but also for general practitioners, but undeterred success and competency must be the lot of the majority in all branches of practice. During the past twelve months, however, as pointed out in our opening columns, the financial conditions of practice have considerably improved. A vast amount of work amongst the poorer classes that prior to the National Insurance Act was performed either gratuitously or at contemptibly low rates, is now paid for handsomely by the State. At the same time the general rate of friendly society and Poor Law appointments has been generally advanced, thanks to the self-protective efforts of the profession itself. National insurance has had an effect upon the hospitals, the full extent of which it is not yet possible to estimate. The total number of patients in voluntary hospitals has diminished, and their income has in not a few instances also decreased. The working of the Act has placed the members of the honorary hospital staffs in an anomalous position. By attending to insurance patients without fee they are doing service for which the State has contracted to pay. There can be little doubt that sooner or later this unsatisfactory state of affairs must be readjusted. The Chancellor of the Exchequer cannot, and it may be readily believed, does not wish to throw any part of the responsibility of insurance medical work upon voluntary charity. Hospital surgeons, physicians and specialists, again, have undertaken to give their services to poor persons subject to certain charitable regulations, but their agreement certainly does not cover attendance upon insurance patients. In the case of the small hospitals, the hardship inflicted under the Act is great, inasmuch as they find themselves depleted in patients and in funds, with no compensatory prospects at the hands of the State that has dealt them so staggering a blow. Treating the situation more generally, it seems fairly evident that national insurance constitutes a considerable advance towards the institution of a system of a State medical service. Another step in a similar direction will be the enrolling of the voluntary hospitals in the national insurance organisation. This consummation, however, is not likely to be attained in any near future. The student who intends to devote himself to those higher branches of medical practice in which a hospital becomes a necessity would be well advised to keep a careful eye on the conditions of such posts, whether in general or in special hospitals.

There are other fields of civilian practice to open to the qualified practitioner.

Such, for instance, is the school medical service and the greatly increased and partly specialised Poor-law medical service. In any case, a State appointment of the kind, however irksome and tedious, must rank immeasurably higher than the open dispensary practice with its degrading circumstances. It is indeed deplorable to find a member of a learned and honourable profession offering physic and advice for sixpence, or even threepence a consultation. In the course of time, however, we may hope that the conditions of this kind of undesirable medical practice is the outcome may be removed, and that there will be no need for any qualified man to adopt such discreditable methods.

From the first day that he commences his medical studies the student will do well to keep steadily in view the necessity for keeping abreast of new ideas. The present age is one of thinkers, and it is filled with fresh ideas in all branches of intellectual activity with an exuberance that has never been equalled at any previous period of human history. Above all is this true in medicine. The student of a generation ago finds himself surrounded with a host of new methods, remedies and appliances, the very jargon of which demands for its interpretation the brains of a general specialist. Today the private practitioner must have a knowledge of vaccines, of many laboratory methods of diagnosis, and of a long list of technical processes, or, at any rate, of their principles and their practical application, as, for instance, the culture of the Wassermann test for syphilis and the treatment of that malady by Ehrlich’s famous “606.”

In all classes of practice the need of the pathologist is everywhere more apparent. So great, indeed, has become the necessity that we were lately informed on
good authority that a famous German physician had a full clinical examination made of each patient before the latter entered his disease and the immediately made him, The student, being in mind, will do well to pay careful attention to the acquirement of a working knowledge of the main methods of the clinical and pathological laboratory. At the same time, it cannot be too strongly impressed upon him that it is necessary to cultivate the habit of close bedside observation of his patient. It is impossible to replace by the text and the microscope that carefully trained faculty which an aptitude in clinical science, the presence of which not infrequently determines the success or failure of the medical man in his professional career. It should be remembered that the conditions of actual practice clinical is the only place where the student meets well-appointed hospital. In dealing with private patients the practitioner is thrown upon his own resources, and may have to meet serious casualties and emergencies with the slenderest of surgical and medical resources. An extreme instance of the kind is when a medical man is called upon to treat a foreigner in extremis unprovided with a stethoscope or any other professional appliances, and unable to communicate directly or indirectly by the aid of friends the patient or his friends. Under such circumstances the diagnostic faculties of the medical observer are put to a cruel test. A medical man's fortune sometimes is when a medical man is called by the police to an unconscious patient. An error in the diagnosis of alcoholism or other narcotic poisoning, fractured base of skull, concussion, diabetic coma, apoplexy, and so on may destroy the patient's chance reputation, whilst others are seeking to attain that enviable notoriety, and while some men may be attracted by the spirit of adventure to cast in their lot with the new and struggling, others will prefer the security and prosperity of an established practice. This number of The Medical Press and Circular is to present impartially the claims and attractions of all schools, and if parents and their wards study its pages carefully they will, we feel sure, be convinced that there are none that have not their own special charms. The outlay on actual necessary educational expenses does not differ materially in different places, the higher cost of certain centres being chiefly due to the greater cost of living. It is obvious that in London, for instance, the outlay on actual necessary educational expenses must be considerably more than in many smaller and less favourite towns. While, on the contrary, a student living in his parents' home in London will not be so much expense to them if he goes to a distant University as if he takes up a single room at the Northern University. But, other things being equal, it is important for the average student to choose that school at which he is most likely in after years to obtain a resident post.

CHOICE OF A QUALIFICATION.

One day, in the not very distant future, we hope, the choice of what qualification to study for will not present so many difficulties as it does today. The student will be faced with the haphazard way in which British institutions and customs grow up, there have come into being a number of rival interests, both pecuniary and scholastic, which it is difficult to break down, with the result that students are faced with all sorts of qualifications, according to their own taste almost every conceivable alphabetical combination to their names.

It may be laid down in general terms that the shortest and least picturesque of these designations will generally be sought after, the student being under the impression that the expenditure of time that it will save in signing certificates, and in the greatest ease by which it will be understood of the people. Happily, or unhappily, a qualification is less the handicap of the career, as a rule, but small relation to success in practice, and practitioners of light and leading will be found to have laid the foundations of their success on a more solid basis than that of academic triumph.

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CHOICE OF A SCHOOL.

Many things are concerned in the choice of a school. Tradition, family influence, proximity, means, and acquaintance with other students or members of the staff all come into play, and there are few who are not affected by them. The would-be student, however, has to the whole matter a not to mention the qualifications himself and his selection unhampered by other consideration that that of merit, has the choice of nearly twenty centres in which to follow his best. There is a natural tendency for a man to look to his immediate vicinity for the maturing of his genius, and in these days, when Universities are cropping up with bewildering frequency, most students will probably find one within fifty or sixty miles of their homes. As the medical curriculum is a long one, and not necessarily by the official Medical Council, there is not much variation in that of the individual schools, and a good all-round education can be relied on in practically every one. On the one hand, some have teachers of established ability and reputation, whilst others are seeking to obtain that enviable notoriety, and while some men may be attracted by the spirit of adventure to cast in their lot with the new and struggling, others will prefer the security and prosperity of an established practice. This number of The Medical Press and Circular is to present impartially the claims and attractions of all schools, and if parents and their wards study its pages carefully they will, we feel sure, be convinced that there are none that have not their own special charms. The outlay on actual necessary educational expenses does not differ materially in different places, the higher cost of certain centres being chiefly due to the greater cost of living. It is obvious that in London, for instance, the outlay on actual necessary educational expenses must be considerably more than in many smaller and less favourite towns. While, on the contrary, a student living in his parents' home in London will not be so much expense to them if he goes to a distant University as if he takes up a single room at the Northern University. But, other things being equal, it is important for the average student to choose that school at which he is most likely in after years to obtain a resident post.

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THE ENGLISH UNIVERSITIES.

The English Universities, including Wales, are seven in number—viz., Oxford, Cambridge, Durham, Manchester, London, Sheffield, Birmingham, and the University of Wales. The choice of a University is usually determined by social, geographical, and financial considerations. Students whose parents are able and willing to spend the necessary sum will do well to select one of the ancient Universities, since their degrees confer upon their holders a status not accorded by the public to the degrees of more modern institutions. To those less favoured by wealth but blessed by intelligence, the London University offers ample scope, and its degrees are recognised as the outward and visible sign of high professional attainment. A capable and industrious student, however, may equally well lay the foundations of success in one of the newer Universities.

UNIVERSITY OF OXFORD.

There are two degrees in Medicine, B.M. and D.M., two in Surgery, B.C. and M.Ch., and two diplomas, Public Health and Ophthalmology.

Graduates in Arts (B.A. or M.A.) are alone eligible, except for the Diploma Examinations. To obtain the B.M., B.C., M.D., or M.Ch., candidates must have passed 1. Preliminary Mechanics and Physics, Chemistry, Animal Morphology, and Botany. 2. Professional. (a) First Examination: (1) Organic Chemistry, (2) Human Anatomy. (b) Second Examination: (1) Midwifery, (2) Pathology, (3) Forensic Medicine with Hygiene and (4) Materia Medica with Pharmacy.

The First Examination for B.M. and B.C. may be passed as soon as the Preliminary Scientific Examination is completed. The subjects may be presented separately or in any combination in any order, provided Anatomy and Physiology be passed together.

The Second Examination may be passed after the completion of the first, but Pathology and Hygiene may be taken before or with the remaining subjects. Before admission candidates must present certificates of attendance on a laboratory course in Practical Pathology and Bacteriology and of having acted post-mortem clerk for three months, surgical dresser for six months, and clinical clerk for six months. Also they must produce certificates of instruction in Infectious and Mental Diseases, and of attendance on the curriculum of the course on Vaccination and the administration of Anaesthetics. Also in respect of the First Examination candidates must present certificates showing that they have dissected a sufficient number of human and animal corpses and attended courses of laboratory instruction in Practical Histology and Physical Physiology.

The degree of D.M. is granted to Bachelors of Medicine of the University provided they have entered their thirtieth term and have composed on some medical subject a dissertation which is approved by the professors in the Faculty of Medicine and examiners whose subject is dealt with. A book published within two years of the candidate's application for the examination for the degree may be substituted for a dissertation. The degree of M.Ch. is granted to Bachelors of Surgery of the University who have entered their twelfth term.

Diploma in Ophthalmology. — There is an examination once in each year in the Theory and Practice of Ophthalmology for the purpose of granting certificates of proficiency therein, styled Diplomas in Ophthalmology. A candidate must have entered two years at the University, and is eligible to the examination conducted by the Board of the Faculty of Medicine, which has power to make regulations as to the subjects of the examination, the time at which the examination is held, and the conditions of admission. No candidate is eligible to the examination for the diploma who has not passed at Oxford a course of study in Ophthalmology approved by the Board of the Faculty of Medicine, and extended over a period of at least two years.

Travelling Fellowship, Scholarship, and Prize. — The Radcliffe Travelling Fellowship is awarded annually after an examination held in February. It is tenable for three years and is of the annual value of £200. Application should be made to the Radcliffe Examiners, Radcliffe Library, University Museum. A Rolleston Memorial Prize of £50 is offered to a candidate who has been two years to members of the Universities of Oxford and Cambridge of not more than ten years' standing and who have passed all the Exams. for the degree of B.M. or B.A. for an original research in some Biological science. The Radcliffe Prize, founded by University College (1907), is of the value of £50 and is awarded biennially for research in some branch of medical science. The Theodore Williams Scholarships of the value of £50 each are awarded to students in the subjects of Anatomy, Physiology and Pathology.

Detailed information may be obtained from the University Calendar.

UNIVERSITY OF CAMBRIDGE.

At the University of Cambridge five years of medical study are required for the M.B. and B.C. degrees. The candidate must have resided nine terms (three years) in the University, and have passed the previous examination in classics and mathematics. There are three examinations: The first in (1) chemistry, (2) physics, and (3) biology; the second in (1) human anatomy and physiology, and (2) elementary pharmacology including pharmaceutical chemistry and the elements of general pathology; and the third in (1) surgery and midwifery, and (2) principles and practice of medicine. The first examination is divided into three parts, and the second and third examinations each into two parts, which can be taken separately. Subsequently to the third examination an Act has to be kept containing the outline of the thesis followed by an oral examination on the subject of the thesis. As the subjects for the examination for the degree in surgery are included in the third examination for the M.B. degree, candidates are admitted to the degree of Bachelor of Surgery after passing the third examination for Bachelor of Medicine.

The M.D. degree may be taken three years after the M.B. An Act must be kept, including the presentation of an original thesis, with oral examinations and an essay to be written extemore. There is also the degree of Master of Surgery, for which the candidate, having already passed for B.C. or being M.A. has otherwise qualified in surgery, has to pursue extra study in surgery, and has a special examination or submit a thesis showing that he has acquired that science in the art or art of surgery. The yearly expenditure of a student who keeps his terms by a residence in a college is from £150 to £200 a year. This, however, may include all payment made to the University, and he also has to meet living costs, clothing, officer money, travelling expenses, &c. Non-collegiate students have to pay the University fees only, which are not large. They lodge and board in the town; their expenses, therefore, are largely in their own hands. Various scholarships, prizes and medals are open to medical students.

The University grants a diploma in public health without the necessity of residence, the examination being in so much of State Medicine as is comprised in the first year of the officers of public health and public health practitioners. The University requires the candidate to present to the Society in their applications to the Secretary of the Annual Report of the Medical Officer of Health.

These examinations are held in Cambridge the first week in April and October. Candidates, whose names must be on the "Medical Register" of the United Kingdom, and not be members of the University, may send in their applications to the Secretary of the State Medical Officer of Health. In the examination the candidate is required to answer as many questions as are on the examination paper under certain conditions as to previous study and experience. Successful candidates receive a University Diploma.

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An abstract of all Regulations may be obtained upon sending a stamped directed envelope to the Assistant Registrar, Cambridge. Full information is contained in the University Calendar. The Students' Handbook to Cambridge may also be consulted.

**UNIVERSITY OF LONDON.**

The University of London became in 1909 a teaching as well as an examining body. The medical degrees awarded are those of M.D., M.S., and M.B., B.S., the two latter being granted together as one degree. The medical degrees are granted to both internal and external students, the former being students of the constituent schools and colleges of the University.

**The Matriculation Examination.**—Students, before being admitted to the University, must either (1) have passed the Matriculation or the School Examination, or (2) have been exempted therefrom under Statute 110 of the University which recognises certain other examinations in lieu thereof. The examinations for matriculation take place three times in each year—in September, in January, and in June. Fee £2. If he withdraws before the last day of entry it will be returned to him. It he fails to present himself he will be allowed to enter for a subsequent Matriculation, within eight months, on payment of £1. If he retires after the commencement of the examination, or fails to pass it, the fee (£2 or £1), will not be returned on re-entry.

**Provincial Examinations for Matriculation.**—These are appointed by the Senate upon the application of any city, institution, or college desiring to be named as a local centre, and are carried on simultaneously with those held at the place of examination. They give notice upon their forms of entry to the Principal of the University, who will then make all necessary arrangements.

**Faculty of Medicine.**—The Faculty of Medicine grants the joint degrees of M.B., B.S. (Bachelors of Medicine and Surgery), and the higher degrees of M.D. (Doctor of Medicine) and M.S. (Mansfield Surgery). The curriculum for the medical degrees covers five and a half years, except in the case of students who have passed the Preliminary Scientific Examinations or the First Examination for Medical Degrees, before July, 1910, and the examinations respectively known as the Preliminary Scientific, the Intermediate, and the Final Examination in Medicine are now respectively entitled the First, Second, and Third Examinations for Medical Degrees.

The First Examination for Medical Degrees (inorganic Chemistry, Physics, and General Biology) takes place twice in each year, commencing on the Monday 4th of December and on the second Monday in January. The fee is £2 5s. for each subject.

The Second Examination for Medical Degrees (Part I): Organic Chemistry.—This examination takes place twice in each year. No candidate will be admitted to this examination within six months of having passed the First Examination. The examination consists of practical and mental examination. It consists of a paper and practical work, and may include oral questions in Organic Chemistry, which is "to be treated in an elementary manner, and with special regard to its applications in physiology, pharmacology, and pathology." The examination for Medical Degrees (Part II.) takes place twice in every year, commencing in the first Monday in March, and on the first Monday in July. The subjects of examination are Human Anatomy and Embryology, Physiology, and Pharmacology, including Pharmacy and Materia Medica. No candidate shall be admitted to the examination unless he has passed the First Examination for Medical Degrees at least 18 months previously, and has passed Part I. of the Second Examination for Medical Degrees. The fee for each entry to the whole examination is £8. For re-examination in one subject it is £4.

**M.B., B.S. Examination.**—The M.B., B.S. examination takes place twice in each year, commencing on the second Monday in October and on the first Monday in May. Candidates will be examined in Medicine (including Therapeutics and Mental Diseases), Pathology, Forensic Medicine and Hygiene, Surgery, Midwifery, and Diseases of Women. The subject of examination will be two groups, namely: (1) Medicine, Pathology, Forensic Medicine, and Hygiene; and (2) Surgery, Midwifery, and Diseases of Women. These groups may be taken either separately or together. The fee is £5 10s. for entry to the whole examination, or £2 10s. each for examination or re-examination in either group. There will be no separate examination held for Honours, but the list of candidates who have passed will be published in two parts, namely, an Honours list and a Final Examination list.

**Doctor of Medicine.**—The examination for this degree takes place twice in each year, commencing on the first Monday in December and on the first Monday in July. Candidates must have taken the M.B., B.S. degrees not less than two years previously, but for those who have taken the M.B., B.S. degrees with honours, or have done certain original work, this period of delay may be reduced to one year. Candidates who have obtained their M.B. degrees after 1st January, 1914, will not be allowed to hold the degree of B.S. before seeking the doctorate. They may present themselves for examination in one of the following branches, namely: (1) Medicine; (2) Pathology; (3) Mental Diseases; (4) Midwifery; (5) Diseases of Women; (6) State Medicine; and (7) Tropical Medicine. Any candidate for the degree of M.D. may transmit to the Registrar, not less than two months before the commencement of the examination, a thesis or published work embodying the result of his own independent research in the branch of Medicine in which he is a candidate, and if the thesis be approved by the examiners, the candidate may be exempted from the written examination in that subject. The fee is £20, and for re-examination £10.

**Matter in Surgery.**—The examination takes place twice in each year, and commences on the first Mondays in December and July. Candidates must produce certificates of having taken the degree of M.B., B.S. not less than two years previously (with certain exceptions, as in the examination for the M.D.) and of having subsequently held for at least six months a resident or non-resident Surgical Hospital appointment. The fee is £20, and for re-examination £10.

Full details can be obtained free on application to the Academic Registrar, University of London, South Kensington, S.W. Students should apply direct to the University for details in cases of special examination arrangements. University Entrance Exhibitions—University College.

**FACULTY OF MEDICAL SCIENCES.**—The Faculty of Medical Sciences comprises Physics, Chemistry, Botany and Zoology, also the Departments of Anatomy, Physiology, and Pharmacology (the latter of the Royal College of Physicians), and the Departments of Hygiene and Public Health, and of Pathological Chemistry (Post-graduate Study). Full Preliminary and Intermediate Courses of study are provided for students desiring to commence a course of study leading to the University of London and as well as for students seeking the qualifications of other Universities and licensing bodies. University and King's Colleges have been constituted University Centres for the teaching of degree courses in Medical Sciences. A student can enter the College directly, and at the end of the first and second courses select the Medical School and Hospital.
Chemistry; the Schäfer Prize in Physiology, value £50, for proficiency in Physiology; the Sharpie Physiological Scholarship, value £150, for Research in Physiology.

**Competition Fees.—**Course for the first Medical Examination, 26 guineas; course for the second Medical Examination, 21 guineas; course for the Final Examination of the Conjoint Board, 48 guineas.

The London Medical Schools recognised by the University with the title of "University of London," are:—University College, King's College, St. Bartholomew's Hospital Medical School, St. Thomas's Hospital Medical School, Westminster Hospital Medical School, Guy's Hospital Medical School, London Hospital Medical School, Charing Cross Hospital Medical School, St. Mary's Hospital Medical School, Royal Army Medical College, London School of Tropical Medicine, School of Medicine for Women, and the Lister Institute of Preventive Medicine.

**University of London—King's College, London, Strand.—**In the medical division of the Faculty of Science students are prepared for their first examination (Chemistry, Physics, Biology), and for their second examination (Anatomy, Physiology, and Pharmacology), by the University Professors attached to King's College, London, and their assistants. At present four medical schools, viz., those attached to King's College Hospital, Westminster Hospital, George's Hospital, and Charing Cross Hospital, the teaching in which is restricted to the subjects of the final examinations, send their students to King's College for the purpose of tuition in the above-mentioned preliminary and intermediate studies. Numerous Scholarships and Prizes are offered.

**Department of Public Health and Bacteriology.**—This department of King's College is served on in large laboratories in the Charing Cross Hospital Medical School, Whitechapel Road.

Full particulars as to courses of study, laboratory accommodation, hours, fees, etc., can be obtained on application to the Dean, Professor Halliburton, or the Secretary, Mr. Walter Smith, at the College.

Two diplomas, one Licence and six degrees in Medicine and hygiene are conferred—viz., the degrees of Bachelor of Medicine, Bachelor of Surgery, Master of Surgery, Doctor in Medicine, Bachelor of hygiene, and Doctor of hygiene. Diploma in public health and diploma in the speciality of the degree in Dental Surgery. These degrees, diplomas and licence are open to both men and women.

For the degree of Bachelor of Medicine (M.B.), there are four professional examinations. The subjects are: 1st year: elementary anatomy, biology, chemistry, and physics. For the second: Anatomy and physiology. For the third: Materia medica and pharmacy, pathology and elementary bacteriology, medical jurisprudence and public health; and for the fourth: Medicine, clinical medicine and medical therapeutics, surgery, and clinical surgery, pathology, internal diseases of women and children, and clinical gynaecology.

It is required that one of the five years of professional education shall be spent in attendance at the University College of Medicine and the Royal Infirmary, Newcastle-upon-Tyne. First and second year students (dating from registration) are not required to comply with the regulations regarding attendance on hospital practice. Candidates who have passed the First and Second Examinations of the University will be exempt from the First and Second Examinations of the Conjoint Board.

For the degree of Bachelor of Surgery (B.S.) every candidate must have passed the examination for the degree of Bachelor of Medicine at the University of Durham, and must have attended one course of lectures on operative surgery, and one course on regional anatomy. Candidates will be required to perform operations on the dead body, and to give proof of practical knowledge of the use of surgical instruments and apparatus.

For the degree of Master of Surgery (M.S.) candidates must not be less than twenty-four years of age, and must satisfy the University as to their knowledge of Greek or German. In case they shall not have passed the degree of Bachelor of Surgery, they must present themselves at Durham for examination in it at one of the ordinary examinations held for this purpose before they can proceed to the higher degree of M.S. They must also have obtained the degree of Bachelor of Surgery of the University of Durham, and must have been engaged for at least two years subsequently to the date of acquisition of the degree of Bachelor of Surgery in attendance on the practice of a recognised hospital or in the naval or military services, or in medical or surgical practice.

For the degree of Doctor of Medicine (M.D.) candidates must not be less than twenty-four years of age, and must satisfy the University as to their knowledge of Greek or German. In case they shall not have passed in either of these subjects at the Matriculation Examination for the M.B. degree, they must present themselves at Durham for examination in it at one of the ordinary examinations held for this purpose before they can proceed to the higher degree of M.D. They must also have obtained the degree of Bachelor of Medicine of the University of Durham, and must have been engaged for at least two years subsequently to the date of acquisition of the degree of Bachelor of Medicine, in attendance on the practice of a recognised hospital or in the naval or military services, or in medical or surgical practice.

Candidates for any of the above degrees must give at least twenty-eight days' notice to the Secretary of the College of Medicine, Newcastle-on-Tyne. In the case of the M.B. (Essay) Examination, candidates must send in their essays six weeks before the date of the examination.

The New Royal Victoria Infirmary, containing 400 beds, was opened by the late King, in July, 1905. In the Dispensary the ordinary annuity of £3,000 is provided for the study of the various special subjects, in addition to the ordinary clinical work. Practical midwifery can be studied at the Newcastle Maternity Hospital. Opportunities for practical study are afforded by the Dispensary City of Diseases Hospital, Eye Infirmary, and at the Northumberland County Lunatic Asylum.

There are various appointments open to students, whilst the scholarships available are numerous and of considerable value.

**Fees.—**(a) A composition ticket for lectures at the college may be obtained—1. By payment of 80 guineas on entrance. 2. By payment of 50 guineas at the commencement of the first sessional year and 40 guineas at the commencement of the second sessional year. By three annual instalments of 40, 33, and 22 guineas, respectively, at the commencement of the sessional year. A Composition Ticket for the course of lectures and practical work of the first two years of the curriculum may be obtained by the payment of 42 guineas on entrance. (b) Single courses of lectures, five guineas. (c) Fees for attendance on hospital practice: For three months' medical and hospital practice, six guineas; for six months, ten guineas; one year, fifteen guineas; composition fee for one payment, thirty-five guineas; or by two instalments—viz., first year, twenty guineas; second year, eighteen guineas. In addition, two guineas yearly up to three years must be paid to the Committee of the Royal Infirmary. (d) Composition fee for entering the course for the Licence in Dental Surgery, 40 guineas. Composition fee for dental practical work at Newcastle Dental Hospital, 41 guineas.

A Licence in Dental Surgery has been instituted. Before proceeding to the First Examination, each candidate must furnish evidence, (1) of having attained the age of 21 years, (2) of having undergone a three-years' pupillage in mechanical dentistry with a registered dentist, and (3) of having been engaged in pro-
fessional study for at least four years subsequent to registration as a dental student. He must also sign such declaration as the University may binding himself not to advertise for professional purposes. Examinations are held concurrently with the medical examinations, and the fees payable by candidates amount to £1.5.

The Senate of the University has decided to grant a Diploma in Psychiatry, full particulars of which may be obtained from the College Calendar. Further particulars will be given on application to Prof. H. D. Fray, Secretary of the University of Durham College of Medicine, Newcastle-on-Tyne.

UNIVERSITY OF MANCHESTER.

Candidates for degrees in medicine and surgery (M.B., Ch.B., M.D., Ch.M.) must attend classes in the University during at least two years, and for three years must pursue a course of medical study at any college on professional course. They are required to have passed the Matriculation Examination, or other examination as may from time to time be recognised for this purpose by the University. The Matriculation Examination is held in July and in September before admission to the Degrees of Bachelor of Medicine and Surgery candidates are required to send in the usual certificate of age and study as at the other Universities. All candidates for these Degrees must have been present at the University in attendance upon the classes of the University, but the Senate has power of recognising attendance at another University as part of the attendance qualifying for these degrees.

Degrees of Bachelor of Medicine and Bachelor of Surgery. — The candidate must have passed either the Matriculation Examination of the University or one of the following examinations, which will be accepted in lieu thereof for the present:—(a) The previous examination of the University of Cambridge; (b) Responses of the University of Oxford; (c) The matriculation examination of any recognised University; (d) The leaving certificate (higher) of the Oxford and Cambridge Boards; (e) The Oxford or Cambridge senior local examination.

Matriculation Examinations are held in July and September each year.

Degrees of Doctor of Medicine and Master of Surgery. — At the end of one year from the date of having passed the Final M.B., Ch.B. Examination, the candidate will be eligible to present himself for the examination for the Degree of Master of Surgery or both, the regulations for which may be had upon application to the Dean. The University also grants a Degree and a Diploma in Public Health, and provides adequate instructions for the same.

The Compendium of Fees for University Courses for Degrees of M.B., Ch.B. is £85; the Composition Fee for Clinical Instruction at the General and Queen’s Hospitals is £42; total cost for the full M.B., Ch.B. Curriculum including Examination Fees is £152 28 6d. School of Dentistry. — The University grants the Degrees of Bachelor and Master of Dental Surgery (B.D.S. and M.D.S.), and a Diploma in Dental Surgery (L.D.S.). The whole of the instruction for which may be taken out in the University, with which is associated the Birmingham Dental Hospital. The instruction of Dental Students is carried out under the direction of the University Dental Clinical Board. The fees for L.D.S. Diploma courses are as follows: — Composition Fee (University Courses), £50; Clinical Fees for Dental and General Hospital instruction, £3 10s. total cost for L.D.S. including Examination Fees, £14 15s.6d.*

The total cost for Degree of B.D.S. and Diploma of L.D.S. is £149 1s.

THE GENERAL AND QUEEN’S HOSPITALS. — The practical studies of these hospitals are amalgamated for the purpose of clinical instruction under the direction of the University Clinical Board, by whom all schedules will be signed and all examinations conducted. The hospitals have a total of upwards of 500 beds. 8,000 in-

* Does not include fee for Mechanical Pulpage, which is 5s. 10d.
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The University also grants a Diploma in Dental Surgery (L.D.S.) and Degrees in Dental Surgery (B.D.S. and M.D.S.). The courses of systematic instruction are given in the University buildings, five minutes walk from the Dental Hospital.

Communications should be addressed to the Dean, Professor B. M. A., M.A., M.D., C.M. the University, Liverpool.

LIVERPOOL SCHOOL OF TROPICAL MEDICINE.

The Diploma of Tropical Medicine, University of Liverpool.—The school is affiliated with the University of Liverpool and the Royal Southern Hospital, Liverpool, and the Royal Infirmary, Liverpool. The instruction given occupies eleven hours a day for five days a week during thirteen weeks. Each Course consists of (1) a systematic series of lectures on tropical medicine and sanitation delivered by the Professor of Tropical Medicine at the University; (2) of additional lectures on special African and other diseases delivered at the University; (3) of systematic lectures and demonstrations on tropical pathology, parasitology and bacteriology by the Walter Myers Professor, at the University; (4) of similar instruction on medical entomology by the Professor of Entomology at the University; (5) of clinical lectures and demonstrations delivered at the Royal Southern Hospital, Liverpool, under the charge of the Tropical Ward, Professor of Tropical Medicine, and the Walter Myers Professor; and of lectures or demonstrations by assistant teachers.

In December and April an examination is held by the University, and Fellowships of £100 a year are open to students of the school, amongst others. Accommodation for Research work is to be had, both at the University laboratory of the school, and at its Research Laboratories at Runcorn (sixteen miles distant from Liverpool).

Since it was instituted 15 years ago the school has employed 45 different investigators paid out of its funds, and has despatched to the tropics 33 scientific expeditions, many of the workers having been taken from among its students. The work done by them has been published in twenty-one special memoirs with many plates and figures, besides text books and numerous articles in the scientific press. From the beginning of 1907, however, the Memoirs have been succeeded by the Annals of Tropical Medicine and to be given to the Dean of the Faculty, with the exception of two, the Honorary Committee, and open to outside contributors, (Apply to the Secretary, 28, Exchange Buildings, Liverpool).

The Mary Kingsley Medal is awarded by the School for distinguished work in connection with tropical medicine, and has been given to Colonel Erace, Professor Koch, Dr. Laveran, Sir Patrick Manson, Lord Lister, Professor Looss, Professor Danielswusky, Dr. Charles Finlay, Mr. W. M. Haffkeine, Professor Goigl, Colonel Gorgas, Professor Theobald Smith, and H. A. Lister, and others.

UNIVERSITY OF BRISTOL.

The University grants the conjoint degrees in the Faculty of Medicine of M.B., Ch.B., the degree of M.D., Ch.M., B.D.S., and M.D.S.; also diplomas in Dental Health (D.P.H.) and in Dental Surgery (L.D.S.).

The conjoint Degrees of M.R.C., Ch.B.—The curriculum occupies five years and a half. The University
lectures and laboratory courses are attended in the large and well equipped new wing of the University. Hospital practice and Clinical instruction are provided in the affiliated hospitals, which together afford upwards of six hundred beds and a very large external medical department. Three years at least must be spent in the University, and two of them subsequently to passing the second examination.

Mechanical Dentistry may be studied in the new and well equipped University Laboratory under the supervision of a skilled mechanic. In this laboratory the mechanics of the mechanical work for the Royal Infirmary and the Bristol General Hospital is done by the pupils. Lectures and ordinary laboratory work are attended in the University, the Metallurgical laboratory is in the Chemical department, and has been specially fitted for the purpose.

Diploma in Dental Surgery, L.D.S.—The curricular occupies four years, and runs on very similar lines to that for the B.D.S. It is, however, necessary to pass the matriculation examination, and some subjects required for the degree are omitted. Candidates for either the B.D.S. or L.D.S. must be registered Dental students.

Diploma in Public Health.—The necessary laboratory work is done in the University in the Chemical and Pathological departments. The remainder of the curriculum is taken under the Medical Officers of the various local authorities, and the Assistant Medical Officer of the Port of Bristol (Demonstrator in Public Health).

Three courses are primarily designed for the University degrees and diploma, namely equal attention is paid and equal facilities are offered to students who enter for the degrees of other Universities, such as the University of London, and for the Diplomas of the various examination books. Women are admitted to all degrees and diplomas, and to the courses of study necessary for them. The University Hall of Residence is situated at Clifton, within a short distance of the University. Particulars of residence may be obtained from Miss M. C. Staveley, M.A., at the University.

Inclusive Fees.—For the M.B., Ch.B. curriculum, 150 guineas; for the B.D.S. curriculum (including mechanical practice), 150 guineas; for the B.D.S. curriculum (excluding mechanical practice), 115 guineas; for the L.D.S. curriculum (including mechanical practice), 168 guineas; for the L.D.S. curriculum (excluding mechanical practice), 115 guineas; for the D.P.H., 150 guineas. Arrangements can be made for paying these fees by instalments.

Appointments (Undergraduate).—Clinical Clerkships, Dresserships, etc., can be obtained at the Royal Infirmary and the Bristol General Hospital. In these institutions the Dressers reside in rotation free of charge.

Appointments (Post-Graduate).—At the Bristol Royal Infirmary: Two House Surgeons, £100 each per annum; two House Physicians, £100; Resident Obstetric and Ophthalmic House Surgeon, £150; Throat, Nose, and Ear House Surgeon, £75; Casualty Officers, £75; Demonstrator of Surgery, £100 per annum. Casualty Officers are appointed for twelve months, except that of Casualty Officer, which is for six months. From the resident officers a Senior Resident Office is appointed at an additional salary of £30. At the Hospital General Hospital: Senior House Surgeon, £150 per annum; Casualty House Surgeon, £100 per annum if another resident appointment has previously held; two House Physicians, £50; House Surgeons but clinical practice only, £100 per annum. All these appointments are for six months, except that of Dental House Surgeon, which is for two years.

The Winter Session opens on September 30th.

UNIVERSITY OF LEEDS.

The school of medicine attached to this University was founded in 1831 as the Leeds Medical School. The building, erected on a site contiguous to the infirmary, contains one of the finest dissecting-rooms in the United Kingdom, extensive laboratories for physiology and pathology with the most recent improvements in fittings and apparatus, ample lecture-room accommodation, a medical library, and appreciable facilities for pathology and anatomy. Professors and lecturers are attached, and the clinical teaching is given by the physicians and surgeons attached to the Leeds General Infirmary in the United Kingdom, having 540 beds, with a staff of physicians and surgeons of considerable eminence. Ophthalmic demonstrations and demonstrations of skin diseases are given in the infirmary by surgeons in each department, while also are clinical demonstrations in various wards, and an extern maternity charity is attached, at which the necessary attendance at labourers can be taken. Besides the infirmary there is a large hospital for infectious diseases, a hospital for women and children, and a maternity hospital, all of which are open to students of the school.

Scholarships, Prizes, etc.—(1) An entrance scholarship of £150 is offered annually by the University. Degrees and Diploma in Dental Surgery are obtainable at this University, being Bachelor of Dental Surgery (B.Ch.D.), and Master of Dental Surgery (M.Ch.D.). Candidates for the Bachelor of Dental Surgery are required to have passed the Matriculation Examination, to have pursued thereafter approved courses of study for not less than five academic years, two of such years at least having been passed in the University in the Schools of Dentistry and Pharmacy, and to have completed such period of pupilage or hospital attendance, or both, as may be prescribed by the Regulations of the University. No candidate shall be admitted to the degree who has not spent the age of twenty-one years on the day of graduation.

Candidates for the diploma in Dental Surgery are required to present certificates showing that they have attained the age of twenty-one years, that they have attended courses of instruction approved by the University, extending over not less than four years, two of which must be spent in the University, and that they have completed a pupilage of three years, two of such years at least having been taken before the First Professional examination. Candidates must be enrolled in one of the following subjects of the following examinations: A preliminary examination in Anatomy; A preliminary examination in Pathology; A preliminary examination in Physiology; A preliminary examination in Surgery; A preliminary examination in Obstetrics; A preliminary examination in Ophthalmology; A preliminary examination in Dermatology; A preliminary examination in Orthopaedics; A preliminary examination in Clinical Medicine; A preliminary examination in Dental Surgery; A preliminary examination in Dental Practice; A preliminary examination in Dental Anatomy; A preliminary examination in Dental Physiology; A preliminary examination in Dental Pathology; A preliminary examination in Dental Hygiene; A preliminary examination in Dental Surgery; A preliminary examination in Dental Practice; A preliminary examination in Dental Anatomy; A preliminary examination in Dental Physiology; A preliminary examination in Dental Pathology; A preliminary examination in Dental Hygiene.

A Diploma in Public Health (D.P.H.) is granted after examination under the usual regulations, also a Diploma in Psychological Medicine.

UNIVERSITY OF SHEFFIELD.

By the Charter granted in 1905, this University is permitted to grant degrees in medicine. All its courses and all its degrees are open, without restriction, to both sexes. The new buildings of the University, opened by the late Majesty King Edward VII, are attached to the west of the adjoining Weston Park. The medical department occupies the entire north wing of the University quadrangle, and is within easy
reach of the various hospitals, with which it is connected for clinical purposes.

The hospital services—The Royal Infirmary contains 350 beds, and the Royal Hospital 191 beds. The practices of the two institutions are amalgamated for the purpose of clinical instruction, giving a total of over 420 beds for the treatment of medical, surgical, and obstetrical cases. The last year over 30,000 patients passed through the wards of the two institutions, while those attending as out-patients numbered over 35,000. The Jessop Hospital for Diseases of Women contains 300 beds, with about 1600 out-patients per annum, and about 900 out-patient cases attended. Special courses on tetanus are held at the City Fever Hospital, and at the London Fever Hospital, the medical attendants being provided by the University.

MEDICAL IVAIL.

The University and its Colleges in England and Wales was established by the University of London, and is a well-ordered hospital service, and is situated within five minutes' walk of the University College. Many students, especially from Wales and Monmouthshire, avail themselves of the opportunities thus afforded to pursue the earlier part of the medical curriculum near home, and are enabled to both men and women students over sixteen years of age. The courses of instruction given at Cardiff are recognised as qualifying for the examinations of the Universities, Royal colleges, and other licensing bodies of Great Britain and Ireland. Having spent at least three years in study at Cardiff, and having passed the examinations in these years, a student may proceed to London or elsewhere and complete his qualifying course for a University degree of for a college diploma.

Students preparing for the first and second examinations of the Joint Board for England, or for the corresponding examinations of the Joint Board for Scotland, may compound for their classes by paying a single composition fee of £40, at the beginning of their first and second years respectively. Those preparing for the First and the Second Examinations for Medical Degrees of the University of London may compound for their three years' instruction at Cardiff by paying a single composition fee of £50, or by paying £20, £25, and £25 at the beginning of their first, second, and third years respectively.

In 1859 a department of Public Health was established, and lecturers in bacteriology and in public health and hygiene were appointed. Medical men preparing for the diploma in Public Health and Hygiene of the University of Wales can attend complete courses of lectures and laboratory instruction in this department. These courses are also recognised by the University of Cambridge, by the Royal Colleges of Physicians and Surgeons, by Victoria University, and by other examining boards.

In the case of medical students, attendance on the class of hygiene and public health, is conducted by the University of London and Cambridge, and by the Joint Examining Board of England.

Courses of lectures to midwives, adapted to the requirements of the Central Midwives Board, under the Midwives Acts, are commenced in October, June, and April. The lectures are suitable both for pupil midwives and practising midwives, as well as for nurses who desire to enter for the examination for certification under the Act.

SCHOLARSHIPS AND FREE STUDENTORIES.—The attention of students intending to matriculate is drawn to the entrance scholarships and Free Studentships which are offered at the close of competition in April, most of which may be held by medical students. Full particulars of the examination for these may be obtained from the Registrar, or from the Dean of the Medical Faculty.

THE ENGLISH COLLEGES.

The medical corporations in England are the Royal College of Physicians of London, the Royal College of Surgeons of England, and the Royal College of Physicians and Surgeons of London. The two Royal Colleges now co-operate to hold a series of examinations, on passing which the candidate receives the diploma of Licentiate of the Royal College of Physicians (L.R.C.P.), and Member of the Royal College of Surgeons (M.R.C.S.). The Society of Apothecaries grants a complete diploma (L.S.A.) in medicine, surgery, and midwifery.
CONJOINT EXAMINING BOARD IN ENGLAND.

Candidates for the above licences are required to complete five years of practical experience in medical schools and hospitals, after passing the preliminary examination, of which six months may be spent at an institution recognised by the Board, to comply with the following regulations and to pass the examination forthwith or at the end of a period of not less than three months from the date of rejection, and will be required, before being admitted to re-examination, to produce a certificate, in regard to medicine and surgery, of having attended the medical and surgical practice, or the medical or surgical practice, as the case may be, during the period of his reference; and in regard to midwifery and diseases peculiar to women a certificate of having received the subsequent instruction, not less than three months' instruction in the subject of the recognised teacher. A candidate who possesses a registrable qualification is admissible to re-examination without producing additional certificates.

REGULATIONS FOR COLONIAL, INDIAN, AND FOREIGN CANDIDATES, AND UNIVERSITY CANDIDATES.

Persons holding a Colonial, Indian, or a foreign qualification enabling them to practise medicine in the country of origin, and conferred after a course of study and examinations equivalent to those required by the Medical Council of the United Kingdom, are admitted to the second and third (final) examinations forthwith.

Members of a University in the United Kingdom and Graduates of Medicine of certain recognised Colonial or Foreign Universities are, under certain conditions, and subject to the regulations stated below, admissible two years after passing at the University in the subjects included in the first and second examinations of the Board.

ROYAL COLLEGE OF PHYSICIANS OF LONDON.

MEMBERS.—The membership of the College is granted after examination to persons above the age of 25 years who do not engage in trade, do not dispense medicine, and do not practise in partnership. This diploma is only granted to persons already registered, or who have passed the final examination for the licence.

Medical graduates of a recognised University are admitted to a pass examination, but others must have passed the examinations required for the licence of the College. The examination, which is held in January, April, July, and October, is partly written and partly oral. It is directed to medicine, and is conducted by the president and censors, Candidates under 40, unless they have obtained a degree in arts in a British University, are examined in Latin, and either Greek, French, or German. Candidates under 40 who have not obtained a degree in arts in a British University, and the examination in medicine may in their case be modified under conditions to be ascertained by application to the Registrar. The fee for the membership is £42, but if the candidate is a licentiate £15 is deducted. In either case £60 has to be paid before examination.

ROYAL COLLEGE OF SURGONS OF ENGLAND.

MEMBERSHIP.—The candidates are now subject to the regulations of the Joint Board.

FELLOWSHIP.—The Fellowship of the College of Surgeons is granted after examination to persons above the age of 25 years, who have been engaged in professional studies for six years. There are two examinations—the first in anatomy and physiology, which may be passed after the age of 25; the second chiefly directed to surgery, which may be passed after six years of professional study. The second examination may be passed before attaining the age of 25, but the diploma is not granted until that age is reached. Candidates for fellowship examination, after the age of 25, who have passed the final examination of the Joint Board in England, and have been admitted members of the College before they can be admitted thereto, except in the case of graduates in medicine and surgery of recognised Universities who have not been so in England. The diploma of Fellow is granted to successful women candidates subject to the provisions of the Medical Act, 1858, and of the Bye-Laws of the College.

FEE.—For re-examination in medicine, £6 12s. For re-examination in surgery, including pathology, surgical anatomy, and the use of surgical appliances, £5 5s. Part III.—For re-examination in medicine and surgery, £4 12s.; in medicine and public health, £2 12s.; for examination in practical pharmacy (if taken at this examination), £2 2s. Part II.—For re-examination in surgery,
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The fee is £21. (The examination fees to the extent of £17 17s. 6d. count as part of the total fee.) Further information can be obtained on application to the Secretary of the Examining Board in England, Examination Hall, Queen Square, Bloomsbury, London, W.C.

SOCIETY OF APOTHECARIES OF LONDON.

PRIMARY EXAMINATION.—This examination consists of two parts: Part I.—Elementary biology, Chemistry, and Physics. This part contains such questions as are of a general nature, and an attempt is made to cover the subjects of the second year of a course of study in those universities which have a preliminary examination in chemistry and physics. A synopsis indicating the range of the subjects may be obtained on application. Part II.—Anatomy and Physiology and Histology. The examination is held in January, April, July, and October.

The final examination is held monthly, except the month of September, and is divided into Sections 1 and 2.

Section 1 consists of three parts:

Part I. includes: Principles and Practice of Surgery, Surgical Pathology, and Surgical Anatomy, Operative Manipulations, Instruments and Appliances.

Part II. includes: (a) The Principles and Practice of Medicine, including Therapeutics, Pharmacology, Pathology, and Morbid Histology. (b) Forensic Medicine, Hygiene, Theory and Practice of Vaccination; and Mental Diseases.

Candidates passing either (a) or (b) will not be re-examined therein.

Part III. includes: Midwifery, Gynecology, and Diseases of New-born Children, Obstetric Instruments and Appliances. Candidates may enter for Parts I., II., and III., together or separately.

Section 1 of the Final Examination, or any part thereof, cannot be passed before the expiration of 45 months from the date of commencement of medical study.

Section 2.—This section consists of two parts:

Part I.—Clinical Surgery.

Part II.—Clinical Medicine and Medical Anatomy. Section 2 cannot be passed before the expiration of the fifth year.

Fees.—Primary examination, £5 5s.; final examination, £10 10s.; total fee, £21.

Further information, with particulars as to the course of study and of the certificates required, can be obtained from the Secretary to the Court of Examiners, Apothecaries' Hall, E.C.

The licence to act as a diplomate in Medicine, Surgery, and Midwifery, and to qualify the holder to compete for medical appointments in the Army, Navy, and Indian Services, also for Poor-law, Civil, and Colonial appointments.

The gold medal is worth £50, and a silver medal, £25. A medal for the best paper in the preliminary examination is given for laboratory instruction for D.P.H., £15 per annum. For Primary F.R.C.S. Class, 10 guineas; for Final F.R.C.S. Class, 20 guineas. Full details will be supplied on application to the Dean.

CHAIRMANS CROSS HOSPITAL.—The School attached to this Hospital is situated in Central London, and contains new pathological and bacteriological laboratories, pharmacological, materia medica, and public health, laboratories, theatre. Clinical instruction is given in surgery, and obstetrics, and in the special departments, diseases of the skin, diseases of children, mental disorders, the throat, the eye, nose and ear, and in the orthopaedic, Röntgen and electrical departments.

The school arranges for a complete education in all departments, with special teachers for all preliminary and intermediate subjects.

By arrangement with the University of London, all students for the Primary and Intermediate portions of the course are eligible for any student to receive instruction at King's College Laboratories, situated within a few minutes' walk from the Hospital.

The entire teaching of the school is devoted to pathological, clinical and other subjects of final studies.

Appointments.—Ten house physicians and ten house surgeons are appointed annually. During the first six months of their appointment they act as house physicians and house surgeons, and receive a salary of £25 a year. During their second six months they become "senior" house physicians and house surgeons, and are provided with rooms by the hospital authorities, and receive a salary of £30 a year.

A second assistant anaesthetists are appointed, and receive salaries of £20 and £25 a year respectively. An external midwifery assistant receives a salary of £25 a year. Chief assistants and clinical assistants are also appointed in each of the Medical Surgical special departments.

SCHOOLS.—There are three Entrance scholarships in science, £75, £75, £150, tenable for one year, and an Entrance Scholarship in Arts, value £100, and the Jefferium exhibition, value £50; at the end of first year four junior scholarships of £50, £50, £25, £15, respectively; Treasurer's prize for practical anatomy; at end of second year Foster prize in practical anatomy; senior scholarship, value £50, for anatomy, physiology, and chemistry; Wix prize, Michens prize, for Senior Students, two Bracketen scholarships, £50, £15; |for medicine and surgery, £25; for report of cases; the Kirkes gold medal for clinical medicine, with scholarship of £50. Shuter scholarship of £50; Skyner prize of £15; Sir G. Burrows' prize of £10; Matthews Duncan prize, medal and scholarship of £50. The dentist Holdem Research Scholarship in Surgery, value £105; Lawrence Research scholarship and gold medal, value £115 for pathology.

Composition Fees.—(5) For students commencing their medical studies, one sum on entrance, 15 guineas; or by four instalments of 45 guineas each. (2) For students who have passed an examination in preliminary science, in one sum on entrance, 145 guineas; or by instalments. (5) For students who have finished two years of study but have not passed an examination completing their anatomical and physiological studies; if paid in one sum on entrance, 110 guineas; or by annual instalments. (4) For students who have completed three years of medical study but have not passed an examination completing their anatomical and physiological studies, in one sum, 80 guineas; or by annual instalments. The London School of Medicine and Surgery—20 guineas; for laboratory instruction for D.P.H., 15 guineas. For Primary F.R.C.S. Class, 10 guineas, for Final F.R.C.S. Class, 20 guineas. Further details will be supplied on application to the Dean.

The Schools in the Metropolis are the following, the scholarships, prizes, students' appointments, fees, &c., being set forth in connection with the schools and medical schools.

LONDON SCHOOLS.

The Schools of Medicine in the Metropolis are the following, the scholarships, prizes, students' appointments, fees, &c., being set forth in connection with the schools and medical schools.

St. Bartholomew's Hospital.—This hospital has 750 beds, and for many years past the school attached has been one of the number of medical schools in London. Laboratories have been specially equipped for the study of pathology, bacteriology, public health, chemistry, biology, physics, and chemical pathology, and two additional operation theatres, new casualty and out-patients' departments, eight special departments, quarters for the junior staff, a dining-hall and a common-room for students that have recently been built. Collegiate residence is permissible, subject to the ordinary rules.
**Payment**—The fees for the five years' curriculum may be paid either by composition fee, in one sum, on joining, and payment of the annual fees for the first year, or by a composition fee of £100 for each year, subject to the condition that the candidate shall obtain at the end of each year an average of 90 per cent.

**Appointments.**—Eight house surgeons, eight house physicians, sixteen out-patient officers, sixteen assis-
tant house surgeons. Twenty-six private residents, two ophthalmic house surgeons, twenty-one anaesthetists, and ninety-six dressers are selected annually from the students according to merit, and without payment. There are also a large number of junior appointments to the various departments of the practice being systematically employed for instruction.

**Scholarships.**—Open scholarships of £120, £100 and £50 in biology, chemistry and physics, classics, mathematics and modern languages, and two open scholarships of £150 and £75 in two of the following subjects—Anatomy, physiology, pharmacology, general pathology and organic chemistry. The following are the scholarships, prizes and medals open to students at the hospital: Junior prizes for general proficiency, £20; £15; £10; Hilton prize for King's; £10; Michael Harvey prize for anatomy, £5; Sands Cox scholarship for physiology, £15; Woolridge prize for physiology, £10; Beaney prize in pharmacology, £34; Golding-Bird prize in bacteriology, gold medal and £100; Treasurer's gold medal in clinical medicine; Treasurer's gold medal for service in teaching; Beaney studentship in materia medica (tenable for 3 years), annually £100; Gull scholarship in pathology (tenable for 3 or 5 years), annually £150. The King's College Hospital Medical School has also a series of scholarships of the value of £100, triennially; Oldham Prize in Ophthalmology, £30 annually.

**Fees.**—A new system for payment of composition fees has been instituted at this school. Particulars may be obtained on application to the Dean, Guy's Hospital, London Bridge, S.E.

**Universities of London—King's College, London, Strand.**—In the medical division of the Faculty of Science students are prepared for their first examination (Chemistry, Physics, Biology, and, for their second examination (Anatomy, Physiology, and Pharmacology) by the University Professors attached to King's College, London, and their assistants. At present four medical schools, viz., those attached to King's College Hospital, Westminster Hospital, St. George's Hospital, and Charing Cross Hospital, the teaching in which is restricted to the subjects of the final examinations, send their students to King's College for the purpose of tuition in the above-mentioned course of study, and pay for it.

Numerous Scholarships and Prizes are offered.

**Department of Public Health and Bacteriology.**—This department of King's College is carried on in large laboratories, part of which is the King's College Hospital Medical School Building, Chandos Street.

Full particulars as to courses of study, laboratory accommodation, hours, fees, etc., can be obtained on application to the Dean, Professor Watersin, or the Secretary, Mr. Walter Smith, at the College.
tutors, Sambrooke medical and surgical registrarships, tenable for two years each, £70 per annum. Residency in hospital appointments,—viz., casualty officer, senior and junior house physicians, physician, anæsthesist’s assistant and assistant house anæsthesists; house obstetrician; assistant clinical and dental laboratory assistant; and three anæsthesists.

F. R. C. S. Examinations.—Special classes are arranged for the final F. R. C. S. exam. Further particulars can be obtained post free from the Dean, Dr. H. Willoughby Lye, or the Secretary, Mr. Clifton Kelway, King’s College Medical School, Denmark Hill, S.E. 5.

Fees.—The fees payable by full students for the Course of Advanced Studies, whether for the University Degrees or for the Examinations of the Conjoint Examining Board, are: So guineas if paid in one sum; £25 guineas if paid in instalments, as follows: 10 guineas at entrance; first payment, 40 guineas on entering the hospital; 32 guineas at commencement of second year. These fees also include membership of the Hospital Clubs and Societies’ Union for three years. Completion fees have been arranged for the complete medical courses.

(i) University of London Course, including the Preliminary Scientific, Intermediate, and Final Course, Fee, £150 guineas.

(ii) Conjoint Examining Board Course, including the courses for the 1st, 2nd, and 3rd examinations, Fee, £150 guineas.

The London Hospital.—This hospital is the largest in Great Britain, containing, as it does, 922 beds. It has large wards and a large staff, for every special department in the domain of medicine; the scholarships and prizes are many and valuable.

Appointments.—The salaried appointments open to students are those of medical registrars three, surgical registrars two, junior anaesthetists two, out-patients, clinical assistants in the medical, surgical, ophthalmic, aural, light and skin, orthopedic, and electrical departments. There are also six resident house physicians and nine resident house surgeons, two accoucheurs, seven receiving-room officers, two emergency officers, and three pathological assistants. Also unpaid clinical assistants in the various special departments. In addition there are numerous house officers and clerks and dresserships in the various departments.

Scholarships and Prizes.—At Entrance: Price scholarships in science, £100; in anatomy and physiology, £52 10s.; entrance scholarship in science, £50; Epsom scholarship in science, £20; Buxton scholarships in arts, £31 10s. After Entrance: anatomy and physiology prize, £25; Lethby prizes, £25; prizes in clinical medicine, surgery and obstetrics, £20 each; Duckworth Nelson prize, £10; Hutchinson prize, £10; Sixth Medical Prize, £25; Anderson prizes, £50; dressers’ prizes, £50; practical anatomy prizes, £10; Douro Hoare prize, £25; Wynne Baxter prize, £50.

Special classes for the 1st and 2nd M.B., Lond., the 1st and final Fellowship, and other examinations are held. Those for the final and primary F. R. C. S. commence on September 2nd.

Fees for Full Course.—Entrance Fee 20 guineas; annual Fee 30 guineas.

Special entries can be made either for single courses of lectures or for hospital practice. The Students’ Hostel has recently been extended. Residential accommodation is obtainable at a very reasonable rate close by, or in the suburbs a few minutes’ distant by train.

A Dental School is attached to the Hospital and provides the Course of Instruction for the Dental Diploma examinations.

Full particulars can be obtained from the Dean, Professor William Wright, M.I., D.Sc., F.R.C.S.

St. Mary’s Hospital.—This Hospital is situated at

Fauldington, near the terminus of the Great Western Railway, contains 250 beds, of which 31, in the Clarence Wing, are devoted to treatment by Therapeutic Inoculation. An additional Operating Theatre has recently been opened in this wing. The Inoculation Department, instituted in 1906, has greatly expanded the scope and facilities of this wing.

The Department is under the personal supervision of Sir Almroth Wright, F.R.S.

In 1912 a new Casualty Department was opened, with increased accommodation.

The Athletic Ground is situated at Park Royal, Acton, within easy reach of the Medical School. This provides ample accommodation for the various athletic clubs, and possesses a good pavilion.

Appointments.—All clinical and surgical medical officers in the hospital are free to students of the Medical School, and the resident medical officers are chosen by competitive examination. Six house physicians, six house surgeons, four obstetric officers, and two resident medical officers to the inoculation wards are appointed in each year, and receive board and residence in the Hospital. Four casualty house surgeons, and two resident anaesthetists are appointed annually, the term of office being six months. They receive a salary at the rate of £100 per annum with board and residence.

Scholarships, &c.—One scholarship in natural science of the value of £100, open to any gentleman who has not completed a winter session of study at a medical school, and the scholarship shall be awarded to the student who attains the highest mark in the examination of the Unions, or the value of £150—under the same conditions. Two scholarships, each of 50 guineas, open to University Students. The scholarships will be awarded by examination on September 21st, 22nd, 23rd.

Fees.—The attendance of the full-time curricular studies of the hospital, practice and all lectures, demonstrations, and special tutorial classes, £140, paid in one sum on entering the school; or in instalments, £415. Payments may be made by annual fees, as an alternative to composition fees.

Students who have completed their examinations in anatomy and physiology at the Universities of Oxford, Cambridge, or other University, are admitted as perpetual pupils on payment of a fee of 50 guineas in one sum, or 75 guineas in two annual instalments.

Complete Curriculum.—The Medical School provides complete instruction for the various medical degrees and diplomas, including courses of preliminary scientific and intermediate subjects, which are recognized by the University of London as approved courses for formal credit. Students may join in October, January, or April.

The Middlesex Hospital.—The Hospital and Medical School are centrally situated, and within a few minutes’ walk of the principal tube and railway lines of the Metropolis.

The Hospital contains 440 beds, including special wards for cancer cases, maternity and gynaecological cases, and for diseases of the skin and eye. The cancer wing (containing 66 beds) and special investigation laboratories offer unrivalled opportunities for the student or medical officer, both in the biological and pathological aspects. In the electro-therapeutical department students obtain instruction in the treatment of lupus and cancer by the X-ray method.

The Hospital and Medical School are fully equipped for the theoretical and practical teaching of all the subjects of the medical curriculum, and for the Diplomas in Public Health. The Bland Sutton Institute of Pathology, just completed, is under the immediate direction of the Professor. It contains a new lecture theatre, large laboratories for teaching purposes and smaller rooms fully equipped for the carrying out of research work. Special classes are held to prepare students for the intermediate examinations at the Universities, and for the intermediate and final examinations for the F.R.C.S. (England) Diploma.

There is a residential college in the hospital for a limited number of students.

Hospital Appointments.—All appointments are
made without fee of any kind, and the following appointments are made annually:—Six house physicians, eight house surgeons, two obstetric and gynecological surgeons, two casualty surgeons, and two resident officers to the special departments. Non-resident clinical assistants are appointed to assist in the various out-patient and casualty departments.

Scholarships, Prizes, etc.—Three entrance scholarships, value £100, £50, and £25, and a University Scholarship, value £25 (for Oxford and Cambridge students), are awarded annually in September. A first-class pass at University entrance at the University of Epsom College, is awarded annually on the nomination of the headmaster. There are also two Broderip Scholarships, value £50 and £25 respectively; the John Murray Medal and Scholarship, value £25 (awarded every third year); the Freeman Scholarship, value £50; the hetley clinical prize, value £25; the Leopold Hudson prize, value 11 guineas; and the second year's exhibition, value 10 guineas. There are also numerous class prize examinations. In connection with the cancer investigation department, the following scholarships are awarded:—Richard Bucknill Scholarship, value £100; Salters’ Company Cancer Research Scholarship, value £100; and a Cancer Research Scholarship, value £50.

Fees.—The composition fee for the curriculum for the diplomas is £100. The fee for the introduction to the Royal College of Physic is £50; the fee for the degree of the University of London, 145 guineas; for those who have passed the first examination for the degree in the arts of those who have completed their anatomical and physiological studies, 70 guineas. The fee for dental students is 54 guineas. The fees may be paid by instalments.

The Amalgamated Students’ Club includes:—The Medical Section common room society, the Cricket and Football Clubs, etc. The Athletic Ground, which is eight acres in extent, is situated within easy access of the hospital—at Park Royal. A subscription to the Club is payable by all General and Dental Students.

The Winter Session 1914-15 opens on October 1st at 3 p.m. The Introductory Address will be delivered by Mr. Herbert Bond, M.B., D.S.O. after which the prizes will be presented by His Serene Highness Prince Alexander of Teck, G.C.B., G.C.V.O., D.S.O.

St. Thomas’ Hospital.—This Hospital, with medical school attached, is situated on the southern Embankment of the Thames, facing the Houses of Parliament. The medical college was constituted in 1824.

The school buildings, which are separated from the hospital by a quadrangle, comprise numerous theatres, laboratories, and class rooms, which are well adapted for the modern teaching of large bodies of students in all subjects of the medical curriculum. There is a large library and reading-room, and a very complete museum and gymnasium.

Appointments are open to all students. A resident assistant physician and a resident assistant surgeon are appointed annually at a salary of £150 and lodging. Four hospital registrars, two at an annual salary of £100 each, and two at £50 each, are appointed yearly. The tenure of these offices may be renewed. Ten house surgeons, exceeding two years, two resident house physicians, four casualty officers, two resident obstetric house physicians, and two ophthalmic house surgeons are appointed each month, eight out-patient officers, and clinical assistants in the special departments, two resident assistants are appointed annually at a salary of £200 per annum.

Scholarships, Prizes, etc.—Five entrance scholarships are offered for competition in July and September—viz., one of £150 and one of £60 in chemistry, physics, and biology at the commencement of the second year; one of £50 open to University students who have passed in anatomy and physiology, for a medical degree in any of the Universities of the United Kingdom, and who have not entered as students in any London Medical school, and two scholarships in arts giving free tuition for the first year of curriculum. Numerous scholarships, prizes, and medals are open to competition throughout the whole career of a student. There is a Fund established by the Salters’ Company for research in pharmacology, and the Louis Jenner research scholarship, £60, for pathological research.

Special courses of instruction for the First Professional Examinations, and for the Preliminary and Intermediate Medical, for the Oxford and Cambridge examinations, and for the Primary and Final F.R.C.S. are held throughout the year.

The prospects of the school may be obtained on application to Mr. G. Q. Roberts, Secretary of the Medical School.

 Fees.—A system for payment of composition fees is in operation. Full details may be obtained of the Secretary.

University of London, University College.—Faculties of Medical Sciences.—The Faculty of Medical Sciences comprises Physics, Chemistry, Botany and Zoology, also the Departments of Anatomy, Physiology, and Pharmacology (the Intermediate Medical Sciences) and the Departments of Hygiene and Public Health, and of Pathological Chemistry (post-graduate study). Full Preliminary and Intermediate Courses of study are provided for students desirous of obtaining the medical degrees and diplomas of the University, as well as for the students seeking the qualifications of other Universities and licensing bodies. University and King’s Colleges have been constituted University Centres for the teaching of the Medical Sciences. A student can transfer from one Centre to another. At the end of the first and second courses select the Medical School and Hospital.

Scholarships and Exhibitions.—Five annual University Entrance Exhibitions of £100 a year, six similar scholarships of £50 a year each in science subjects are annually awarded, and three Andrews Entrance Scholarships. The Bucknill Scholarship of 135 guineas and two Exhibitions of 55 guineas are awarded of open competitions each year, held in July. The Cliff Memorial Prize, value £15, is awarded for proficiency in Anatomy, Physiology, and Chemistry; the Schlier Prize in Physiology, value £18, for proficiency in Physiology; the Sharpie Physiological Scholarship, value about £150, for Research in Physiology.

Composition Fees.—Course for the first Medical Examination, 26 guineas; course for the second Medical Examination, 28 guineas; course for the first Examination of the Conjoint Board, 21 guineas; course for the second Examination of the Conjoint Board, 28 guineas.

The London Medical Schools recognised by the University of London in 1914-15 are—University College, King’s College, St. Bartholomew’s Hospital Medical School, St. Thomas’ Hospital Medical School, Westminster Hospital Medical School, Guy’s Hospital Medical School, Middlesex Hospital Medical School, Charing Cross Hospital Medical School, St. Mary’s Hospital Medical School, Royal Army Medical College, London School of Tropical Medicine, School of Medicine for Women, and the Lister Institute of Preventive Medicine.

University College Hospital and Medical School.—Entrance.—A student may enter the school as soon as he has passed the University of London Matriculation Examination, and is competent to take qualifying preliminary examinations. In this case he will pursue his preliminary and intermediate studies at University College, and his final medical studies at University College Hospital Medical School. The student who has completed his preliminary and intermediate medical studies elsewhere, may enter the University College Hospital Medical School for his final medical studies only. Qualitative medical men and others who can produce evidence of sufficient qualifications may be admitted as students in various departments of the University for purposes of research, or to hospital practice for certain definite periods.

University College Hospital now accommodates 205 in-patients, and possesses extensive out-patient and special departments.

Thirty-eight clinical appointments, eighteen of
which are resident, are filled by competition during the year, and are open to students at the hospital without extra fee.

The new medical school provides for lectures, demonstrations and practical work in all the final subjects of the medical curriculum. There are three lecture demonstration theatres for the teaching of morbid anatomy, bacteriology, and chemical pathology; also rooms equipped for the teaching of operative surgery and surgical anatomy, and two large lecture theatres.

The Medical Society, founded in 1826 for promoting the study of medical and surgical sciences among students for social intercourse, has rooms set apart for reading and conversation, and there is a large museum and squash rackets court with baths attached in the school buildings.

**Scholarships, etc.—** Entrance scholarship of £15 guineas, and two of 80 guineas each, the subjects being anatomy and physiology; the Graham scholarship in pathology, £200 per annum; the Atkinson-Morley surgical scholarship of £15 a year, tenable for three years; the Atkinson scholarship, value £15, tenable for two years; the Magrath clinical scholarship of £100 for reports on post-mortem examinations; the Regius scholarship for prosector in pathological anatomy, value £15; Euston prize, operating case, value £100, awarded for practical surgery; Fellowes gold and silver medals, the Edinburgh gold medal, Alexander Bruce gold medal, Tuke medal, £100, and other medals, as well as certificates of honour, are awarded after competitive examinations in particular branches of study.

**Composition Fees.**—The Preliminary Course at University College, 20 guineas; Intermediate Course at University College, 58 guineas; final M.B. Course at University College, 150 guineas; Medical School, 80 guineas if paid in one sum or 82 guineas paid in two instalments of 50 and 32 guineas.

**Westminster Hospital.**—This hospital is conveniently situated, facing the Abbey, and is readily accessible from all parts of the Metropolis. It contains 295 beds for general cases, and all the special departments. The school buildings are close by, which afford accommodation for 150 students. The class rooms, museum, laboratories, and lecture theatre are excellent samples of modern erection, attending ample scope for study.

**Appointments.**—Medical and surgical registrars, each £300 per annum; two house physicians, three house surgeons, one physitian, one assistant house surgeon, and a resident obstetric assistant. These officers, except the two first named, are all bound free of expense. Qualified students are assisted to be clinical assistants in the various departments.

**Scholarships, etc.**—(a) Winter Session.—The Guthrie scholarship, £50; subjects, Latin, mathematics, English, and either Greek, French or German. Two University scholarships, £50 each; subjects, anatomy and physiology. Natural science scholarship, £50; subjects, same as for Preliminary Science of University of London. Natural science scholarship, £50; subjects, chemistry and physics. (b) Summer Session.—Two University scholarships as for Winter Session. Special prizes to be awarded for unqualified men. Chadwick prize for Obstetric Medicine and Surgery, 20 guineas, for students of any year not exceeding fifth. Bird medal and prize, in Obstetric Medicine. £14, for students who have completed fourth with the highest marks in four, and are in the first half of the class. Sturges prize in Clinical Medicine, about £50, clinical cases at the prize side; £10, Abrahams prize in Clinical Pathology, 5 guineas. And class prizes in the various subjects.

**Fees.**—(a) The Annual Composition Fee is 25 guineas. This includes the subscriptions for membership of the Club's Library. (b) For lectures, £2 10s. per course for single courses the fees may be learned on application to the Dean. Fees for dental students, payable in one sum on entrance, 50 guineas, or in two instalments of £25 10s. each.

**London (Royal Free Hospital) School of Medicine.**

**Cine for Women.**—The school is situated in Hunter Street, and the Royal Free Hospital is in Gray's Inn Road, close by. Students are prepared for the London University examinations and for the examinations of other Universities. A course of study is also arranged for the work required by the Royal Colleges of England, the Conjoint Colleges of Scotland and the Society of Apothecaries of London. The Royal Free Hospital contains 105 beds available for clinical study; and in addition there is a large out-patient and casualty department and a maternity department with 11 beds. In addition to the ordinary systematic lectures at the school, clinical lectures are given at the hospital in Medicine, Surgery, Obstetrics, Ophthalmology, Otolaryngology, Pathology, Bacteriology, and Laryngology. Students hold clerkships and dresser- ships in each department.

**Appointments.**—House physicians, house surgeons, and a senior and junior resident obstetric assistant are appointed yearly. There are also non-resident appointments, including the anaesthetists and assistant obstetricians, assistant and clinical pathologists, medical and surgical registrars, curator of museum and clinical assistants.

**Fees.**—The fee for the University course and the course for the Royal Colleges of England is £150 in one sum, or £170 if paid in five instalments. The fee for the course for the Scotch Colleges or Society of Apothecaries of London is £140 in one sum, or £150 in four annual instalments. Particulars as to scholarships, etc., can be obtained from the Secretary and Warden, Miss L. M. Brooks, 1, Greek Street, Soho.

**London School of Tropical Medicine.**—The next session of the School commences on the 1st of October. The past year has been one of the most successful on record, and over 60 students attended the session ending in July. The course is arranged to equip men for the Cambridge Diploma in Tropical Medicine and Hygiene, the London Diploma in Diseases and Hygiene of the Tropics, as well as for the London University M.D. Special facilities are now afforded for advanced study, as in entomology, helminthology, protozoology and tropical sanitation and hygiene. Resident accommodation for students is available in the Hostel. The Wandsworth Scholarship of £150 and the Hon. Edward John Stanley Memorial Scholarship of £30 are awarded annually. The School provides three sessions each year.

**INTRA-ACADEMIC INSTITUTIONS.**

**The Royal Dental Hospital.**—The teaching and hospital offices (situated in the Institute Buildings in Leicester Square) are recognised by the various examining bodies. The new hospital and school, which was opened seven years ago, is complete in every detail with modern appliances. The clinic of the hospital is unrivalled, no fewer than 82 operations being performed in one year. The following scholarships and prizes are open to all full-term students:—Entrance scholarships, of the value of £50 and £52, both awarded in October. Subjects: Chemistry and Physics, Saunders scholarship, of the value of £50, awarded to the student obtaining the highest aggregate number of marks in a special examination of the subjects of the final examination in the B.D.S. course of the Royal School of Dental Surgery, of the value of £25, the subjects being Dental Mechanics and Metallurgy. There is also an Entrance Scholarship of £25 open to those who have studied "Dental Mechanics" under the tuition of Mr. G. R. Underwood. Research Scholarship, of the value of £50, awarded once in three years; the Alfred Woodhouse Scholarship of £50, and the Robert Woodhouse Prize of the value of £10, for practical dental students. Classes are held with various lecturers. Provision is made for teaching Dental Mechanics, as required by the Royal College of Surgeons, the pupils being under the guidance of the staff of dental surgeons assisted by specially nominated assistants. The School contains an excellent library and a well-arranged museum.

**Fees.**—For the two years' hospital practice and lectures as required by the Royal College of Surgeons.
of England, the fee is £5 5s. in one instalment, or £5 13s. in two yearly instalments. The fee for the complete curriculum—namely, two years' instruction in Dental Mechanics and two years' hospital practice and lectures, is £5 10s. per annum if paid in three instalments of 50 guineas each. It is paid in four instalments, viz., first year, 50 guineas, second year 50 guineas, third year 25 guineas, fourth year 25 guineas. For one year's medical lectures only, the fee is £20, or 50 guineas.

For one year's hospital practice, £21. For the courses in Chemistry and Physics for the Preliminary Science Examination, 10s. The necessary course of two years at a general hospital can be taken simultaneously with that at the Dental School. Any particulars can be obtained on application to the Dean.

NATIONAL DENTAL HOSPITAL (The Dental Department of University College Hospital).—Students are entered as students of University College Hospital, and, as such, attend the classes of chemistry, physics, anatomy and physiology at University College, a few minutes' walk from the Dental Department in Great Portland Street, where excellent teaching facilities and hospital practice are obtainable, special demonstrations being given in the Dental Hospital. There are also mechanical laboratory, bacteriological laboratory, X-Rays Department, museum, students' common room, a metallurgical laboratory, extraction and stopping rooms, lecture hall, regulations room, etc., all lighted by gas and gas and doubtless after the most approved requirements; in fact, this institution may be pronounced a model dental department of a general hospital and school. The winter session commences at the same time as at the medical school, on the first of October. The medical school holds special classes before each college examination. The prizes include two entrance exhibitions, value £40 and £20, and the Rymer prize of £5 5s., the examinations for which are held in May and October. The fee for four years' full curriculum, including lectures, is £75 10s. 0d.

For qualified men the two years' training in dental mechanics, required by the R.C.S. Curriculum, can be taken in the Mechanical Laboratory, and there is a "Compositon Fee" including all the dental subjects of the curriculum of £4 10s.

Medical students are admitted to the practice of the Dental Department in general hospitals to which no medical school is attached, but each contains over 100 beds. Detailed particulars will be supplied on application to the various secretaries.

PRINCE OF WALES'S GENERAL HOSPITAL, Tottenham.—This hospital contains medical and surgical wards and a ward for children, having 245 beds, with a very large out-patients department. It prides itself especially limited to post-graduates. There are special departments for gynaecological cases, diseases of the eye, ear, throat and nose, medical electricity and radiography, and skin diseases. It is authorised by the University of London to give certificates of post-graduate study for the M.D. and M.S. degrees.

GREAT NORTHERN CENTRAL HOSPITAL, Holloway Road, N.—This institution has been greatly enlarged, contains 185 beds, cases in various special departments are treated and there is an annual hospital study during the fifth year by the Joint Board. The Pathological Department has been extended and a Director of Clinical Pathology appointed. The practice of the hospital is open to practitioners and senior students, and clinical and pathological assistants are appointed in the wards and out-patient departments, as in the larger general hospitals.

BETHLEM ROYAL HOSPITAL.—In this Royal institution only cases of lunacy are received, and students intending to pursue this special branch have the best possible opportunities afforded here. The hospital contains 500 beds, and two resident house physicians who have recently obtained their diplomas to practise medicine and surgery are elected every six months and are provided with apartments, complete board, attendance, washing, and an honorarium of 25 guineas per quarter. The students of certain specified London medical schools receive clinical instruction in the wards of the hospital, and qualified practitioners may attend for a period of two mornings a week, and will receive an honorarium of 1 guinea for each lecture. Lectures are also given.

NATIONAL HOSPITAL FOR EPILEPSY AND OTHER DISEASES OF THE NERVOUS SYSTEM, Queen Square, W.—Contains, with its country branch, 200 beds and cots. It is recognised by the Conjoint Board, and all its beds are exclusively devoted to clinical work. Clinical clerks are appointed to the physicians for out-patients, and courses of lectures and clinical demonstrations are given each year.

WEST END HOSPITAL FOR DISEASES OF THE NERVOUS SYSTEM, Portland Place, Welbeck Street, W.—Graduates in medicine and senior students may attend demonstrations in the Out-patient Department. No fees are charged. The Savill Prize and Medal is awarded to the student who makes the best essay—examination and presents the best thesis after attending at least 25 demonstrations.

LONDON TEMPERANCE HOSPITAL.—This Institution is situated in the Hampstead Road, and contains 100 beds, and is conducted, as its name implies, on non-alcoholic principles. The hospital is a general hospital, and the medical and surgical practice is open to students and practitioners. Appointments (vacancies for which are advertised in the medical journals): Surgical and medical registrars, resident medical officer, and one assistant officer.

METROPOLITAN HOSPITAL, Kingsland, N.E.—This was until recently known as the Metropolitan Free Hospital, is situated in the north-eastern district of the Metropolis, and contains 253 beds, besides 18 beds at a convalescent home. It is a general hospital, with a large medical and surgical staff, in which various special departments for the treatment of diseases of the eye, throat, ear, diseases of women, &c., will be found.

SPECIAL HOSPITALS

HOSPITALS FOR CONSUMPTION AND DISEASES OF THE CHEST, Brompton.—The largest institution for the treatment of affections of the chest in the United Kingdom, there being 373 beds in the two buildings. There are six house physicians who reside in the hospital, each for a period of six months. Lectures and demonstrations are given by members of the medical staff on Wednesdays at four o'clock, save during the vacations. Terms, £2 2s. for three months; £5 3s. perpetual. A special course of instruction in the diagnosis of consumption, for which the department will hold the certificates, will be held in November. This hospital is recognised by the Conjoint Board, the University of London, and the Apothecaries' Society.

CITY OF LONDON HOSPITAL FOR DISEASES OF THE CHEST, Victoria Park.—This is a large and well-equipped hospital at the East End, containing 170 beds. Clinical lectures and demonstrations are given by the members of an exceptionally experienced staff. Fee for three months' attendance on hospital practice, 2 guineas; for six months' attendance, 3 guineas.

ROYAL HOSPITAL FOR DISEASES OF THE CHEST, CITY ROAD.—This hospital, which has lately undergone extensive re-organisation, provides an excellent field for research and study in diseases of the chest, more especially tuberculosis, and in various departments. The departments in which study can be pursued comprise the in-patient, out-patient, Röntgen-ray, cardiological, pathological and bacteriological, ear, nose and throat, and dental departments. At the hospital is a medical school for instruction in diseases of the chest, more especially tuberculosis, at which courses of instruction are given from time to time. There is also a tuberculosis school for nurses, where regular theoretical and thorough practical courses of instruction are given, for which a certificate is granted. The fees for attending the clinical practice of the hospital are as follows:—One month, one guinea; three months, three guineas; one year, 10 guineas; three years, 3 guineas; perpetual, 10 guineas.

For further information apply to the Dean, Dr. Barry King.
THROAT AND EAR HOSPITALS.

METROPOLITAN EAR, NOSE, AND THROAT HOSPITAL.—This hospital was founded in 1838 and is situated in Fitzroy Square. The out-patient department is open daily at 2.30 p.m. to practitioners and students desirous of acquiring clinical instruction and technical knowledge. Operations are performed on in-patients on Tuesdays, Wednesdays, and Fridays from 10 a.m. to 1 p.m. Fee for one month’s attendance at the hospital one guinea, and for three months two guineas. (See advt.)

HOSPITAL FOR DISEASES OF THE THROAT, Golden Square, W.—This hospital contains 48 beds. Clinical instruction is given daily in the Out-patient Department on diseases of the nose, throat, and ear, and systematic courses of lectures are given during the winter session. There are nine clinics weekly, and an annual otoscopic attendance of nearly 5000. Major and minor operations daily (Mondays excepted) in different theatres. Thirty-six junior clinical assistants are appointed from among the students to assist the surgeons. Students are admitted to the practice of the hospital at the following fees:—Three months £5 5s.; six months £7 7s.; longer periods, £10. Further details can be had by applying to the Hon. Med. Secretary.

CENTRAL LONDON THROAT AND EAR HOSPITAL. This hospital contains accommodation for 200 in-patients. It has a very extensive out-patient department (over 50,000 attendances yearly), which is open daily to all medical practitioners and students, for the purpose of clinical demonstration and instruction. Consecutive operations are given twice weekly by members of the staff, which are open to qualified practitioners and advanced students. Each course is of about seven weeks’ duration, and includes hospital attendance for that period. Operations are performed daily (Saturday and Sunday at 1 p.m.). Special attention is devoted to scientific work in the newly equipped laboratory. Full particulars will be supplied on application to the Dean.

WOMEN AND CHILDREN.

QUEEN'S HOSPITAL FOR CHILDREN, Hackney Road was established about 30 years ago as the North-Eastern Hospital for Children. It has 130 beds in London and 30 at its Seaside Branch, Bexhill. Courses of Post-Graduate Lectures and Demonstrations are given by the Medical and Surgical staff during the winter, which are free to Practitioners and Students of Medicine.

HOSPITAL FOR SICK CHILDREN, Great Ormond Street, Bloomsbury, and Cromwell House, Highgate, is the largest children’s Hospital in the United Kingdom, and contains 240 beds. The hospital is open to qualified medical men, and to students who have completed four years of medical study, the Hospital having been recognised by the Joint Board of England as a place where six months of the fifth year may be spent on clinical work. There are special ophthalmic, urological, dental, and surgical departments. There is also a Museum and Library in connection with the School. Fee for three months’ general hospital attendance, £7 5s.; perpetual, £10 10s.; £1 1s. for students satisfying the requirements of a Register of Practitioners. The lecturer’s room is situated on the third floor, in a special ophthalmic theatre of upwards of 70 beds, with a postgraduate ward of 40 beds. Operations are performed daily, or for not less than three months. Ophthalmological Clinics: Clinical clerkships are appointed once a month; fees, £1 1s., for a month’s attendance. Facilities are afforded for obtaining theoretical and practical instruction in the central and peripheral parts of the eye, and for a period of daily attendance in the Pathological Laboratories, the fees for which are: For one month, £1 3s.; for three months, £6. In addition to the ordinary practice of the hospital, Special Classes illustrated by cases, specimens, slides, charts, operations, etc., are arranged to extend over six weeks of each session. Further details and full syllabus may be obtained by application to the Dean or the Secretary of the hospital. Fee for each course of six lectures, £1 1s.

Special Courses of Instruction are given throughout the year as follows: Mondays and Thursdays, 4 to 5 p.m., "Pathological Investigation of Diseases of Childhood." Tuesdays and Thursdays, 3 to 6 p.m., "Minor Surgical Operations of Childhood." Tuesdays and Fridays, 2.45 to 4.15 p.m., "General Surgical Diseases of Childhood." Fee for six attendances, £1 1s.

QUEEN CHARLOTTE'S LYING-IN HOSPITAL, Marylebone Road, N.W.—Qualified medical practitioners and medical students are admitted to the practice of this hospital. Certificates of attendance are given by all universities, colleges and licensing bodies. Fee for the course of four weeks, £8 8s. Students are accommodated at the new Residential College (5 Cosway Street) opposite the hospital.

Arrangements have also been made for the preliminary instruction in midwifery now required by the General Medical Council. This will include:—(1) Practical instruction in the methods of examination of pregnant women, (2) delivery of seven months’ duration, under the direct supervision of a medical officer of the hospital; (3) practical instruction in the treatment of the mother and child during the puerperium, including clinical and domiciliary work; (4) examination four times weekly by the visiting medical staff. Fee for this special course, £5 per month. (See advt.)

EAST LONDON HOSPITAL FOR CHILDREN, Shadwell.—This institution was founded about sixty years ago in one of the poorer quarters of the East End of London and contains 124 beds, with specialпалаты for electric treatment, ophthalmic and dental surgery, etc. Two Clinical Clerkships are available, and the Hospital is recognised by the Joint Board for England.

ROYAL WATERLOO HOSPITAL FOR CHILDREN AND WOMEN.—This important institution, situated in South London, has been rebuilt and appointed on completely modern lines and now provides 100 beds, with an excellent Medical and Surgical Staff.

The SAMARKAN TEE HOSPITAL FOR CHILDREN, Marylebone Road, N.W., has 67 beds, and offers excellent opportunities to qualified medical men for clinical study and training in the details of operative gynaecology. Fee: Three months, £3 3s.; further particulars will be supplied by the staff in this department has gained for them a European reputation.

The HOSPITAL FOR WOMEN, South Sq.—The Hospital contains 67 beds. In connection with this institution there is now an organised school of gynaecology open to qualified medical men and to students after their third year. Clinical assistants to the physicians and surgeons in the in-patient and out-patient departments are appointed. Fee for three months’ course, and certificate, £8 8s.

CHELSEA HOSPITAL FOR WOMEN, Fulham.—This institution contains 30 beds, and is served by a staff of considerable experience. There is a Convalescent Home at St. Leonards, in which 22 additional beds are at the disposal of the authorities.

EYP HOSPITALS.

ROYAL EYE HOSPITAL, St. George's Circus, Southwark, S.E.—There are 40 beds and two cots at this institution. Lectures, demonstrations, instruction in refractive work, and demonstrations on the specimens in the Museum are given throughout the year by the teaching staff. Patients are seen in the out-patient department and operations are performed in the theatres daily, and the requirements of a Register of Practitioners. There are annually upwards of 21,000 new out-patients attending the Hospital. Fees for Three months’ practice and tuition, £3 3s.; perpetual, £5 5s. Further particulars of the Dean. (See advt.)

ROYAL WESTMINSTER OPHTHALMIC HOSPITAL, adjoins Charing Cross Hospital in King William Street. It has about 40 beds and a very large out-patient clinic. The lectures and demonstrations are arranged with special reference to the requirements of practitioners and junior students. Fee, six months, £3 3s.; perpetual, £5 5s.

ROYAL LONDON OPHTHALMIC HOSPITAL, formerly in Moorfields, and recently rebuilt in the City Road, is the largest hospital devoted to this speciality recognized by Britain, and contains 138 beds. Students and practitioners are admitted to the practice daily at 9 o'clock. Operations, 10 o'clock and after. Fee for six months,
SKIN HOSPITALS.

ST. JOHN's HOSPITAL FOR DISEASES OF THE SKIN.—Out-patient department, 49 Leicester Square. In-patient department, 62 Uxbridge Road, W. This hospital has a well-equipped in-patient department, with 40 beds. It has a School of Dermatology at 49 Leicester Square, which is conducted by the medical staff of the hospital. During the past year the free course of Chesterfield Lectures have been well attended. The Out-patient Department has been reduced in cost to £10,000, and contains a spacious laboratory and special electrical department which can be seen in operation every afternoon except Saturday. Special Courses in Pathology and Bacteriology can be arranged for in the laboratory. Departments are given every day at 2 p.m., on Selected Cases.

THE WESTERN SKIN HOSPITAL.—This is one of the oldest institutions of the kind in the metropolis, and was started as long ago as 1837. It has recently been rehoused in large and commodious premises in the Hamilton Road, and the practice of the hospital is open to students and practitioners, who have the opportunity of seeing daily a large number of out-patients.

THE HOSPITAL FOR DISEASES OF THE SKIN, Stamford Street, Blackfriars.—This was the first hospital to be established for the treatment of cutaneous disorders in London. It has an extensive out-patient department, which is open to qualified practitioners. This year an evening clinic has been opened for the convenience of patients. A fine inner court has lately been acquired in the Blackfriars Road, whither the hospital will shortly be moved, and in the new buildings it is hoped to add a few beds.

METROPOLITAN POST-GRADUATE INSTITUTIONS.

MEDICAL GRADUATES' COLLEGE AND POLYCLINIC.—At the lectures and clinics, at which illustrative cases are specially selected, one hour is devoted to clinical teaching, and is adapted to suit the busy practitioner, and one has the opportunity of meeting other practitioners who are interested in the same subject. The subscription is one guinea per annum. Special facilities are afforded to those desirous of attending hospital practice. A time-table of clinics at the general and special hospitals is kept, and the Secretary makes all necessary arrangements. For those who wish to acquire the necessary skill to enable them to use some of the most important forms of apparatus, such as the cystoscope, sigmoidoscope, larynscope, X-rays, high-frequency currents, electricity, etc., special arrangements have been made so that each practitioner may receive practical personal instruction in the use of these apparatuses in different departments of the hospital. There are special practical classes in such subjects as bacteriology, pathology, microscopy, gynæcology, otoLOGY, etc. There is a well-equipped clinical laboratory attached to the college, under the superintendence of an expert medical officer. Special instruction is given in all branches of clinical practice, pathology, bacteriology, vaccines, etc. There is a special department, which enables subscribers to have specimens examined, vaccines prepared, etc., at moderate fees. The Polyclinic is not confined for its teaching staff to any one medical school or hospital, but includes teachers from all the best general and special hospitals in London. Full information may be obtained from the Medical Superintendent, Medical Graduates' College, 22, Clarges Street, Grosvenor Street, W.

WEST LONDON POST-GRADUATE COLLEGE.—The West London Hospital, Hammersmith, contains 160 beds; the post-graduate course was started in 1895. Instruction is given in the out-patient department daily at 12.30, and in the wards at the request of the doctors and assistant surgeons. The physicians and surgeons attend daily at 2.30 p.m., when post-graduates can accompany them in their visits to the wards. Operations are performed daily at 2.30 p.m. Demonstrations are held every morning and afternoon. There are long despatches evening at 5 p.m. (Saturdays excepted). Special classes are held in bacteriology, vaccine therapy, diseases of the eye, throat, X-rays, anaesthetics, intestinal surgery, tropical medicine, cystoscopy, vaginal and operative surgery, etc.—No information vouchsafed.

PRINCE OF WALES'S GENERAL HOSPITAL, TOTTENHAM.—This hospital contains medical and surgical wards and a ward for children, having 125 beds, with a very large out-patient department. It is exclusively limited to post-graduates. There are special departments for gynaecological cases, diseases of the eye, ear, throat, nose, and medical electricity and radiography, and skin diseases. It is authorised by the University of London to give the degree of post-graduate in the M.D. and M.S. degrees.

NORTH-EAST LONDON POST-GRADUATE COLLEGE.—This post-graduate school is established in connection with the Prince of Wales's General Hospital, Tottenham, N., which is recognised by the University of London as an educational centre of post-graduate study for the M.D. and M.S. degrees.

The following are some of the principal provincial hospitals having the greatest number of beds, to which students are admitted, where clinical instruction can be obtained, but to which there is no medical school attached—

BATH ROYAL UNITED HOSPITAL, Bath.—This hospital contains 150 beds and possesses an extensive library. Considerable alterations and re-arrangements have been carried out in the out-patient department during the past year, and also a complete installation of heating by hot water.
Post-Gnulu utc
About Medicine
For This two the Charinj; equipped School the boards, wards), St. University University
The This by clinical material Nottingham the Hospital. This by 254...the six...the 15s. the Hospital. for this course each...the Hospital. is...paid.
The Royal Sussex County Hospital, Brighton.—This hospital possesses about 201 beds, as well as a large out-patient department, and a well-appointed clinical research and bacteriological department. Hospital or the Hospital is occupied here for the preceding two years on payment in advance of a sum exceeding two years on payment in advance of a fee of 20 guineas. There is also an excellent library attached.

Wolverhampton and Staffordshire Hospital.—This is one of the largest hospitals in the Midlands, and contains 200 beds. It is the one of the great coal and iron industries, it affords ample material for clinical study, and as the Hospital is recognised by the Royal Colleges, and has an excellent staff, its position is excellent.

For further particulars see Advertisements:

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**The Irish Medical System.**

The system of medical teaching in Ireland differs from that in England in important particulars. In London each clinical hospital has its attached medical school, well-equipped, which educates the students of that hospital and very seldom those of any other. In Dublin, on the contrary, the hospitals and schools are entirely separate (except that Sir Patrick Dun's Hospital is officially connected with Trinity College), and a student of any school is free to enter for the whole or any part of his course at any school or hospital he pleases.

**Cost of Medical Education in Ireland.**

The cost of obtaining a medical qualification depends to some extent on the qualification sought. In this connection the following tables may be of use to the prospective student:

**Cost of Medical Education.**

| School of Physic, Dub., Univ. | £122 17s. |
| Royal College of Surgeons School | £124 19s. |
| University Colleges | About £125. |
| Queen's University, Belfast | £105 |
| **Cost of Diplomas or Degrees.**
| Dublin University | £75; for this must be added £83 4s., the cost of obtaining an Arts degree. |
| National University, Ireland | £75. |
| Queen's University, Belfast | £101 19s. |
| Conjoint Royal Colleges | £47. |
| Apothecaries' Hall | £22 1s. |

Thus, the absolute payment will amount to somewhere between £125 and £235 Is, according to the course chosen. For the Conjoint Colleges the entire cost is £166 19s, taking the maximum mode of payment. So that, assuming that extras or voluntary costs are incurred the total will vary, say, from £170 to £200. "Grinding," although not officially recognised, occupies a position similar to that of the extra-mural instruction of other schools. Its cost must be reckoned among the expenses of the course, for, while not essential, it has become customary for almost all students to obtain aid in their studies in this way. As a rule, this private instruction costs about £5 5s. for each of the four examinations.

The above sum, or something like it, may be expended by the student or his parent in paying for lectures, &c., and examination fees as they fall due, and there is no difficulty in obtaining the necessary information for his guidance if he likes to pay for his course this fashion.

All the schools require fees for each course to be paid in advance. Women are admitted to all the courses, degrees, and licences on the same terms as men.

**Date of Entry.**

The entry of names and commencement of study in Ireland is suspended to date from the 1st of October in each year, but entries are accepted up to the end of that month, or in some schools even later. It should be remembered that no credit is given for studies or attendance until the entry is regularly made. The student must attend three-fourths of the lectures delivered, and if he loses any time at the beginning, he must make up for it afterwards by constant attendance.

The student begins work by attending a recognised medical school each morning at ten o'clock, and occupying this by lectures and dissections. His vacations are a fortnight at Christmas and a fortnight at Easter, and the academic year ends at the end of June.

**Preliminary Examinations.**

The first act of the student is to pass a preliminary examination, without which he cannot get credit for any medical studies pursued. The next is to commence medical study. This he does by entering for lectures at a medical school. From the school registrar he gets
a form of certificate, and his third act is to take it or send it to the Branch Medical Council, 35 Dawson Street, Dublin, unless, as is usually the case, this duty is undertaken by him for the school registrar. He is then entitled to become a Regius Registrar of Medicine, and is free from all fees, and his period of study counts from that date. He must register at the earliest possible moment, or he may lose credit for his work.

The only preliminary examination held specially for medical education held currently by the Royal Colleges of Physicians and Surgeons, but other examinations—e.g., the public entrance at Trinity College, the matriculation of the National and Queen’s Universities, the Intermediate Examination passes in the required subjects, and certain other examinations recognised by the General Medical Council, are accepted as equivalent.

The subjects of examination as prescribed by the General Medical Council are as follows:—1. English language, including a specified author, dictation, grammar, and composition; also parsing and analysis from a book specified. 2. Latin, including grammar, translation from specified authors, and translation of easy passages not taken from such authors. 3. Elements of mathematics, comprising (a) arithmetic, including vulgar and decimal fractions; (b) algebra, including simple equations; (c) geometry, Euclid, Books I., II., and III., with easy deductions. 4. One of the following optional subjects:—(a) Greek, (b) French, (c) German.

The Irish Licensing Bodies.

The Medical Licensing Bodies of Ireland are five in number, and, as a rule, students will gravitate into one or other of six classes:—a. Those who enter Trinity College, and take a full graduation in Arts in addition to their professional degrees. b. Those who take the conjoint licence of the Royal Colleges of Physicians and Surgeons. c. Those who take their qualifications at the National University of Ireland, where graduation in Arts is a requisite. d. Those who enter Queen’s University, Belfast, and take their course and degrees there. e. Those who take the licence of the Apothecaries’ Hall. f. Those who pursue their studies in Ireland, but who migrate to London, Edinburgh, or Glasgow for their licences.

We do not attempt to give details as to the requisite courses of instruction for degrees or diplomas, as our epiteome must necessarily be insufficient for the information of the student, and we can occupy our available space with more useful matter. Since no other official information upon which students may depend can be obtained by sending a note to the Registrars of the Licensing Bodies or Schools.

The University of Dublin.

The University of Dublin grants the degrees of M.B., B.Ch., and B.A.O. to students who have obtained their B.A. degree, and who have been for at least five academic years on the books of the Medical School, and the higher degrees of M.D., M.Ch., and M.A.O. to graduates of certain standing who hold the degrees of M.B., and B.Ch. It does not grant degrees to any but graduates in Arts, and consequently its degrees hold a high rank, and are sought for by those who look forward to occupying the best positions in the profession.

The expense of obtaining the degrees of M.B., B.Ch., and B.A.O. is approximately as follows:—Lectures, £5 4s. 0d.; Hospitals, £3 13s. 0d.; Degree Fees, £2 7s. 0d.; Total, £19 17s. 0d.

The expense of the B.A. degree, amounting altogether to £83 4s., should be added, making the total cost £223 11s. 0d.

Diploma in Medicine, Surgery, and Midwifery.—Candidates for the Diploma in Medicine, Surgery, or Obstetric Science must be matriculated in Medicine, and must have completed two years in Arts and five years in medical studies. The medical course and examinations are the same as for the degrees. Fees for the diplomas in medicine, surgery, and midwifery, £21. A diploma on completing his course in Arts and proceeding to the degree of B.A., may become a Bachelor of Medicine on paying the degree fees.

In addition to its ordinary qualifications the University grants the degree of Doctor of Medicine.—To obtain this the candidate must have passed the final examinations, and be of M.A. standing. He must then read a thesis before the Regius Professor of Medicine. Fee for this degree, £5.

Master Surgery.—The candidate must be a Bachelor in Surgery of three years’ standing, and must then pass an examination in clinical surgery, operative surgery, surgical pathology, surgery, and surgical anatomy (on the dead body), and then pay the fee for the Master in Obstetric Science. The candidate must have passed the M.B. and B.Ch. examinations, and have completed, in addition to the course for M.B., B.Ch., a course of obstetric medicine and surgery. He is then required to pass an examination in the following subjects:—Practice of midwifery, gynaecology, anatomy of female pelvis and elementary embryology, and clinical gynaecology. Fee for this degree, £5.

Diploma in Public Health.—The candidate must in a Registered Medical Practitioner; must have completed, subsequent to obtaining a registrable qualification, four months’ practical instruction in a laboratory in practical work in chemistry and bacteriology applied to public health; he must have passed the preliminary practical work for six months under an approved officer of health; and have attended, after qualification, for three months, the practice of a hospital for infectious diseases.

Degree in Dental Science.—Candidates for the D.Dent.Sci. degree in dental science must have taken a degree in Arts, and must have had their names in the books of the Medical School for four years. Three examinations must be passed—namely, the Preliminary Scientific at the end of the first year, the Intermediate at the end of the third year, and the Final Dental at the end of the fourth year. The total fees are £280 2s.

Full particulars regarding the Medical and Dental Courses and a prospectus of the Courses for the Diploma in Public Health may be obtained by application to the Registrar of the School of Physx, Trinity College, Dublin.

Queen’s University, Belfast.

The Queen’s University confers the degrees of M.B., B.Ch., and B.A.O., on students who have followed the prescribed course of studies for five academic years, and passed the prescribed examinations. At least three of these years are to be spent on courses at the University. The expense is about £20.

Degrees of M.D., M.Ch., and M.A.O.—These degrees are not conferred until the expiration of at least six academic years, or, in the case of graduates of the University in Arts or Science, of at least two academic years, after admission to the primary degrees in the Faculty of Medicine. Every candidate must show that in the interval he has pursued an original work, or been engaged in such practical work as may be prescribed. These degrees may be conferred by the Senate either (a) after an examination, which includes written, oral, clinical, and practical examinations; or (b) on the submission of the thesis in lieu of the above study or research, to be approved by the Faculty of Medicine, after an oral or other examination of the candidate on the subject thereof. On application for these degrees a fee of £2 2s., and on admission to the faculty, £10, must be paid.

The subjects of the examination for the degree of M.D. are:—The Principles and Practice of Medicine, and one other special subject to be selected by the candidate from: (i) Human Anatomy, including Embryology; (ii) Physiology; (iii) Pathology; (iv) Pharmacology and Therapeutics; (v) Sanitary Science and Public Health; (vi) Forensic Medicine and Toxicology; (vii) Mental Diseases.

The subjects of the examination for the degree of M.Ch. are:—(r) Surgery, Theoretical and Practical,
including Ophthalmology and Otology. (2) Surgical Pathology. (3) Surgical Anatomy and Operative Surgery, with the use of surgical instruments and appliances.

The subjects of the examination for the degree of M.A.O. are:—(1) Midwifery. (2) Diseases of Women, and Children. (3) Pathology in its special bearing on Midwifery and Children. 

**Diploma in Public Health.**—This diploma is given after examination to registered medical men, on similar conditions to those obtaining elsewhere.

**NATIONAL UNIVERSITY OF IRELAND.**

The National University of Ireland confers the degrees of M.B., B.Ch., and B.A.O., on students who have followed the prescribed course for five academic years, and passed the prescribed examinations. At least three years must be spent at one of the constituent colleges of the University, viz., the University Colleges at Dublin, Cork, and Galway. The University also confers the higher degrees of M.D., M.Ch., M.A., B.Sc. (Public Health), D.Sc. (Public Health), B.D.S., and M.D.S.

The course of obtaining the degrees of M.B., B.Ch., and B.A.O., is approximately:—Lectures, £68 5s.; Hospitals, £50 £; University Fees, £19. Total, £143 10s.

The conditions for the higher degrees are:—

**Doctor in Medicine.**—Candidates may present themselves for the examination for this degree after an interval of three academic years from the time of obtaining the M.B., B.Ch., B.A.O. degrees; but in the case of candidates who have obtained a degree of the University in the Faculty of Arts, an interval of two academic years is sufficient.

Candidates must at the same time produce a certificate of having been, for at least two academic years, engaged in hospital or private medical, surgical, or obstetrical practice respectively, or in the military or naval service.

Candidates at this examination must answer in Medicine and Pathology.

The examination in each subject consists of:—

(a.) A Written Examination.

(b.) An Oral Examination.

In addition every candidate must diagnose at the bedside at least three medical cases, and prescribe treatment. He must also write detailed reports on at least four cases of hospital or private medical, surgical, or obstetrical practice respectively, or in the military or naval service.

**Master in Surgery.**—The following are the subjects of examination:—

Surgery, theoretical and practical, including Ophthalmology and Otology; Surgical Pathology; Surgical Anatomy and Operative Surgery, with the use of Surgical Instruments and Appliances.

The other conditions are the same as for the M.D. degree.

**Master in Obstetrics.**—Academic standing is as for the two previous degrees.

Each candidate must furnish satisfactory evidence that since graduating in medicine he has (1) had personal charge of at least thirty cases of labour; and (2) attended during the period of three years the practice of a clinical hospital for diseases of women, where at least six beds are in constant occupation, or in a special ward of a general hospital, where such cases only are treated and containing at least six beds in constant occupation.

Candidates at this Examination must answer in the following subjects:—Midwifery, Diseases of Women and Children, Pathology, the Use of Instruments and Appliances, and Obstetrics. A candidate must present himself at the examiners.

(b) an Oral Examination, with practical illustrations, including the use of instruments and appliances; (b) a written Examination; (c) a clinical Examination, as far as practicable.

**Bachelor of Science in Public Health.**—A candidate shall not be admitted to receive the Degree of Bachelor of Science, Public Health, unless he:—(a) shall have received the Degrees of M.B., B.Ch., and B.A.O. at least one year previously; (b) shall have

pursued an approved course of study in the Faculty of Medicine; and (c) shall have passed the prescribed examinations.

**Courses.**—In addition to D.P.H. Course:—(1) Special Pathology (three months). (2) Bacteriology, second course (three months). (3) Advanced Course in Midwifery (three months). 

**Doctor in Public Health.**—The regulations are not yet published. Fee, £10.

**Diploma in Public Health.**—This Diploma may be granted to matriculated students of the University who shall have completed one year's study, approved for the purpose, and shall have passed the prescribed examinations: provided that it shall not be granted except to a registered medical practitioner.

The conditions and examination are similar to those already in force for the University of Dublin.

**Diploma in Dentery.**—Candidates for the Degree of B.D.S. shall be required to pass, after matriculation, four University Examinations, namely:—A First University Examination in Medicine, as for medical students; for Instruction in these subjects. We recommend students to apply for the official programme to the Secretary of the Committee of Management, Royal College of Surgeons, or to the Registrar of either College. In the case of the Preliminary Examination seven clear days' notice must be given to the Secretary of the examination to be held in Dublin, and the fee, £124 10s., makes altogether £166 10s., exclusive of re-examination fees, which have to be paid in case the candidate fails to pass his examination.

The Colleges also confer a Diploma in Public Health, of which information will be found on page 277.

**ROYAL COLLEGES OF PHYSICIANS AND SURGEONS.**

Examinations are held conjointly by the two Colleges. The course, as in other bodies, extends over five years, with examinations at the end of the first, second, third and final years. These examinations are conducted by examiners chosen by each of the Colleges for the subjects appropriate to them. Each of the curriculum has recently been revised, and made of a more practical form. As in the English Colleges, the subjects of the First Professional Examination may be studied either at a medical school or at an institution other than a medical school which is recognised by the Colleges, after due inspection. As in the English Colleges, students are required to pass at the end of the first or second years, as the case may be, the Preliminary Examination of the Royal Colleges of Physicians and Surgeons, and to the Registrar of either College. In the case of the Preliminary Examination seven clear days' notice must be given to the Secretary. In the case of the Final Examinations, the fee, £42, and the maximum term of residence, 14 years, in any one of the Colleges, makes altogether £50 10s., exclusive of re-examination fees, which have to be paid in case the candidate fails to pass his examination.
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President may appoint. Fee to Licentiates of the College, £21, to others £30. Ir.

ROYAL COLLEGE OF SURGEONS IN IRELAND.

This College grants a Licence in Surgery to registered medical practitioners.

The subjects, methods, times, and places of examination are those of the surgical group of the Final Professional Examination of the Conjoint Board in Ireland of the Royal College of Physicians and the Royal College of Surgeons. (See their regulations.) Candidates must pass in all the subjects at one examination. Special examinations will not be granted under any circumstances.

Candidates may be registered either on the Medical Register for the United Kingdom, the Colonial Medical Register, or the Foreign Medical Register of the year in which he presents himself for examination, and who satisfies the Council that he has passed through a course of study and examinations equivalent to those required by the regulations of the Conjoint Board of the Royal College of Physicians of Ireland and the Royal College of Surgeons in Ireland, preceded by the passing of an examination in Arts recognised by the Council, may, upon application, be admitted to the examination.

Candidates are required to lodge their applications, declarations, and certificates with the Registrar, at least twenty-one days before the date of the examination.

The fee for examination is for each admission five guineas. Of these fees five guineas will be reckoned as part of the fee payable upon admission to the Licence in Surgery. The fee to be paid upon admission to the licence in Surgery will be four guineas.

Fees will not be returned under any circumstances.

All applications with reference to the examination for the Licence in Surgery should be addressed to the Registrar, Royal College of Surgeons in Ireland, Dublin.

Fellowship.—The examination for the Fellowship is divided into two parts—viz.: The Primary and the Final. The subjects of the primary examination are—anatomy, including dissections, physiology, and histology. The examination is partly written, partly oral, and partly practical. Candidates must pass in all the subjects at one examination. The subjects of the final examination are—Surgery, including surgical anatomy, and pathology. The examination is partly written, partly oral, and partly practical. Candidates must pass in all the subjects at one examination. The examinations are held three times in each year, commencing—The primary on the first Monday in March, the third Monday in July, and the third Monday in November. The final on the second Monday in March, the third Wednesday in July, and the fourth Monday in November. Special examinations will not be granted under any circumstances. Candidates are required to lodge their applications, certificates, and receipts for fees with the Registrar, at least seven days before the date of the examination.

Fees.—1. The fees for examinations are as follows:—

Primary examination, each admission, 5 guineas:—final examination, each admission, 5 guineas. 2. Of these examination fees ten guineas will be reckoned as part of the fee payable upon admission to the Fellowship. 3. The fee to be paid upon admission to the Fellowship is forty guineas, except when the candidate is a Licentiate of the College, in which case the fee is twenty-five guineas.

All applications with reference to the examinations for the Diploma of Fellow should be addressed to The Registrar, Royal College of Surgeons in Ireland, Dublin.

Dental students by the General Medical Council. They must have been engaged during a period of two years in acquiring a practical familiarity with the details of mechanical dentistry under the instruction of a registered dentist, or under the direction of the superintendent of the mechanical department of a recognised hospital where the arrangements for teaching mechanical dentistry are satisfactory to the Council of the College. This instruction may be commenced or attended before the candidates register as medical or dental students. They must have been engaged during the four years in the acquirement of professional knowledge subsequently to the date of registration as a medical or dental student.

One year's bona fide apprenticeship with a registered dental practitioner, after being registered as a medical practitioner, is an essential condition of the fourth year of professional study. Candidates must produce evidence of having followed a prescribed course of study. There are special exemptions in the case of persons already holding a surgical or dental qualification.

All applications with reference to the examination for the fee, Diploma of Fellow in Surgery, should be addressed to The Registrar, Royal College of Surgeons in Ireland, Dublin.

APOTHECARIES' HALL OF IRELAND.

The Licence of this Hall is granted to students who present certificates of having completed the course of study as laid down in the curriculum, and pass the necessary examinations. The diploma of this apothecary may, in the discretion of the Council, be granted to the holder to be registered as a practitioner in medicine, surgery, and midwifery, and possess the privileges of an apothecary.

There are three professional examinations, the total fees for which amount to thirty guineas. Women are eligible for the diploma.

Registered medical practitioners receive the diploma of the Hall upon passing an examination in the subject or subjects not covered by their previous qualification, and on paying a fee of fifteen guineas.

The fees payable for each examination are as follows:—Professional Primary, £5 5s.; Intermediate, £10 10s.; Final Examination, £15 15s.

Applications and schedules, together with bank receipt for the fee, must be lodged with the Registrar, Apothecaries' Hall, 40 Mary Street, Dublin, at least fourteen clear days before the day of examination.

Each candidate before receiving his diploma must produce evidence that he has attained the age of 21.

The candidate must produce evidence of having passed before entering on medical studies passed a preliminary examination in general education.

The details of the course of education required and syllabus of the examinations will be supplied on application to the Registrar at 40, Mary Street, Dublin.

THE DIPLOMA IN PUBLIC HEALTH.

The diploma is granted by Dublin University, the National University, Queen's University, and the Conjoint Royal Colleges. Every candidate must be a registered medical practitioner. The examination is in:—(1) Chemistry (including chemical physics). (2) Engineering and architecture. (3) Ordinary law, excepting penal statutes. (4) Hygiene. (5) Bacteriology. (6) Meteorology. The General Medical Council recommend that all candidates shall have studied in a special bacteriological laboratory, also for six months as pupil of a working medical officer of health. The examinations are preceded by a report of the medical officer of health of a county or of one or more districts having a population of not less than 30,000, or a medical officer of health who is a teacher in Public Health of a recognised medical school.

THE IRISH MEDICAL SCHOOLS.

The Irish Medical Schools are as follows:—

The School of Medicine, Trinity College, Dublin.—No student is permitted to matriculate unless he has passed the Necessary Examination of Trinity College, or some other examination recognised by the General Medical Council. Two medical scholarships are given.
annually at the School of Physic, value £20 per annum, for two years; the examinations for which are held in Anatomy and Botany, and the candidate who obtains the highest aggregate marks in Anatomy and Botany, and in Botany and institutes of medicine; the other in zoology, chemistry, botany and experimental physics. A travelling prize of £100 is awarded by the Board to the successful candidate at a special examination in anatomy and physiology, held annually. The Board has decided that the merit be deemed sufficient. The successful candidate is required to spend three months in the study of medicine or surgery abroad. The examination is held in June, and is open to students who have passed the Final Examinations in Medicine or Surgery, but in no case may be, within two years of the examination.

The Sir John Banks Medal and Prize, founded by the late Sir J. Banks, M.D., formerly Regius Professor of Physic, are awarded to the best and second best answerers at the Medical Travelling Prize Examination.

The Edward Halloran Bennett Medal and Prize, founded by pupils of the late Dr. E. H. Bennett, formerly Professor of Surgery, are awarded to the best and second best answerers at the Surgical Travelling Prize Examination.

Class prizes are given at the end of the session of between £5 and £10 in value. The John Mallet Purser Medal, founded by Prof. Purser’s past pupils, is awarded to the student who obtains the highest aggregate marks at the five sections of the Final Examinations, provided that he has completed his medical course in the prescribed period of five years.

There is a complete School of Dental Science in connection with the School of Physic, Trinity College. Lectures are given in anatomy, chemistry, surgery, physics, physiology and histology, dental anatomy, dental mechanics, orthodontia and anesthetics.

Post-Graduate Classes.—A short post-graduate course is now given annually in September in connection with Trinity College Medical School. It includes special work on Diseases of the Eye, Nose, and Throat, Gynaecology, Diseases of the Skin, X-ray work, Medicine, Surgery (clinical and operative), and Clinical Pathology and Applied Physiology.

All classes are open to women and to external students as well as to students of the University.

The Royal College of Surgeons in Ireland, Schools of Surgery.—These schools are attached by Charter to the Royal College of Surgeons, and have existed as part of the College for over a century. They are carried on within the College buildings, and are subject to the supervision and control of the Council. The buildings have been reconstructed, the capacity of the dissecting room now providing for pathological surgical, pathological dental, gynaecological, public health, chemical, and pharmaceutical laboratories fitted with approved appliances, in order that students may have the advantage of modern methods of instruction. There are special rooms set apart for women students.

The lectures and courses of practical instruction may be attended by medical students who are otherwise unconnected with the College.

All the diplomas of the College are open to students of either sex. Separate rooms have been provided, and made for the instruction and comfort of women students.

Prizes.—The Barker Prize, £26 6s.; the Carmichael Scholarship, £1; the Mayne Scholarship, £5. The Gold and Silver Medals in Surgery and the Stoney Medal in Anatomy.

Class Prizes of £2 and £1, accompanied by silver medals if sufficient merit is shown, will also be given in each subject. Prospectus and Student’s Guide are obtainable on application to the Registrar, Royal College of Surgeons in Ireland.

UNIVERSITY COLLEGE, DUBLIN.—This College is a constituent college of the National University of Ireland, for whose examinations and degrees it trains students. The examinations are conducted by the professors and examiners of the college, in conjunction with external examiners appointed by the University.

Medical students must be registered with the Branch Medical Council at the commencement of their period of study. Forms of application can be obtained and may be filled up by any inhabitant of Ireland. No conditions for registration may be obtained from the Registrar of the College at the Medical School. The student must bring with him the certificate of his Matriculation examination, or of the Senior Grade of the examination of the Institution for which he is registered, to the Branch Medical Council in the necessary subjects, and his birth certificate.

Non-matriculated students intending to study medicine must have passed a Preliminary Examination, accepted by the General Medical Council, in English, Latin, Mathematics, and a Modern Language or Greek.

Intending medical students who, for any reason, cannot begin the study of Medicine in the Winter Session, may do so in the Summer Session, but will not be able to take the Anatomical examination until the first medical year, until the following Winter Session.

The Scholarship Regulations provide for Five Scholarships of £30 each, tenable for one year in each of the 2nd, 3rd, 4th and 5th years of study. The Examination for these scholarships is held in October, with the subjects being those to which no component examination applies which Candidates must have attended in the College. Scholarships tenable for one year are offered at entrance at an Examination common to all Faculties.

There are Examinations of the value of £20 and £10 offered by the College for the several classes at each Medical Examinations of the University; and a Gold Medal to the most distinguished answerer at the M.B., B.Ch., and B.A.O. Examinations of the year.

Courses of lectures in Dental Surgery and Dental Mechanics are given to Dental students.

THE QUEEN’S UNIVERSITY OF BELFAST.—This University provides all the classes required for a complete medical curriculum. The University contains laboratories in connection with the departments of Biology, Chemistry, Physiology, Pathology, Anatomy, Physics, and Materia Medica. In connection, too, is a Students’ Union, which gives students the advantage of dining-rooms, reading-rooms, and the free use of library and laboratory.

Women are eligible as students. Clinical instruction is given at the Royal Victoria Hospital, which was rebuilt a few years ago, and has 300 beds, and at the Mater, which has 150 beds. Other hospitals open to the dissecting rooms of the University are: The Maternity Hospital, the Ulster Hospital for Women and Children, the Hospital for Sick Children, the Ophthalmic Hospital, the Bell Ulster Eye, Ear, and Throat Hospital, the Union Infirmary and Fever Hospital, the Fever Hospital,浦儒夏, and the District Lunatic Asylum.

Scholarships.—(1) Twelve Entrance Scholarships, value £20, given to students of Art, Science and Medicine; (2) two Dunville Scholarships (each alternate year), value £20 each; (3) one Andrews Studentship each alternate year, value £145; (4) numerous sessional prizes.

Sixteen scholarships, value £10-£20, are now open for competition at the remains of medical examinations in March and June. Each year a Magrath Clinical Scholarship value about £108. There is also a Post-Graduate Research Fund open to all graduates of not more than three years’ standing. Information regarding these scholarships, etc., may be obtained on application to the Secretary of the University.

Fees.—The cost of the curriculum intended for students proceeding to the degrees of the Queen’s University of Belfast is, approximately, £100. This includes examination fees and a perpetual ticket for attendance at the Royal Victoria Hospital or the
Mater Infirmorum Hospital, but not fees for the special hospitals.

IRELAND—

Certificates in several of the academic institutions educate students for all degrees and licenses, and are maintained, as hitherto, by Government grants. Various exhibitions and scholarships are available. Each college has the disposal of about £1,500 per annum.

THE UNIVERSITY COLLEGES—CORK AND GALWAY.—There are now constituent colleges of the National University of Ireland, and conduct examinations admitting to its degrees.

UNIVERSITY COLLEGE, CORK.—The arrangements in the Faculty of Medicine are made chiefly with reference to the requirements of the National University of Ireland, but students proceeding for the degrees of Fellow of the Royal College of Surgeons in England, Scotland, or Ireland, can arrange the course of lectures which they attend, and the order in which they attend them, to meet the requirements of those bodies. Certificates of attendance in the college are also acceptable to the University of London. The total fees for the college lectures and hospital attendances required by the National University of Ireland are about £604.

Clinical instruction is given at the North and South Infirmaries and the Union Hospital. Students can also attend the Mercy Hospital, the County and City of Cork Lying-in Hospital, the Maternity Hospital, the Hospital for Diseases of Women and Children, the Fever Hospital, the Ophthalmic and Aural Hospital, and the Eglinton Lunatic Asylum. The winter session commences October 1st, and ends at the end of April. The courses of the summer session are delivered in the months of April, May, and June.

Between forty and fifty scholarships open to Medical Students are awarded annually (values £20-£70), as well as the Blayney Scholarship. This Scholarship, worth about £32, will be awarded to the candidate obtaining the highest marks in Honours at the M.B., B.Ch., B.A.O. Examination, held in Autumn at the College.

Further information can be obtained in the College Regulations, or on application to the Registrar, University College, Cork.

UNIVERSITY COLLEGE, GALWAY.—Clinical teaching is carried on in the Galway Hospital, established as a Public General Hospital (in the place of the County Galway Infirmary) by Act of Parliament 1852. The Galway Fever Hospital and Galway Union Hospital are also open to students. The conditions of residence required by the National University for graduation may be observed in Galway. The lectures qualify for the other licensing bodies.

P R I C E S.—There are eight Junior Scholarships in Medicine of the annual value of £25 each. Two are tenable by matriculated students of the first, second, third, and fourth year. There besides, private Foundation Scholarships open to medical students and tenable with medical scholarships. Sessional prizes are offered in each subject.

Like the sister college of Cork, this college is now a constituent college of the National University of Ireland.

ROYAL COLLEGE OF SCIENCE FOR IRELAND.

This College, situate in St. Stephen's Green, Dublin, supplies a complete course of instruction in science applicable to the industrial arts, especially those which may be cast broadly under the heads of Agriculture, Chemical Manufactures, Engineering, Physics, and Natural Science. A Diploma of Associateship of the College is granted at the end of the three years' course. Non-associate students may join for any course required. There are several entrance scholarships, (a) in Agriculture, and (b) in Science and Technology, tenable for three years, of the value of £50 each yearly, with free tuition. There are four Royal scholarships of the value of £50 each yearly, with free tuition, tenable for two years, and two are tenable in these important subjects for associate students at the end of each session. All the laboratories and drawing schools are open daily for practical instruction. The Science Scholarship Examinations are held during the first week in July, and the Examinations for the first and second Scholarships in September, and the Entrance Examination for intending Associates in the third week of September. For further particulars and copy of college programme apply to the Registrar.

THE DUBLIN HOSPITALS.

The clinical hospitals in Dublin are ten in number, exclusive of three lying-in hospitals. There are also seven dispensary hospitals, an orthopaedic hospital, a fever hospital, an ophthalmic hospital, a dental hospital, and other special hospitals. Some of the clinical hospitals, though they have no actual or official connection with any school, are in close affinity with certain teaching bodies; and generally they have, without any special connection with any school. While, however, such association of school and hospital may exist, it should be remembered that the Dublin schools and hospitals are open to all comers, and the student is free to select either of them by any layman's wishes, and to change his hospital from year to year as he may see fit.

The Irish licensing bodies require attendance on hospitals for twenty-seven months—i.e., three winter sessions and four terms; and nine months' hospital work, within the five years of study. The fee for each general hospital is £8 8s. in winter, and for the summer £5 5s., or £2 12s. for the entire session of nine months if taken together. All the Dublin hospitals receive students as residents.

GENERAL HOSPITALS.

RICHMOND, WHITWORTH, AND HARDWICKE HOSPITALS.—These hospitals contain over 300 beds. They are visited each morning at nine o'clock by the physicians and surgeons, and, in addition to the usual bedside instruction, clinical lectures are delivered on the most important cases. Instruction is also given on the principles of medicine and surgery. The Truss Establishment, for the distribution of trusses to the ruptured poor of Ireland, is connected with these hospitals. There are ophthalmic, aural, throat, and gynaecological dispensary departments, and the instruction in these important subjects is given. A modern pathological laboratory, and a new mortuary have been opened recently. Twelve resident clinical clerks are appointed each quarter, and provided with furnished apartments, fuel, &c. The appointments are open not only to advanced students, but also to those who are qualified in medicine and surgery. A house surgeon for the Richmond Hospital and a house physician for the Whitworth and Hardwicke Hospitals are elected every six months, and are respectively £4 10s. and £2 12s. The Richmond Lunatic Asylum, containing 1,200 beds, adjoins the hospital.

MEATH HOSPITAL AND CO. DUBLIN INFIRMARY.—This hospital was founded in 1752, and now contains 160 beds available for clinical teaching. A new building for the isolated treatment of fevers, containing 40 beds, has recently been added. The certificates are recognised by all the universities and licensing bodies of the United Kingdom. Medical and surgical resident physicians and clinical surgeons are appointed every three months, and two house surgeons are elected annually. A prospectus giving the complete arrangements for medical and surgical classes for the coming session may be obtained from the Secretary of the Medical Press, F.R.C.S.I., 32, Upper Pembroke Street.

THE ADELAIDE MEDICAL AND SURGICAL HOSPITALS occupy a central position within a few minutes'
walk of the College of Surgeons and Trinity College. From October 1st, the physicians and surgeons visit the wards and give instruction at the bedside at the discretion of the authorities. There is a large detached fever hospital, and there are wards for infants and children. Operations are performed, at 10 a.m. on Tuesday, Thursday, and Friday. Special hours are devoted to clinical instruction in the wards, and a practice paper on general pathology and X-ray photography. Two House Surgeons are elected annually and four resident pupils half-yearly. Prize examinations for the Hudson Scholarship of £50 and a gold medal, and 1st and 2nd Prizes for surgical, medical, and dermatological prizes, are held at the termination of the session. The large dispensaries afford facilities for the study of ear, throat, and cutaneous diseases, as well as of minor surgery and dentistry. Further particulars from Dr. H. T. Hewley, So Merion Square.

The Royal City of Dublin Hospital.—This hospital has recently been enlarged and improved. A special course of instruction is given in ophthalmic and auricular diseases. There are special wards for the treatment of diseases of the eye, of children, and of women, and practical instruction is given on diseases peculiar to women; there is also a separate building for infectious diseases. Clinical clerks to the physicians anddressers are appointed for each of the most deserving of the class. A new operation theatre, sterilising room, and anaesthetic room have been constructed in accordance with modern surgical requirements. A department for minor and light treatment of local injuries has been added. A resident medical officer is elected annually, and resident medical and surgical pupils are appointed from among the past and present students of the hospital. Operations are performed on Tuesdays, Thursdays, and Saturdays, at 10 a.m. Special classes for first year students. Full particulars can be had on application to Hon. Sec. Med. Board.

Sir Patrick Dun's Hospital is situated on the south-eastern side of the city, and about a quarter of a mile from the University School of Physic. It is conducted almost exclusively by the professors in that school. Formerly all University students were compelled to attend this hospital, which was purely a medical institution, but many years ago the obligation was removed, and the hospital is now for surgical and medical pupils. There is a special wing devoted to fever cases, and regular clinical instruction is given by the members of the medical staff throughout the winter and summer sessions. Special classes for students and licensed midwives, connected with the wards, are held all the wards during the months of October, November, and December. They will embrace the elements of medicine and surgery, including note-taking. Opportunities are also afforded to students for examining cases of throat, ear, and eye diseases as well as for performing minor surgical operations and bandaging. In the X-ray Department opportunities are given to the members of the hospital class of seeing the various applications of the X-rays to the diagnosis of disease; and all medical and surgical pupils have been made for practical instruction in anaesthetics. A department for dentistry has lately been added.

Water Miscoridical Hospital, Dublin.—This hospital, at present containing 345 beds, is open at all hours for the reception of accidents and urgent cases. Clinical instruction is given by the physicians and surgeons at 9 a.m. daily. A course of clinical instruction on fever is given during the winter and summer sessions. A certificate of attendance upon the meetings of the officers of the licensing bodies, may be obtained. Ophthalmic surgery is taught in the special wards and in the dispensary. Surgical operations are performed on Mondays, Wednesdays, Fridays, and Saturdays at 11 o'clock. Connected with the hospital are extensive dispensaries, which afford valuable opportunities for the study of general surgical diseases and accidents. Instruction is given in pathology and bacteriology. Three house physicians, six house surgeons, and four resident medical and surgical pupils are elected annually. Dressers and clinical clerks are also appointed, and certificates are given to those who perform their duties to the satisfaction of the officers. Lectures are delivered monthly for competition annually. For further particulars see prospectus. Certificates of attendance upon this hospital are recognised by all the universities and licensing bodies in the United Kingdom. A training school and a home for trained nurses have been opened in connection with the hospital.

Terms of attendance.—Nine months, £12 12s.; six winter months, £8 8s.; three summer months, £5 5s. Entries can be made with any of the physicians or surgeons, except to the Registrars at 1st, 9 and 11 Merrion Square. A prospectus containing in detail the arrangements for clinical instruction, prizes, etc., may be obtained from the Secretary, Medical Board.

Mercer's Hospital.—This hospital, founded in 1734, is situated in the centre of Dublin, in the immediate vicinity of the Schools of Surgery of the Royal College of Surgeons, the National University School of Medicine, and Trinity College. It contains 120 beds for medical and surgical cases, and arrangements have been made for the establishment of Cork Street Fever Hospital whereby all students of this hospital are entitled to attend the clinical instruction of that institution. There is a large out-patient department, and a special department for diseases peculiar to women. There are also special wards for the treatment of mental and nervous diseases.

During the past few years the hospital has undergone extensive alterations in order to bring it up to modern requirements. A house surgeon is appointed annually. Five resident pupils are appointed, each for six months, and clinical clerks and dressers are appointed monthly from among the most deserving members of the class. The certificates of this hospital are recognised by all the licensing bodies. For further particulars apply to Mr. Seton Pringle, F.R.C.S., 7, Fitzwilliam Place, Dublin.

St. Vincent's Hospital was established in 1834. It has 175 beds, and in connection with it there is a largely attended dispensary, and a nurses' institute. In addition to the ordinary clinical instruction, systematic courses of lectures are given in each of the departments of medicine and surgery, and are illustrated by cases in the hospital. The resident officers consist of two house surgeons, two house physicians and six resident pupils. Three clinical lectures are delivered daily in the wards, illustrated by selected cases, and medals and other prizes are awarded at the end of each session. A prospectus can be had from Mr. Kennedy, 68 Merrion Square.

Dr. Steevens' Hospital, situated at Kingsbridge, is one of the oldest and largest clinical hospitals in Dublin, and contains over 200 beds. A new dispensary and out-patient department has been completed and opened to patients. There is accommodation for twelve resident pupils, and six resident physicians, and the special departments, each of whom is supplied with a separate room. All information with regard to these appointments can be had from the Resident Medical Officer at the hospital. Licensing bodies recognise six months' residence as equivalent to a year's ordinary attendance at hospital. The manufactories and railway works in the neighbourhood supply this hospital with large numbers of accidents and other cases, while a special ward for venereal disease affords exceptional opportunities for the study of this important subject.

Jervis Street Hospital is the oldest established in Dublin. The present building was completed in 1896, since which time it has been open for the reception of patients. It includes a large surgical and medical dispensary, and eight new out-patient departments, which is now completed, includes special departments for the treatment of diseases of the skin,
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SPECIAL HOSPITALS.

The chief of the special hospitals of Dublin are the Rotunda, the Coombe, and the National Lying-In Hospitals, Cork Street Fever Hospital, the Royal Victoria Eye and Ear Hospital (amalgamation of St. Mark's Ophthalmic Hospital and the National Eye and Ear Hospital), the Dental Hospital, the Orthopedic Hospital, and the Children's Hospitals in Harcourt Street and Pembroke Road.

The Rotunda Hospital.—This is the largest and the oldest gynaecological and maternity hospital in the British Empire. The work performed by it is about three times greater than that of any other hospital in Ireland. The number of patients admitted to the hospital, and of those attended in the external maternity has increased enormously within recent years. The routine daily work comprises the attendance on lectures on midwifery and gynaecology; practice in gynaecological palpation; personal conduct of a parturient in both the external and the internal maternities; cystoscopic examinations; and attendance at the operative work of the hospital, in which the students assist. The hospital affords exceptional advantages to qualified students, and all women (with the considered competence) are permitted a certain amount of practical operative work—viz., use of forceps, curettings, perineorrhaphy, etc. A special afternoon class in gynaecology is held by the Senior Assistant, and one in special pathology by the Pathologist. Fee for each £2 2s. per month. The pathological laboratory has been an important feature of the hospital. Students can enter at any time for periods of six months or longer. They have the opportunity of attending at the hospital and seeing all the licensing bodies. The L.M. certificate is obtained by attendance at the hospital for six months, with the subsequent passing of an examination. A special certificate in gynaecology is presented to students who have the Master's approval. Paid clinical assistants are selected (from amongst those who have obtained the hospital L.M. certificate), for periods of six months. Women students can also reside in the hospital under conditions similar to men. The grounds of the hospital contain courts for lawn tennis and croquet, and a skating rink. The entire students' quarters have been rebuilt and refurnished, with electric light, new bath-rooms, reading-room, new billiard table, etc. Fees: £1 13s. 6d. per month, £2 9s. for six months, £3 18s. for twelve months, £4 12s. six months, £4 1s. single months other than the first, £4 4s.; board and lodging in the house per week £1 18s. Night students (not residing in house), £6 18s. for six months; £4 18s. for the third and fourth months. For further particulars apply to the Master, Dr. Henry Jellett, Rotunda Hospital, Dublin.

Coombe Lying-in Hospital.—This hospital, which devotes itself to the care of lying-in women, and to the treatment of diseases peculiar to women, was founded in 1824. The original hospital was a four-storeyed building erected in 1825. An up-to-date labour theatre and waiting ward were added in 1904. The new Gynaecological Hospital was finished in 1903. It contains two modern operating theatres. The former Gynaecological Hospital has been converted into sleeping rooms for resident pupils.

The Pembroke Dispensary was opened in 1911. The hospital is situated centrally in a very densely populated district. In addition to a very large gynaecological out-patient service, operations are delivered annually. The Master visits the maternity wards daily with the students at 9.30 a.m. This is followed by a lecture on midwifery. At 11 a.m. the gynaecological wards are visited; followed by this a lecture on gynaecology, physiology, and practical operations performed in the theatres. At 4 p.m. on Mondays, Wednesdays, and Fridays, the Master conducts a special class in practical obstetrics, including palpation, auscultation, palpation, pathology, and operations on the phantom. Lady medical students can reside in the hospital and take their ordinary housekeeper, Board and lodgings, £1 1s. per week. The students' quarters are comfortably furnished.

Fees.—External pupils (for full course of six months), £3 8s. This includes one month's residence in hospital. Intern pupils—first and second month, £4 4s.; each consecutive month, £3 3s.; six months and L.M. diploma, £18 18s. Board and lodging in the hospital, 18s. per week. Lady students, inter—first month, £5 5s.; each consecutive month, £4 4s.; six months and L.M. diploma, £18 18s. There is no extra charge for attendance at any of the dispensaries. Certificates of attendance from this hospital are accepted by all the licensing bodies.

The National Children's Hospital for the treat- ment of all non-infectious diseases peculiar to children, with which the Pitt Street Children's Hospital, founded in 1821, was amalgamated, contains 45 beds for the reception of cases of deformity and all other forms of surgical disease. There is a general dispensary for external patients held daily from 10 to 11. Operations are performed on Saturday at 12 o'clock. Practitioners and students can attend on application to Sir Lambert H. Oomsley, M.D., The National Children's Hospital, Temple Street, Dublin (under the care of the Sisters of Charity).—This institution is the largest children's hospital in Ireland. There are 100 beds available for patients; about 1,000 cases are admitted to the wards annually; and about 7,000 or 8,000 seen in the dispensary. The operating theatre has recently been opened. It is fitted and furnished in the best possible fashion for present-day surgery. Special attention is given to orthopaedic surgery.

The hospital is recognised for clinical instruction in the diseases of children by those licensing bodies which require a certificate of instruction in this important branch of medical education. A nursing home is in connection with the institution, and trained nurses are always available for private cases. Senior students or others requiring a post-graduate course at the hospital.
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The hospital should apply for full particulars to Dr. M. C. Stanton, hon. sec., or to any member of the staff.

THE INCORPORATED ORTHOPEDIC HOSPITAL, IRELAND.—This hospital was founded in 1876, and contains 50 beds, exclusive of every chair of deformity. Particulars may be obtained from the Secretary, at the Hospital.

The Royal Victoria Eye and Ear Hospital, Adelaide Road.—This hospital, which was opened in the early part of the last century, contains, the Maternity Hospital, the National Eye and the National Eye and Ear Infirmary. The hospital contains 100 beds. Clinical instruction in diseases of the eye and ear, including the use of the opthalmoscope and operations, is given daily from 10 till 1. Special classes for practitioners are arranged, and for the demonstration of cases, are formed from time to time.

The Incorporated Dental Hospital, Lincoln Place.—This hospital is the only special dental hospital in Ireland. It is officered by a strong staff of the dental surgeons of Dublin, and has a large clientele and extensive practice among the Dublin poor. The fees are $2.12.5., for each year's Dental Hospital practice, and proportionately smaller fees for shorter periods and for students. The term of payment in dental mechanics required by the various licensing bodies may be taken in the recently enlarged Hospital Laboratory.

Particulars may be obtained from the Dean.

DEPARTMENT OF DISEASES OF THE SKIN AND CANCER, Holles Street.—Senior students are admitted free to the practice of this hospital, which has a large out-patient attendance, with 15 beds for intern cases. Classes of instruction will be given at regular intervals during the winter and summer sessions in the use of the Finsen light, X-rays, high frequency currents and radium, with demonstrations on (1) the production and use of the Röntgen rays, (2) electric currents, direct and alternating, with description of resistances, rectifiers and transformers; (3) accumulators, their construction, use, and methods in charging; (4) vacuum tube, choice of tube for particular kinds of work; fluorescent screen, and how to localise foreign bodies.

BELFAST HOSPITALS.

Royal Victoria Hospital.—Established 1764; incorporated by Royal Charter, 1875 and 1893. New hospital opened, September 17th, 1903, 300 beds; Convalescent hospital, 22 beds; Children's Hospital, 83 beds; Consumptive Hospital, 10 beds. Clinical instruction in medicine and surgery is given each morning by the staff. "

Mater Infirmorum Hospital.—Established 1833. 160 beds. The New Mater Hospital, which was erected at a cost of over $50,000, was formally opened on April 23rd, 1900. During the year the intern patients numbered 1,225; accidents, 1,270; and cases treated in the Dispensary, 22,557; 380 surgical operations were performed. The total number of patients who received treatment was 27,884, being an increase of 1,417 as compared with the year 1904. A notable feature is in the number of accident cases, as the hospital is conveniently situated in proximity to a large working-class population, and within easy reach of most of the public works.

The Belfast Maternity Hospital (Incorporated).—Established 1864. 30 beds.—The practice of the Maternity Hospital, the certificate of which is recognised by all the universities and colleges, &c., is open to students. The fee for the session is $2.2.5. Resident nurses are also received for training for a period of six months, and a diploma given which is recognised by public authorities. A course in the use of the opthalmoscope and the treatment of cases is arranged in the Central Medical Board. Conditions for such an application to the Matron. During the year 1911, 567 patients were treated in the hospital, and 556 patients at their own homes. Besides this, 1,867 patients were treated in the infirmary or special ward. Clinical lectures and bedside demonstrations are given by members of the staff during both the winter and summer sessions. Students wishing to attend should apply to Dr. H. D. Osborne, 32 Lonsdale Terrace, Belfast, Hon. Secretary to Medical Staff.

Note.—Hospital was rebuilt in 1904 and removed to new premises in Townsend Street. A Resident Surgeon is elected periodically.

Ulster Eye, Ear, and Throat Hospital.—Established 1871. New hospital opened 1874, 30 beds.

CORK HOSPITALS.

National Charitable Infirmary.—Established 1774; 110 beds. Special wards for treatment of diseases of women and children. The external department is largely made use of, and the number of accidents treated is very large. Clinical instruction is given daily from 9.30 a.m. to 12 noon. An operating theatre has recently been added at considerable expense.

Cork South Infirmary and County Hospital.—Founded 1773. The hospital contains 100 beds, available for clinical instruction, and is divided into two surgical wards devoted to the treatment of diseases peculiar to women and children, and a large medical and surgical external department. Clinical instruction is given daily during the session.
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from 9.30 to 11.30, in both the medical and surgical wards, and clinical lectures are regularly given. Stomachs are properly examined in the methods of using the rays by practical demonstration on the cases requiring their use.

For further particulars apply to Norman J. Townsend, hoii, sec.

VICTORIA HOSPITAL FOR WOMEN AND CHILDREN.—
Established 1874. 70 beds. A large amount of work is done in this hospital to relieve the poor of Cork, Kerry, and other counties.

* COUNTY AND CITY OF CORK LIVING-IN HOSPITAL.—
Established 1795.

* EYE, EAR, AND THROAT HOSPITAL, Western Road.—
Incorporated 1898. 22 beds. In-patients treated during year, 454; out-patients, 4,218. Clinical Instruction is given during college hours. Special demonstrations in the use of the ophthalmoscope, laryngoscope, &c., are given from time to time.

* FEVER HOSPITAL AND HOUSE OF RECOVERY.—
Established 1804. 110 beds.

* MATRIMONY.—Established 1872.

* MERCY HOSPITAL.—Established 1857. 80 beds.

* GALWAY HOSPITAL.—

* COUNTY HOSPITAL.—Established 1786. 60 beds.

* No answer to our request for information received from these hospitals.

IRISH PUBLIC SERVICES.

The Poor-Law Medical Service.

For several years past the unsatisfactory nature of the Irish Poor Law Medical Service, as a career for young practitioners, has been evident. In addition to the petty annoyances, the laborious and harassing duties, and the ever-increasing amount of clinical work which the new orders of the Local Government Board impose from time to time, the medical officers are underpaid, their salaries being totally out of proportion to the duties discharged, and in the majority of rural districts barely sufficient to cover the out-of-pocket expenses, such as are incurred in the keeping of a horse and man, and other servants. The low pay is the poor law medical officer bound to the discharge of his duties that unless incapacitated by sickness or other cause, or with the permission of the guardians expressly granted, he cannot leave his district for a single day, even if he makes provision for the performance of his duties in his absence by a brother practitioner. It is right to point out to young practitioners the following facts: (1) That the Poor Law Medical Service is one in which there is no promotion. (2) That it is a service where few facilities exist for originating, and still less for furthering medical culture, especially in the rural districts. (3) That, while medical education has become wider in its requirements and more costly and difficult to procure, almost the same rate of payment as was given to less educated men forty years ago is still offered, and this, too, at a time when lucrative private practice is more difficult to obtain. (4) That there is no compulsory superannuation, and, as a consequence, many old and infirm men are forced to remain in the service long after they have rendered some years of his to discharge the duties, second class, and in the face of extreme poverty and perhaps the workhouse itself staring them in the face.

There are about 160 workhouse and about 80 poor law medical officers. The salary is said to average about £14.

The dispensary medical officer is also ipso facto the registrar of births, marriages, and deaths, and medical officer of health for the district, under the Public Health Act, passed in 1873 and amended in 1878. The former office, in country districts, yields between 22s. 6d. and £10 a year, and the enrolls of the latter appointment in very few cases reach £20, averaging about £12. The medical officer is also vaccinator for the locality, and is required to vaccinate everyone who applies. He is paid, during long vacations, his salary, by the guardians, and the sum total of these fees varies, according to the population of the district, from £1 to £100, an average for the provinces being about £60.

Qualifications.—The qualifications required by the Local Government Board are a licence in surgery, in medicine, and in midwifery; but registration in the "Medical Register," if effected since the passing of the Medical Act, in 1866, fulfils all requirements. Candidates must be 21 years of age. Candidates recently qualified must possess a certificate of competence in vaccination.

Duties.—The duty of the dispensary doctor is twofold. He has to attend his dispensary or dispensaries on a given day, and visit in the course of the day or night sick persons for whose relief a visiting ticket has been issued and to continue his attendance as often as may be necessary to the termination of the case. Moreover, he has many books to keep and a multitude of returns to make, and in most districts he has to make up all the medicines for the poor.

Workhouse Hospitals.—The number of unions in Ireland is 150, to each of which is attached one or more medical officers, appointed and controlled by the board of superintendents in five or six years' service as the dispensary medical officer. The salary is about the same as that of the dispensary doctor, and the duties of a more easy and satisfactory description, inasmuch as they are confined to daily workhouse business and no night visits out of doors or long journeys across the country are involved.

The Irish Lunacy Service.

This service, at present, affords a comfortable livelihood for 22 resident medical superintendents and 32 assistants. The superintendent receives salaries and allowances ranging, according to the number of inmates of the asylum, from £500 to £1,000 a year, and the assistant, from £300 to £500 a year, salaries and emoluments averaging about £200 to £300 a year. There are also a few visiting physicians receiving about £120 a year, but this class of officer is being allowed to die out, and no new appointments will be made. The medical superintendents and assistants must devote their whole time to their duties.

The appointments of medical superintendents are in the hands of the asylum committee, with the proviso that no one shall be appointed who is not a registered medical practitioner in five years' service as assistant. The assistant is also appointed by the committee. In addition to these officers, there are, in certain larger asylums, clinical residents, who receive about £50 a year and full allowances. These appointments afford excellent introduction to the higher places in the service.

Tuberculosis Service.

Most of the county and county borough councils are proceeding to appoint tuberculosis officers to carry out work under the Tuberculosis Prevention Act (1908) and the National Insurance Act (1911). The duties proposed are usually (1) to act as superintendent of the county sanatorium; (2) to conduct one or more tuberculosis dispensaries; (3) to act as consultant with practitioners in regard to tuberculosis patients; (4) to conduct a bacteriological laboratory; (5) to act as adviser to the local insurance committee and the county council on tuberculosis; (6) to organise and conduct anti-tuberculosis work generally in the county or county borough. The tuberculosis officers must give their whole time to their duties. The salaries vary from £500 to £900 a year, with an allowance for expenses. The lower figure must be regarded as quite inadequate, and candidates before applying for such posts should satisfy themselves that the conditions of service have been approved by the local medical profession.

National Insurance Work.

The National Insurance Act (1911) has provided a certain amount of employment for medical men. As the question of extending the medical benefit of the Act to Ireland is still under discussion, all present arrangements are of a purely temporary character. The conditions of many of the appointments made by the Insurance Commissioners are contrary to profes-
In Scotland medical education is centred round the four Universities. It is very much a matter of convenience, or of fancy, which University the student seeks. Naturally, to those with no local ties, the Edinburgh degree proves attractive, and the number of graduates from overseas who have chosen Edinburgh University is doubtless growing. It is plain that to the University degrees, one other qualification to practise can be obtained in Scotland—the joint licence of the Royal College of Physicians, the Royal College of Surgeons of Edinburgh, and the Faculty of Physicians and Surgeons of Glasgow. The standard of examination for the triple qualification (as it is called), though lower than that of the Universities, is yet high enough to test the abilities of the candidates, if one may judge from the number of rejections. The standard, too, is being gradually raised. Of late years there has been a falling off in the number of candidates for the triple qualification, and the majority are not Edinburgh-trained students, but hail from other schools.

The diminution of the number of Scottish students is generally ascribed to the operations of the Carnegie benefaction enabling men who formerly would have been unable to do so, to take the University degree. One candidate for Scottish medical schools is the existence, side by side with the University, of extra-mural schools, independent in every respect of the University, and recognised by the latter as schools whose classes qualify for graduation. Both the extra-mural and the University system, just as the triple qualification has, from the Carnegie bequest, and there is reason to believe that under modern conditions it is unlikely to occupy such a prominent place in the future as in the past. The proposed introduction by the Universities of a composition fee for the medical curriculum is viewed by the extra-mural lecturers with dislike, because it is feared that if it comes into effect the number of extra-mural students will again decline.

It must be allowed that the tendency towards concentration of teaching under the University is stronger than in the past. The increased cost of equipment for teaching, in particular, renders it impossible for an unendowed school to compete with a University. This applies especially to the preliminary and purely scientific subjects of the curriculum up to and including physiology and pathology. It is doubtful whether it will be possible for such subjects be adequately taught by private individuals who have to depend largely or wholly on class fees for their remuneration.

During the last few years the medical curriculum has been modified by a revision of the system that has undergone, and is still undergoing, great changes for the better. An agreement has been entered into by the managers of the Infrmary and the University of Edinburgh, under which the facilities for clinical teaching, and for pathology, are much enhanced. The new arrangements for teaching the special subjects (all of which are now compulsory) will undoubtedly make for efficiency, by distributing the students and preventing overcrowding. It may now be said that the education given in the Scottish schools generally has no need to fear comparisons. The dispensary system is peculiar to Scotland; what we have is a dispensary system open to the public in the English sense of the word. A dispensary is an out-patient clinic, separate from any hospital, staffed by honorary medical officers, and attended for instruction by students. Not the least important part of the student's curriculum is the instruction in practical medicine which outdoor patients in their own homes under the same conditions as obtain in practice among the lower working classes, University students have the privilege of working under extra- as well as intra-mural teachers, with whom they are engaged full time are limited to the latter. It is not uncommon, however, for a man to come up intending to take the licence, and to change his mind and go in for a degree, or vice versa, and this can usually be done.
without much trouble or added expense, provided the change is made early in the course. The main problem in the Edinburgh curriculum, and many students are in the habit of going
to Dublin or Glasgow for their practical midwifery.
When all is said and done, however, the Scottish graduate or diplomate receives an excellent training in his profession, and his course is long enough in theoretical subjects, is
defective in practical work. It is impossible to make any
very definite statement as to the relative cost of a
medical education in the different institutions, as costs are
so much dependant on personal circumstances, but a rough
estimate will be made. The Carnegie Trust has fixed the
minimum fee for the M.B. degree at £146; but almost
every student finds it practically necessary to attend
additional classes.

POST GRADUATE TEACHING.
In Edinburgh, past graduate classes covering prac-
tically the whole field of medicine take place annually
from the middle of July to the end of September.
Particulars may be obtained from the Secretary, Post-
Graduate Courses in Medicine, University New Build-
ing. In Glasgow there are also post graduate classes
in connection with the Western and Royal Infirmarys.
During the spring of this year a committee was
appointed, on the recommendation of Professor Paton,
Bird, to investigate the possibilities of spreading the
influence of the International Board for Post Graduate Instruction in Berlin, to consider
the opportunities of developing this side of medical work
in Glasgow, but its labours have not yet been pro-
ductive of any change in this year.

THE CARNEGIE TRUST.
Under the Carnegie Trust payment is now made
of the whole or part of the ordinary class fees exigible by the Universities from students
of Scottish birth or extraction, and of six
years of age or over, who are domiciled in Scotland.
An Education scholarship, after the age of fourteen years, at
State-aided schools in Scotland, or at other schools and
institutions in Scotland as are under the inspection
of the Scottish Education Department.

The Trust provides for the payment of the class fees
of the above students proceeding to graduation in medi-
cine or science. Application for payment of class fees
under the conditions of the Trust should be made to the
Secretary, Sir William S. McCormick, Merchants' Hall,
Edinburgh.

UNIVERSITY OF EDINBURGH.
Four degrees in medicine are granted; Bachelor of
Medicine (M.B.), Bachelor of Surgery (Ch.B.), Doctor
of Medicine (M.D.), and Master of Surgery (Ch.M.).
The first two must be taken together, the last two may
be taken separately.
These are additively to the degrees of Bachelor of
Medicine and Bachelor of Surgery who has not
been engaged in medical study for five years
after passing a preliminary examination in general
knowledge in accordance with the medical ordinances.
A degree in Arts or Science of a British or other recon-
ised University is held to supersede such preliminary
examination. The subjects included in this general
examination are English, Latin, elementary mathe-
matics, and Greek, or French, or German.
The preliminary examination is open on October 1st and extends to not less than 30 teaching weeks,
divided into three terms. Two terms are equivalent to
one winter session, and one term to one summer
session. Two years of the five must be spent at the
University, the remaining three years at any other
Medical School recognised by the University
Court.
During each of the 12 terms preceding the fifth or
final year the student must have attended one of
more practical classes on the subject of the curriculum.
He must attend chemistry during two terms, practical
chemistry, botany, zoology, physics, forensic medicine,
and public health during the term, anatomy during
two terms, pathology and physiology, each three terms,
midwifery, medicine, and surgery during two terms
each. He must attend a course of twenty-five lectures
practical pharmacy, or have dispensed drugs for a period
of three months in a recognised hospital or dispensary.
He must attend a nine months' course in clinical
medicine and in clinical surgery. During the fifth or
final year he must be engaged in clinical practice for at
least nine months. In all, before graduation, he must
have done hospital work for at least three years, and
have acted as clerk in the medical and surgical wards
and attended for six months the practice of a dis-
patch officer or any other physician. He must have
studied operative surgery, mental diseases
post-mortem, fevers, diseases of the eye, diseases
of children, of the ear, nose and throat, and of the
skin, vaccination, practical anesthetics.
He must also have at least one year of labour
under the superintendence of a registered medical
practitioner, and 12 such cases, and, for at least three
months, the practice of a midwifery hospital.
Each candidate is examined both in writing and
oral work.

1. On zoology, botany, physics and chemistry.
2. On anatomy and physiology.
3. On pathology and materia medica and ther-
  apy.
4. On medicine, surgery, midwifery, forensic medi-
  cine, and public health.
The examination of candidates beginning in winter
is held in the following terms: for the degrees of
Bachelor of Medicine and Bachelor of Surgery, who is of
the age of twenty-four years, or who has passed a certicate of having been
engaged in medical practice or in the medical
services, or for two years in practice other than
purely medical. For the degree of Doctor of Medicine or Bachelor of
Surgery, who is of the age of twenty-four years, and who has
been engaged in medical practice or in the medical
services, or for two years in practice other than
purely medical. The candidate shall submit to the Faculty of
Medicine, in addition to any branch of knowledge com-
prised in the professional examinations for the degrees
of Bachelor of Medicine and Bachelor of Surgery. The
candidate will also be examined in clinical medicine and
must show practical acquaintance with advanced
methods of diagnosis; he must have examined mental
and nervous diseases of children under the superintendence of those who did
not pass in these subjects with the rest of their
preliminary examinations.
The regulations for the degree of Ch.M. are very
similar.

FEES.—The fee to be paid for the degrees of Bachelor
of Medicine and Bachelor of Surgery is twenty-two
guineas. The fee for the degree of Doctor of Medicine
or of Master of Surgery is ten guineas (Old Regula-
tions, 4s 6d.).
The total expense of the curriculum, including
examination and matriculation fees, is about 190.

Among scholarships, &c., open for competition during
the session 1914-15, are the following:—Vans
Dunlop scholarships value £100; Buchanan scholar-
ship in midwifery, value £25; Monat scholarship

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in practice of physic. £27: Allan Fellowship in clinical medicine and surgery, £35. There are also a great many other bursaries, fellowships and prizes open during the session of 1913-14 and for the details governing entry for these the University Calendar (James Thin, South Bridge, Edinburgh) should be referred.

Graduation in Public Health.—Degrees (B.Sc. and D.Sc.) are also conferred in Public Health. Candidates must be graduates in medicine and must matriculate for the year in which they proceed for examination. They must (1) have passed at least twenty hours a week during a period of eight months in a recognised Public Health laboratory—five of these months must be spent consecutively in the Public Health Laboratory of the University of Edinburgh (Tusher Institute); and (2) have attended a course of lectures on hygiene, in addition to that qualifying for graduation in medicine, and one on geology.

Candidates for the second examination are not admitted until eighteen months have elapsed after having passed M.B., Ch.B., or sooner than six months after the first examination. They must have attended two courses of Public Health, one dealing with medicine, the other with engineering in relation to public health. They must also have studied practical sanitary work under a Medical Officer of Health and have spent not less than one month in a fever hospital, and three months' instruction in mensuration and drawing.

Fees for Science Degrees: B.Sc., first examination, £3 18s.; B.Sc., second examination, £3 3s.

Diploma in Tropical Medicine.—The University Diploma in Tropical Medicine and Hygiene is conferred on graduates of the university, and on registered practitioners who have resided abroad and who receive permission of the Senate to become candidates for the diploma. The course includes practical bacteriology, tropical diseases and hygiene, the zoological character and history of disease-carrying insects and venomous animals, clinical instruction at an hospital for tropical diseases. The examination is held in December and June, the fee being £1 4s. A special certificate in Tropical Diseases is also granted under less stringent regulations, and after a shorter course.

Degree in Psychiatry.—The course extends over one year, during which candidates must attend classes on (1) Anatomy and (2) Physiology of nervous system; (3) Pathology; (4) Bacteriology in relation to nervous system; (5) Pathology of the Nervous System; (6) Neurology; (7) Psychiatry. There are two examinations, one on anatomy, physiology, pathology and bacteriology, the second on the remaining subjects. The fees amount to about thirty-seven guineas.

University Hall, Edinburgh.—In Edinburgh there are numerous halls of residence for under-graduates. In each house there are private studies with or without bedrooms, and common sitting and dining rooms. The charges are moderate. It is a satisfactory indication that in University Hall that many graduates live in it and are willing to help or coach the undergraduates for moderate fees. To gain admission two references must be produced from past or present residents, or other suitable person. Those are concerned have also voted on a house meeting, and any unruly member may be expelled by a similar meeting of the residents.

Medical School for Women.—Classes for women are now held at the College of Surgeons and the New School for Women, which were opened by the University. The First Inaugural Address was delivered on 5th November, 1913, by the M.P. for the City of Edinburgh South. The Medical School for Women was presented with a gold cup by the University to give lunches to its bedside classes.

UNIVERSITY OF GLASGOW.

The University of Glasgow is both a teaching and an examining body, but admits to examination only those candidates whose degree courses are approved by the University. Within certain limits provision is made for accepting instruction given by recognised medical schools and teachers; but not less than one half of the subjects other than clinical must be taken in this University. The candidates have to register with the University or College, and at least two years of the course must be taken in Glasgow University. Four degrees, open both to men and to women, are conferred—M.B. and Ch.B. (always conjointly), M.D. and Ch.M.—and the necessary preliminary examinations are passed in (1) English, (2) Latin, (3) Mathematics, and (4) an Additional Language, namely, Greek, French, German, Italian, or another approved language, with possible options to students whose native tongue is not English, and, on passing, students must register in the books of the General Medical Council. For M.B. and Ch.B. a curriculum of five years is required. A syllabus with full details of the curriculum and of the preliminary examination may be had, post free, on application to the Register.

Fees for the M.B. and Ch.B. are £23 2s.; for M.D. £15 15s., and for Ch.M. £15 15s. For hospital attendance there is an initial fee of £10 10s., with a further fee of £2 2s. for each winter session, and £1 1s. for each summer session, and an examination fee of £5. There are very extensive general hospitals in the city, which afford exceptional opportunities for clinical work, while the Royal and other asylums, the City Fever Hospitals, the Maternity Hospital, the Sick Children's Hospital, the Royal Infirmary, &c., give facilities for the study of special branches.

The degrees of B.Sc. and D.Sc. in Public Health and of B.Sc. in Pharmacy, are also now conferred. But the University has made considerable efforts to extend the facilities for laboratory accommodation and equipment, to augment its teaching staff, and to encourage postgraduate and research work. Within recent years there have been provided new laboratories in the departments of pathology, anatomy (costing £13,000), chemistry, and surgery (costing £9,000), while new laboratories, costing, with equipment, upwards of £50,000, have been erected for the departments of physiology, materia medica, and medical jurisprudence and public health.

Bursaries and prizes to the annual amount of about £2,000 are annually awarded by the Royal Infirmary, including an Arthur bursary for women, £30 for three years.

Several bursaries open to students in any faculty are not infrequently held by medical students, and Scholarships and Fellowships to the annual amount of £1,500 may be obtained by medical students who have gone through the Arts course.

Queen Margaret College for Women.—Founded in 1883 by the Glasgow Association for the Higher Education of Women, which was formed in 1877 with the object of bringing University instruction, or its equivalent, within the reach of women, Queen Margaret College in 1893 added its faculty of Arts a School of Medicine for Women. This was organised entirely on University lines, and with the view of preparing for University degrees and competent candidates for the Ordinance of the University Commissioners authorising the Scottish Universities to admit women to instruction and graduation, Queen Margaret College became the Women's Department of the University of Glasgow, its classes in medicine taken for the M.A., in conjunction with the University were recognised as qualifying for the degree. A full course of study for M.B. and Ch.B. is given by University professors and lecturers, with excellent facilities for hospital and dispensary work and for private practice. A Hall of Residence for the students was founded in 1894. Fees for the classes at Queen Margaret College may be paid by the Carnegie Trustees; and several bursaries are open to women students of medicine.

The Winter Session begins on 11th October. The
prospective can be obtained from the Ministry of Education, Government of Scotland.

UNIVERSITY OF ABERDEEN

The University of Aberdeen possesses under the charter the highest privileges granted to any educational institution. It confers degrees in the three faculties of Arts, Science, Divinity, and Medicine. It also grants degrees in civil and mining engineering and in agriculture. The university, moreover, is provided with two lecture halls in the three faculties of arts and surgery. The more the professors devote their time to the teaching of their own subjects the more they are enabled to give their attention to the study of modern science and technology, which has recently acquired considerable importance. The degree of M.B. is conferred by the university, but in separate exercises. The examinations in physical and moral science, as well as in the College of Science, are held separately, and the medical and surgical examinations are also separate. The degree of M.B. must be obtained by all candidates for the degree of M.D. at the same time.

University of Edinburgh.

The University of Edinburgh is one of the oldest universities in Scotland, and is the most important centre of education in the country. It confers degrees in arts, medicine, law, and science. The university is provided with a medical school and a college of medicine, and the medical examinations are held separately. The degree of M.B. must be obtained by all candidates for the degree of M.D. at the same time.

University of St. Andrews.

The University of St. Andrews is one of the oldest universities in Scotland, and is the most important centre of education in the country. It confers degrees in arts, medicine, law, and science. The university is provided with a medical school and a college of medicine, and the medical examinations are held separately. The degree of M.B. must be obtained by all candidates for the degree of M.D. at the same time.

University of Glasgow.

The University of Glasgow is one of the oldest universities in Scotland, and is the most important centre of education in the country. It confers degrees in arts, medicine, law, and science. The university is provided with a medical school and a college of medicine, and the medical examinations are held separately. The degree of M.B. must be obtained by all candidates for the degree of M.D. at the same time.
treatment. Six resident qualified assistants and an outdoor obstetric assistant are appointed annually. Clinical clerks and dressers are attached to the physicians and surgeons, and students are appointed to assist in the post-mortem room. The instruction given at the said College is comprised of practical instruction given by the Scotch Universities, the University of London, the University of Cambridge, the Royal University of Ireland, and by the Royal Colleges of England and Scotland. Hospital tickets for the infirmary, £2 2s. each session, or £1 1s. a year. Perpetual, £10 10s. in one payment, or £10 10s. by instalments.

Further information will be found in the Calendar of the University published by Messrs. Blackwood and Sons, Edinburgh, the "Scotch Calendar," published by the Royal College of Physicians and Surgeons of Glasgow, and the "Royal College of Physicians and Surgeons of Scotland." The examination can be had from the Dean of the Medical Faculty, Professor J. A. Kynoch.

THE COLLEGES.
The Royal Colleges of Physicians and of Surgeons of Edinburgh, and Royal Faculty of Physicians and Surgeons of Glasgow have arrangements by which the student may obtain the diploma of the co-operating body, and can register three diplomas under the Medical Acts—viz., Licentiate of the Royal College of Physicians of Edinburgh, Licentiate of the Royal College of Surgeons of Edinburgh, and Licentiate of the Royal Faculty of Physicians and Surgeons of Glasgow.

The three bodies grant their single qualifications only to candidates who are already registered as possessing another and opposite qualification in medicine and surgery as the case may be.

REGULATIONS OF THE CONJOINT BOARD OF THE ROYAL COLLEGES OF PHYSICIANS AND SURGEONS OF EDINBURGH AND THE ROYAL FACULTY OF PHYSICIANS AND SURGEONS, GLASGOW.—The candidate must produce certificates of having attended the following course of lectures, the certificate distinguishing the sessions and the months in which the courses were attended, Anatomy, six months; practical anatomy, twelve months; chemistry, six months; practical chemistry, three months; materia medica, three months: physiology, six months; medicine, six months; clinical medicine, nine months; surgery, six months; clinical surgery, nine months; midwifery, three months; medical jurisprudence, three months; pathology, three months. The candidate must also produce the following certificates:—(a) Of having attended six cases of labour under the guidance of a full-qualified practitioner; (b) Of having attended for three months instruction in practical pharmacy. The teacher must be a member of the Pharmaceutical Society of Great Britain, or the Superintendent of a laboratory of a public hospital or of a hospital for a fee of £5. (c) Of having attended for twenty-four months the medical and surgical practice of a hospital, containing eighty patients, and possessing distinct staffs of physicians and surgeons, and of having assisted for six months the practice of a public dispensary, or of having assisted for six months the practice of a registered practitioner. (e) Of having been instructed in vaccination.

First Examination, Fee £5.—The First examination shall embrace chemistry, physiology, and elementary botany, and shall not take place sooner than the end of the first year, including a winter and summer session. Candidates who desire to enter for the first professional examination must produce certificates of attendance on chemistry, practical chemistry, anatomy, and physiology, for the following three years.

Second Examination, Fee £5.—The Second examination embraces anatomy and physiology and shall not take place before the termination of the summer session of the second year of study. Candidates must produce certificates of attendance on anatomy, practical anatomy, and physiology.

Third Examination, Fee £5.—Comprises the subjects of pathology, materia medica, and pharmacology and advanced anatomy.

Final Examination, Fee £15.—The Final examination embraces medicine (including therapeutics and medical anatomy, clinical medicine); surgery (including surgical anatomy and surgical pathology); clinical surgery; midwifery and gynecology, medical jurisprudence, and forensic medicine, and shall not take place before the termination of the full period of study.

Subjects of Preliminary Education: (1) English grammar and composition; (2) Latin, grammar, translation from specious authors and easy unseen translation; (3) arithmetic, fractions; (4) algebra, to simple equations; (5) geometry, to the first two books of Euclid; (6) elementary mechanics of solids and fluids, comprising the elements of statics, dynamics, and hydrostatics; (7) one of the following—Greek, Hebrew, Latin; (8) any other modern language; (9) logic; (10) botany; (11) zoology; (12) elementary chemistry. Qualification in Public Health.—The College of Physicians, in association with the Royal College of Surgeons of Edinburgh and the Royal Faculty of Physicians and Surgeons of Glasgow, confers a certificate of competency in public health. The examinations are held in April and October. Fee £10 10s. For the special regulations of the Royal College of Surgeons of Edinburgh, intending candidates should apply to Dr. James Robertson, 48 George Square, Edinburgh, and for those of the Royal College of Physicians, to the Secretary.

The Fellowship of the Royal College of Physicians of Edinburgh is conferred only by election, and the candidate must have been a candidate for at least three years, and have attained the age of twenty-seven years.

The Membership is conferred only on a licentiate of a college of physicians of graduate in medicine of a British University, or on one who has obtained his degree in a University in the United Kingdom, and has attained the age of twenty-four years and shall have passed an examination on: (1) medicine including therapeutics; (2) one of the following optional subjects, in which a high standard of proficiency is expected:—(a) a department of practical pharmacy; (b) a department of clinical medicine; (c) pathology; (d) medical jurisprudence; (e) public health; (f) midwifery; (g) gynecology. The examination is of a searching character.

The fee for membership is £35 guineas, for fellowship £38 guineas, with a stamp duty of £2 10s. 10d. in all.

The licence, or single qualification in medicine, is conferred on candidates who already possess a recognised qualification in surgery. The examinations for this licence are held on the first Wednesday of each month, and are conducted by the Secretary, in medicine, materia medica, midwifery and medical jurisprudence. The fee is £15 15s., and intending candidates should communicate with the Secretary of the College at least eight days before the date of examination.

The Fellowship of the Royal College of Surgeons of Edinburgh is conferred (except under certain conditions) as to age and professional standing only on candidates who have passed a special examination, and have previously obtained a diploma from the college, or from either of the Royal Colleges of Surgeons of England, or the Royal Faculty of Physicians and Surgeons of Glasgow, or the surgical degrees of the Universities of Great Britain, and who are twenty-five years of age. The subjects for examination for those who are already Licentiates of the College and are registered in practical surgery, clinical and operative surgery and, one optional subject.

Those who are not Licentiates of this College: on principles and practice of surgery, clinical and operative surgery, surgical anatomy, and one optional subject; and in such supplementary subjects as have not, in an adequate manner, been included in the examination for the registrable surgical qualification possessed by such candidates, and which are required in the examination for Licentiates of this College.

The subjects diversely embraced embrace: (a) Surgery, special branches; (b) advanced anatomy and physiology; (c) surgical pathology and morbid anatomy; (d) midwifery and gynecological medicine and surgery; (e) medical jurisprudence and surgery; (f) practice of medicine and therapeutics. The examina-
tions are written, oral, and practical. Three weeks' notice must be given to Mr. James Robertson, from whom full particulars as to certificates required may be obtained. The following qualifications are all the diploma of Licentiate of the College, and £42 to others (no stamp duty is payable on the diploma). Registered practitioners, aged not less than 40, who have been in practice for not less than ten years, and who have highly distinguished themselves or who have highly distinguished themselves in any branch of practice, may under special circumstances be elected without examination. Women are not admitted to the Fellowship of either college.

Licence.—The examination embraces the principles and practice of surgery (including operative surgery and surgical pathology), clinical surgery, and surgical anatomy, and shall not take place before the termination of the full period of study. Fee, £15 13s.

DENTAL DIPLOMA.—Every candidate for the dental diploma must have attended the general lectures and courses of instruction required at a University, or an established medical or dental school recognised by the College as qualifying for the diploma in surgery. The fee is £10 0s.

Edinburgh Royal Infirmary.—Clinical instruction is afforded at this institution, which contains 900 beds under the supervision of professors of the University and the ordinary physicians and surgeons of the Infirmary. Special instruction is given on diseases of women, including venereal diseases, and diseases of the eye, ear, and skin, in addition to the large and varied number of ordinary medical and surgical cases which in a great industrial centre daily require attention. Students at the college and hospital get the benefit of dispensary experience free of charge, and also better professional discipline and receiving clinical experience can be found than in the Glasgow Royal Infirmary. Clinical instruction in midwifery is given in the new Maternity Hospital by Prof. Jardine.

The appointments are as follows:—
1. Resident physicians and surgeons are appointed and live in the house free of charge. There is no salary. The appointment is for six months. These appointments may be renewed.
2. Non-resident physicians and surgeons (in the special subjects and for out-patient work) are appointed for six months. These appointments are renewed.
3. Clerks and dressers are appointed by the surgeons and are paid a salary of 15s. per month. No fees are payable for any surgical or medical appointment.

SCHOOL OF MEDICINE OF THE ROYAL COLLEGES, EDINBURGH.

The government of this school, established in 1595, is now vested in a board which is equally representative of the two Royal Colleges and the Lecturers, the school being styled The School of Medicine of the Royal Colleges, Edinburgh. The lecturers deliver qualifying courses of instruction of the same duration and scope as those delivered within the University, while a large number of non-qualifying courses on special subjects of interest to medical practitioners are also delivered both in the winter and summer sessions. The students who attend the classes of the School of Medicine are largely students proceeding to the University degree, as well as those who are intending to take other degrees in the University, and such as are able to take the examinations for the degrees of the College. An application to the Dean of the School, 21 Bristo Place, Edinburgh.

The minimum cost of the education in the School of Medicine for the triple qualification of physician and surgeon from the Royal Colleges of Physicians and Surgeons of Edinburgh and the Royal Faculty of Physicians and Surgeons of Glasgow, including the fees for the joint title, being termed known as the Glasgow Royal Infirmary School of Medicine. The Medical Faculty occupies buildings erected for the purpose of the medical school in the grounds of the hospital. The college is equipped with complete electric light apparatus and a beautiful electromedical lantern. Attendance on the courses in St. Mungo's College qualifies for the medical degrees of the Universities and the medical and surgical colleges in accordance with their regulations. A syllabus, giving details as to classes, fees, &c., may be had on application to the Secretary of the Medical Faculty.

The Royal Infirmary, which is at the service of the College for teaching purposes, is one of the largest general hospitals in the kingdom. It has 600 beds available for the medical instruction in addition to an ophthalmic department, and it has special wards for diseases peculiar to women, venereal diseases, burns, and diseases of the throat, nose, and ear. At the dispensary special advice and treatment are given in diseases of the eye, ear, nose, and skin, in addition to the large and varied number of ordinary medical and surgical cases which in a great industrial centre daily require attention. Students at the college and hospital get the benefit of dispensary experience free of charge, and also better professional discipline and receiving clinical experience can be found than in the Glasgow Royal Infirmary. Clinical instruction in midwifery is given in the new Maternity Hospital by Prof. Jardine.

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3. Clerks and dressers are appointed by the surgeons and are paid a salary of 15s. per month. No fees are payable for any surgical or medical appointment.

ROYAL INFIRMARY.—Fees: (1) Hospital attendance, dispensary, &c., perpetual ticket, £7 7s.; season ticket, six months, £2 2s.; three months, £1 1s.; separate payments amounting to £7 7s. entitle a student to a perpetual ticket on returning previous season tickets. (2) Clinical instruction, six months, £3 10s.; three months, £1 13s.

DENTAL CURRICULUM.—Students studying with a view to the dental diploma can obtain instruction in the following subjects: Physics, chemistry, anatomy, physiology, surgery, practice of medicine, and materia medica. The special dental courses may be obtained in the Dental School of the Incorporated Glasgow Dental Hospital, 18, Renfrew Street, Glasgow. Particulars may be had from Dr. M. Alexander, Esq., solicitor, 186, St. Vincent Street, Secretary.

THE ANDERSON COLLEGE OF MEDICINE, GLASGOW.

Founded in 1800. The modern, excellently equipped hospital buildings of the school are placed on the land adjacent to the Western Infirmary, and within four minutes’ walk of the University. Extensive laboratory accommodation is provided for practical anatomy, practical chemistry, practical botany, practical zoology, practical physiology, practical pharmacy, operative surgery, and public health.
The various courses of instruction quality for all the Licensing Boards in the United Kingdom, and for
the Universities of London, Durham and Edinburgh, Glasgow, under conditions stated in the calendars.
The courses in public health (laboratory and lectures) are recognized by the Universities of Cambridge,
London, etc. Session dates: 5th October to 12th December, 1914. For syllabus, apply to the Secretary of the Medical
Faculty, The Anderson College of Medicine, Glasgow, W.

The Carnegie Trust pays the fees of students at Anderson's College on conditions regarding which
practitioners may be nominated from Sir W. S. McCormick,

Class Fees.—For each course of lectures (anatomy, obstetric
ophthalmic medicine and surgery, aural, diseases of throat and nose, mental diseases, and
public health), first session, £2 2s.; second session, (in Anderson's College), £1 10s. Each practical
classes (except anatomy, chemistry, and public health),
mainly, botany, zoology, physiology, pharmacy,
operative surgery, first session, £2 2s.; second
session, £2 2s.

Chemistry.—Lectures, £2 2s.; practical
chemistry, £3 3s. Botany and Zoology.—Reduced fees
for lectures with laboratory work in botany or in
zoology, during same session, £3 3s.; for
lecture class or practical class separately, in botany
of anatomy, £2 13s. 6d. Obstetrics and Gynecology
(including hospital practice), £1 10s., diseases of throat and nose, and mental diseases, fee for
each course, £1 18s. Anatomy Class Fees.—Winter.—First
session, lectures and practical anatomy, £5 5s.; practical
anatomy alone, £2 2s. Second session, lectures and practical
anatomy (during 18 months), £4 18s.; practical
anatomy alone, £2 2s. Summer.—First session, course
special dental course (each including nervous system)
and practical anatomy, £3 3s.; regional anatomy
and special dental course alone, £2 2s.; practical
anatomy alone, £1 10s., osteology and practical
anatomy, £2 12s. 6d.; osteology alone, £1 11s.

Public Health Laboratory.—Fee for six months' course
£2 12s. Matriculation Fee.—For the year, 10s.;
for class alone in winter, 5s.; for summer session
alone, 5s.

Glasgow Western Medical School.—This school is
situated beside the principal entrance to the University
grounds and upon the Hillhead side, as the Anderson
College of Medicine is at the other extremity. Being
also near the Western Infirmary, this school is con-
veniently placed for students desirous of taking os-
mural classes. Lectures and demonstrations are
given, in the usual winter and summer sessions, on anatomy, surgery, medicine, midwifery and gyn-
ecology, ophthalmology, dermatology, diseases of
the ear, throat, and nose. Some of the classes qualify
for graduation and for Scottish diplomas. The usual
class fee is £2 2s. There is no matriculation fee.
Further information may be obtained from the Secre-
tary.

The Glasgow Royal Maternity and Women's Hospital.—
This hospital was, as regards the larger portion of it,
recently built after visits had been paid to a number
of British and Continental hospitals; by a committee
drivers, who gave careful preliminary study to all
the aspects of the question before building was begun.
The obstetrical and gynecological work is carried on in
the hospital, the wards being fully equipped, and
the old hospital building adjoining is used exclusively
as nurses' quarters. The hospital provides a training
school in practical obstetrics for medical students,
ladies' cases and midwives. The medical staff, both
on the obstetrical and gynecological side, and the leading
physicians in these departments in the city. Out-door
practice in the various quarters of the city is obtained
from the hospital as a centre. The labour wards in the
hospital are large, light and airy, and there is an
isolation block for septicaemic cases. Further information
may be obtained from the House Superintendent.

Among the other important institutions which assist
in making Glasgow one of the foremost places of medi-
cal education, there are the Infirmary, with 905 beds, adjoining the University and closely
connected with it; the Victoria Infirmary, in the
southern part of the city, with nearly 300 beds, where
clinical courses in a variety of subjects are given;
the Glasgow Eye Infirmary, with 100 beds; the
Royal Hospital for Sick Children, the largest hospital of its
kind out of London; the Royal Samaritan Hospital
for Women, etc.

END OF EDUCATIONAL NUMBER.

CORRESPONDENCE.

FROM OUR SPECIAL CORRESPONDENTS AT HOME.

SCOTLAND.

SCOTTISH MEDICAL SERVICE EMERGENCY COMMITTEE.

The following gentlemen, representing the various
Medical Colleges and Universities of Scotland, have
formed themselves into an "Emergency Committee"
for the purpose of assisting to meet the immediate
difficulties, in regard to medical practice among the
civil population, which have arisen or may arise owing
to the departure of practitioners summoned to take
up military duty; it being understood that some 300
Scottish practitioners have been thus called away from
their localities, and that the numbers likely to be called
for at short notice. In large towns these numbers are
not numerous, and the rate of remuneration they
expect tends to become prohibitive. The Committee
proposed to the Council of the Royal Colleges
of Physicians and of Surgeons of Edinburgh, the Presi-
dent of the Royal Faculty of Physicians and Surgeons
of Glasgow, the Dean of the Faculty of Medicine,
University of St. Andrews; the Deans of the Faculty of
Medicine of the Universities of Aberdeen and
Dundee, and the Secretaries of the Universities, with the following additional names:
Dr. John Adams, Glasgow; Dr. G. C. Anderson,
Methil; Dr. John Gordon, Aberdeen; Dr. J. R.
Harland, Hawick; Dr. J. C. M'Vail, John Playfair,
and John Steven's, of Edinburgh; Dr. Norman Walker,
Convener. The Committee is now ready to receive
communications from medical practitioners in Scot-
land who are desirous either of obtaining or of offering
professional services in any of the following capacities,
indicated. All such communications should be
addressed to The Convener, Medical Emergency
Committee, Royal College of Physicians, Edinburgh.

GLASGOW AND THE RED CROSS.

The Glasgow Branch of the Red Cross Society has
four committees, upon which permanent representation
upon gifts in kind and upon work parties. The
two former are only for gathering information to pass
on to the Hospital Accommodation and Equipment
Committee of the Scottish Branch. The two latter pass
on what they receive to the Stores Committee of the
Scottish Branch. The Scottish Branch leaves all
matters referring to the purchase, storage and despatch
of medical and surgical stores, as before, under the
control of the secretary, Major Fleming. The Stores
Committee receives all gifts in kind and produce of
work parties from the county branches as well as the
Glasgow Branch; has requisitions passed on to it by
the Executive, which is the same purchasing subject to the
sanction of the Finance Committee. It is necessary
for these committees to complete these requisitions, and despatches same as
directed.

GLASGOW'S MEDICAL OFFICER.

At the outbreak of the war the Corporation Health
Committee appointed Dr. R. W. Haldane, chief
assistant to Dr. A. K. Chalmers, to be acting Medical
Officer of Health for the city during the absence on
Territorial duty of his chief, who is a Lieutenant-
Colonel in the Royal Army Medical Corps, Territorial
branch. We regret to record that he has been seized with illness and has had to be removed to
a nursing home to undergo an operation for appendicitis. In these circumstances the Health Com-
had testified in favour of his prison forcible feeding, that it was everyday medical practice, that there was nothing particularly novel about it, and that the statements so obviously untrue (especially after three prisoners had been very nearly killed) that naturally their authors insisted on their names being concealed.

Safe in like anonymity, your correspondent proceeds to give you a very round and quite outsize picture of the principles of suffragism, and secondly of my views, while finally he accuses me of "sickly sentimentality.

This is exactly the spirit of that notorious anti-socialist the "War" of a hundred years ago, with his aristocratic following, considers our condemnation of his violation of neutrality, his murders of wounded, of unarmed men, women and children, and of his destruction of cities and villages, as more sickly sentimentality. More than forty years ago, as a Privy Councillor of the Monarchy, "An Obscure Practitioner," has no place for humanity and civilisation in his ideas of national life and politics, let us leave him and consider Dr. Sers's misunderstanding of the suffrage movement and the present state of things.

Dr. Sers must begin at the beginning and study the history of the franchise movement since the middle of the 19th century. He will then learn that outrages have invariably been followed by the admission of the people of the country, not to take part in the work of their country, but also to have a voice in wlhat should be decided, and that all of them alike have to obey. The present outrages are, of course, a mere repetition of history from the time of Wilkes, of Captain Swing, and of the Reform Riots; the arson which Mr. Hobhouse first alleged to which all of them alike have to obey. The present outrages are, of course, a mere repetition of history from the time of Wilkes, of Captain Swing, and of the Reform Riots; the arson which Mr. Hobhouse first alleged to which all of them alike have to obey. Butchers were efficacious in drawing attention to the need for reform and enfranchisement. Dr. Sers, like our ancestors, instead of recognising the just claims of our fellow subjects, would rather continue the old method of trying to crush the natural evolution of universal suffrage which has already fruited in our more enlightened Dominions. He advocates forcible feeding now as a "deterrent," and compels it to hang him, which he also suggests is the proper way to deal with homicides. In the first place he might, I think, have done me the justice of acknowledging that it was I who, in my letter of the 26th, proved that prison forcbible feeding is used as a "deterrent" on certain prisoners, and was not, as he alleged on the 24th, "medical treatment of hunger strikers.

At any rate, he has learnt one fact. But, further, his analogue of hanging as a cure of homicide shows how little regard he has for his country. He says that the挂在 of criminals is a matter of national freedom and of social reform. Hanging does not deter. Surely every prison enactment of the last 100 years is a proof of that well-known fallacy. Surely, also, every hanging is an incitement to further crimes and crimes as we try to do diseases—namely, by prevention. We don't prevent homicide by hanging people after the event; the only way to prevent it is to attack the causes of homicide. Further, everyone knows that the cause of 95 per cent. of homicide is alcohol. The civilised method of deterring people from homicide, therefore, is not by hanging them after they have developed the homicidal impulse, but by preventing the sale of this vice while it enriches the brewer and his shareholders.

So, too, with the franchise. The stupid folly of the anti-democrat has led him on from the first gross injustice to be imposed upon the women who put the question constitutionally to Sir Edward Grey at his Manchester meeting, October 13th, 1909, to the brutality of forcible feeding introduced by Lord Gladstone in September of the same year; the breach of the pledge to the police at Westminster in November, 1910, and now to the false position in which our profession is being placed owing to this disgusting and grossly partial treatment of prisoners who hunger strike, and being voted for--not have--have but the power of protest against injustice. On this last point—namely, the way in which forcible feeding by prison doctors has totally destroyed British justice—I cannot under-

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**LETTERS TO THE EDITOR.**

*We do not hold ourselves responsible for the opinions expressed by our Correspondents.*

**FORCIBLE FEEDING.**

To the Editor of The Medical Press and Circular.

Sir,—Dr. Sers and an anti-suffragist (who, of course anticonstitutional and terms him an "Obscure Practitioner") continue the discussion of this subject and of my facts, which with a sad misuse of our language they refer to as "quibbles." As to the last contention, it is, like all his class, so ashamed of his advocacy of this loathsome treatment of prisoners that he does not venture to append his name to the attacks he makes upon my views of political liberty. How typical of anti-suffragists.

His leader, Mr. McKenna, has also repeatedly refused to give even to the House of Commons the names of those medical practitioners who he stated to have testified in favour of his prison forcible feeding, that it was everyday medical practice, that there was nothing particularly novel about it, and that the statements so obviously untrue (especially after three prisoners had been very nearly killed) that naturally their authors insisted on their names being concealed.

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REVIEWS OF BOOKS.

The Medical Press.

REVIEWS OF BOOKS.

SEPT. 9, 1914.

DISEASES OF THE RECTUM AND ANUS.

The importance of diseases of the rectum and anus is well brought out by the statement that 1.2 per cent. of the population suffer from rectal ailments during some time of their lives. Mr. Lockhart-Mummery has written a readable and practical work which will be of great service to all engaged in the treatment of these diseases. The text is supported by a large number of references to the reports of the leading authorities.

The book represents the work of the author at St. Mark's Hospital and in private practice, and is full of valuable information. The author knocks the bottom out of several established ideas and gives good grounds for the rejection of them. For instance, he shows that the so-called ribbon-shaped motion is of no significance in the diagnosis of cancer of the rectum in the ordinary situation; that it is not necessary to divide the anus, to clear it of the margin of danger; that syphilitic disease of the rectum is a rare disease; and that it is possible to render the rectum as aseptic as other more favoured portions of the anatomy.

He draws attention to the importance of accurate diagnosis and the necessity of separating the many unimportant conditions from those requiring treatment. Every surgeon has seen lamentable instances of malignant disease of the rectum treated as harmless when a simple examination would have disclosed the real state of affairs. He devotes a special chapter to ano-rectal operations, but, we think, does not attach enough importance to local anaesthesia or analgesia. The chapter on fistula is particularly good and the causes of the healing or recurrence frequently occurring after operation are clearly set forth. We have seen no accurate summary of the different methods of treating fistula, and we believe that Mr. Mitchell has described them better than any other. We agree with the author that Whitehead's operation for piles is not necessary in most cases, and probably have been granted. The Report shows how serious this matter is bound up with the sale of bogus curative articles. Kindly submit the circulars.

It points out that the sum it estimates as spent by the nostrum mongers in advertisements does not include that of swindlers like Masacre, the eye quacks, the deaf mutes, the electric belt makers, the curers of ruphpture without operation or /aktir generally." Based on the evidence in this present report, we must now formulate a demand for a Select Committee on the latter question. I hope always to have the chance to say that the whole evil of quackery could all be put an end to by amendment and improvement of common law. Quackery of all kinds is a systematic process of getting money, and the alterations in the law suggested by the Committee will put an end to this.

If a man can be punished for selling marmalade as butter, he can be more severely punished for selling coloured paraffin as a cure for cancer; and an unqualified man may be easily prevented from practising as a solicitor under the remotest false pretence, there can be no difficulty in preventing unqualified fraudulent quacks not only from practising, but from effectually poisoning themselves off on the public as legally qualified medical men. I am, Sir, yours truly,

Henry Sewell.

The Old Boy. Earlwood Common.

September 20th.
that a simpler procedure is usually sufficient. There are a few printer’s errors, and the illustrations are sometimes crude, but these are small matters in a book of such general excellence. We heartily recommend this book as a sound summary of the best practice in this department of surgery.

**LITERARY NOTES.**

Masek, Bailliere, Tindall and Cox announce that a tenth edition of that important work for students, Rose and Cailes’ “Manual of Surgery,” with 1600 coloured plates and 1000 illustrations, will be ready in time for the winter session. It is sixteen years since the publication of the first edition of this work, and so world-famous has it become that 32 editions and reprints have been necessary in that period. A seventh edition of Prof. Stewart’s “Manual of Physiology” is also promised from the press of the same firm. In the new edition Prof. Stewart has replaced a large number of the old figures and added some fresh ones. He has made a thorough revision, and has greatly improved the book by splitting up the chapters into distinct sections, in order to assist both teacher and student.

At the present time there is a great demand for manuals of first-aid and ambulance. A convenient pocket book, suitable for the pocket book, for the medical practitioner J. P. Sutherland’s “First Aid” (the 35th edition, revised and enlarged, of which has been edited by Dr. Halliday Sutherland. Within the small compass of 45 pages packed away an amount of useful information, covering the whole ground of first aid to the injured and sick. The price is only threepence, and the publisher is Mr. S. O. Madigan, 3. Ivy Lane, E.C.

**MEDICAL NEWS IN BRIEF.**

The National University of Ireland.

The Senate met on Tuesday, September 11th, and had under consideration the reports of the Examiners upon the special examination for the M.B., B.Ch., B.A.O. degrees recently held by the University in view of the present national crisis for the purpose of facilitating the immediate entry of successful candidates for military service in the Navy or in the Army, and agreed to award the following passes and honours:

Special M.B., B.Ch., B.A.O., Degrees Examination, 1914. — The following are the results of the examination held in University College, Dublin, for students of University Colleges, Dublin, Cork, and Galway, Students of University College, Dublin. — First-Class Honours: John A. Field.

Second Class Honours: John B. Minch and Michael McKeever, B.A.


Second Class Honours: John Kennedy, Thomas F. Kennedy, Vernon O’Hear Cussen.


The following candidate has been exempted from further examination in medicine, orthopaedics and midwifery: Thomas H. Richardson, University College, Cork.

The Senate adopted a resolution that a saddle-line should be issued to the effect that the candidates will arrange, as far as it may be possible, to take the stipulations of the University, that are subject to University regulations, which are unsuitable for the Crown during the war, shall not be proceeded in any way in his University course on account of such service.

**Munificent Gift for Medical Research.**

At a meeting of the Governors of the London Hospital last week it was reported that a gift of £1000 had been promised by Mrs. Patterson for cardiac research work.

**Society of Apothecaries of London.**

The following is a list of candidates who, having passed the necessary examinations during August and September, have been granted the L.C.S. diploma, entitling them to practice Medicine, surgery, and midwifery:— Drs. T. H. Beresford, H. Brodie, J. G. B. Hearn, R. Jennings W. M. Larcher, H. J. Lea, D. W. Newton, L. E. F. James, R. V. Powell, and C. J. B. Way.

The Royal College of Surgeons, Edinburgh, announces that the South African College, Cape Town, is now recognized as a school of anatomy and physiology for the course required for admission to the second examination of the Council Board of the Royal Colleges of Physicians and Surgeons.

**MEDICAL WAR ITEMS.**

War Risks.—The following resolution has been passed at a special meeting of the Executive Committee of the Medical Society, Annuity and Life Assurance Friendly Society:—Any member serving with His Majesty’s forces on active service abroad shall be allowed to retain the annuity, or an equivalent amount, during his absence from the United Kingdom, and shall, on return to the United Kingdom, come into sickness and accident benefit. Any member serving with His Majesty’s forces while in the United Kingdom shall be held fully covered for sickness and accident, while absent. An annuity insured for life assurance serving with His Majesty’s forces either abroad or in the United Kingdom shall not be charged any extra premium and shall be held fully covered.

Birmingham medical men have circularised the patients of local doctors called to the front, offering medical attention on their behalf, and exhorting them to keep faithfully to their particular doctor on his return.

The ready offer of hospitals has made it unnecessary — except in one or two cases—for the authorities to utilise buildings which are not already adapted as hospitals. The Yarrow Convalescent Home at Broadstairs is one of the few buildings which are being converted. Where such buildings are being used the necessary alterations are being made.

At a meeting of the Council of the National Medical Union on Saturday last, September 11th, the following resolutions were passed:—In view of the great increase of business, the National Medical Union is prepared to submit a list of its members who are willing to place their services at the disposal of the War Office.

**NOTICES TO CORRESPONDENTS. &c.**

EP. Correspondents requiring a reply in this column are particularly requested to write at once, in order to avoid the practice of signing themselves “Readers,” “Subscribers” “Old Subscribers,” etc. Much confusion will be avoided by adhering to the rule.

**SUBSCRIPTIONS.**

Subscriptions may commence at any date, but the two volumes each year begin on January 1st and July 1st respectively. Postal orders, drafts, &c., should be addressed to: Messrs. Longman, Green, Longman, Longman, Roberts, and Green, 17, Princes Street, London, W. For Canada, The Longmans, Green and Co., 108, Yonge Street, Toronto, Ont. For Australia, Geo. Robertson and Co., of Sydney and Melbourne, are our special agents for Australia.

**ADVERTISEMENTS.**

For One Insertion—Whole Page, 2s.; Half Page, £2 10s.; Quarter Page, 6s. Green, 1/2; 6l.

The following are our special agents for Canada—Messrs. E. A. D. and S. E. Dowling and Sons, of Toronto, Ont. For Canada, South Wales, Geo. Robertson and Co., of Sydney and Melbourne, are our special agents for Australia.
Small announcements of Practices, Assistancies, Vacancies, Books, etc.—Seven lines or under (70 words), 4s. 6d. per insertion; 6d. per line beyond.

Applications were requested to send their communications, if resident in England or the Colonies, to the Editor at the London office, 6, Henrietta Street, Strand; if resident in Ireland to the London office, in order to save in forwarding from office to office. When sending sub-

Original Articles or Letters intended for publication should be submitted to the Editor and if not authenticated with the name and address of the writer, not necessarily for publication, but as evidence of identity.

NOTICE—Reprints of articles appearing in this Journal can be had at a reduced rate, providing authors give notice to the publisher or printer before the type has been distributed. This should be done when returning proofs.

C. H. S, (Brighton).—Letter received, contents noted and sent to Shrewsbury.
M.R.C.P. (Liverpool).—We should have been glad to give space to your communication, but we do not see that it applies to the argument it is intended to refute. As we understand you desire to raise a point of importance to a certain class of practitioners, it will afford us pleasure to give you space for this purpose if desired.

NOTICE TO HOSPITAL SECRETARIES AND COLLEGE DEANS. The Editor wishes to thank the above gentlemen attached to the various Schools and Hospitals for supplying him with the information from which the foregoing pages have been compiled, and to extend to them his most cordial thanks.

This number is mainly devoted to information necessary for students intending to join one or other of the various medical colleges. They are requested by those who, having passed their curriculum, are about to enter the ranks of the profession, much of the ordinary matter which usually fills our columns is necessarily deferred till next week.

GRATUITOUS COPIES. A very large number of copies of this issue are being sent gratuitously to hospitals and institutions of all descriptions, especially reading-rooms, clubs and large hotels in the United Kingdom, and to all the leading journals in America, India, the Colonies and on the Continent; should any of our readers desire to present a copy to a patient or friend who contemplates sending his son to a medical college, it will be supplied to him with a duplicate free of cost on receipt of address.

D. J. Watton.—Thallium acetate may be used with safety for the removal of downy skin from the upper lip which is unsightly for esthetic reasons. Sabouraud gives the following formula:—R Thallium acetate 0.30 gram, zinc oxide 2 gram, vaseline 10 gram, lanolin 2 gram. The action of this salve is slow and progressive.

Vacancies.
Royal Albert Hospital, Devonport.—House Surgeon. Salary £90 per annum, with board and laundry. Applications to the Chairman of the Selection Committee.
Hulton Dispensary, on the outskirts of Stretford Road, Manchester.—House Surgeon duly registered and fully qualified. Salary £160 per annum. Applications to the Secretary should be accompanied with testimonials, at once to Colonel Brown, Stretford Road, Manchester.
Manchester Northern Hospital for Women and Children, Park Place, Cheetham Hill Road, Manchester.—Surgeon. Salary £250 per annum, with board and laundry. Applications to Mr. Hubert Tonge, Secretary, 38 Barton Arcade, Manchester.
Northern Dispensary, Oldham.—Surgeon. Salary £120 per annum, with board, residence, and laundry in the Hospital. Applications to the Secretary.
Sheffield Hospital, near Durham.—Medical Officer. Salary £200 per annum, with board and lodging. Applications to the Secretary, Mr. W. M. Gilboy, 20 Mount Street, Sheffield.
Rotherham Hospital.—Assistant House Surgeon. Salary £120 per annum, with board, lodging, and washing. Applications to the Secretary, W. G. Roberts, 8 Moorgate Street, Rotherham.
The University of Sheffield, Department of Pathology.—Junior Demonstrator in Pathology. Salary £200 per annum. Applications to W. M. Gilboy, Secretary, Nottingham City Asylum.—Junior Assistant Medical Officer. Salary £200 per annum, with board, apartments, and laundry. Applications to the Medical Superintendent.
The University of Liverpool.—Fellowship in Medicine.—Johnston Chair of Medicine. Salary £100. Applications to Dr. C. E. Jordan, Senior Assistant, to Edward Carey, Registrar.

Appointments.
Bond, C. Shaw, M.B., B.C., M.R.C.S., L.R.C.P. Lond., Medical Officer and Public Vaccinator for the Hammersmith (Hamp-

HUMLE DISPENSARY, DALE STREET, STRETFO RD, MANCHESTER.
WANTED a HOUSE SURGEON duly registered and fully qualified. Salary £200 per annum, with apartments, coal and gas. Applications, with testimonials, at once to the Medical Superintendent.

DEATHS.
Gowland, William Percy, F.R.C.S.Eng, to the Chair of Anatomy at the University of Otago, Dunedin, New Zealand.
Salisbury, William, F.R.C.P. Lond., Assistant Resident Medical Officer at the Queen Charlotte's Lying-in Hospital, Maryle-

Deaths.
Dalestreet, Sept. 3rd.—Mr. J. W. G. Dobson, late of the late Dr. Matthew Debnall, of Brapford, Shropshire, aged 72.
Hicks.—On Sunday, August 30th, at 119 Auburn Road, N.E., Dr. George Borlace Hicks, in his 87th year.
Evs.—On August 28th, at 43 South North, Southsea, Dr. Stuart Hathaway Reid, M.A., late of the East London Hospital for Children, Shadwell, aged 49.


Births.
Early.—On September 1st, at 15 Lydiatt Terrace, Cheltenham, the wife of P. M. Earle (British Guiana Medical Service)—a daughter.
Lacey.—On Friday, August 28th, at 194 Barrague Road, Wool-


Marriages.
Darling.—On September 1st, at St. Giles' Cathedral, Edinburgh, Alexandra Gray Banks, M.R.C.S. (Edin.), to Evelyn Isabelle, daughter of the late William Stepney, Stockbridge, Hampshire, aged 26.—a son and heir.
Chevening Lodge.—On September 1st, at St. Mary's Church, West Kirby, M.B., M.R.C.S., young son of the late Alfred Fountain Browne, Esq., and Mrs. Fountain Browne, of Ealing, to Miss Winifred Anne Sanderson, eldest daughter of Mr. and Mrs. E. R. Billington, of West-Kirby, At home, October 15th and both, No. 4 Hamilton Square, Birkenhead.
Hilton.—On September 1st, at 2nd, at the Parish Church, to Albert Watson, M.B., of Newton Abbott, Devonshire, youngest son of the late C. H. E. Pater, Esq., C.B., and of Mrs. Pater, of Newton Abbot, to Dorothy, daughter of the late Reverend F. H. Vizard, Vicar of Herne Hill, Farnborough, aged 29, daughter of Mr. and Mrs. C. H. Vizard, of St. Matthew's, Latimer Road, to Miss Ethel, of St. Edward's, Isip, and Margaret, youngest daughter of John Potts, Esq., of Knapp Hill, Wandsworth.
Price.—On September 2nd, at Chefield Parish Church, to Walter Patey, M.D., of Newton Abbott, Devonshire, youngest son of the late C. H. E. Pater, Esq., C.B., and of Mrs. Patey, of Newton Abbot, to Dorothy, daughter of the late Reverend F. H. Vizard, Vicar of Herne Hill, Farnborough, aged 29, daughter of Mr. and Mrs. C. H. Vizard, of St. Matthew's, Latimer Road, to Miss Ethel, of St. Edward's, Isip, and Margaret, youngest daughter of John Potts, Esq., of Knapp Hill, Wandsworth.
Robinson—Seydon.—On September 1st in Painshaw Church (quietly on account of the war), Dr. William Robinson, son of Andrew Robinson, of Lower Assington, Eyam, to Miss Winifred Helen, second daughter of the Rev. W. H. Seddon.
Shaw.—Seydon.—On September 1st, at the Church of our Lady of Victories, Kensington, to Dr. George George Sharpe, A.M.C, son of the late Dr. James Sharpe, of Dublin, to Margaret Sarah, daughter of Mr. and Mrs. David, of 2, St. Mary's Avenue, to Miss of St. Mary Abbott's Terrace, Kensington.
Vivian—Ballett.—On September 3rd, at the Parish Church, to Edweld, Harold Sugden Vivian, of R.S. Lond, Winchmore Hill, Middlesex, to Alice Winifred, daughter of Frederick Boreland, of 18 High Road, Lee, Kent.
Among the many unrecorded deeds of gallantry under fire must be mentioned the heroic and self-sacrificing acts unceasingly performed by medical officers serving under the Red Cross. One of the most ghastly features of the present war is the manner in which this emblem, sacred to the cause of humanity, is honoured, or rather dishonoured, by the enemy. In consequence of these repeated acts of outrage the work of the Red Cross men has been rendered doubly hazardous, and many noble deeds performed in the face of such increased risks will never see the light of day in cold print or be mentioned in dispatches. They are all inscribed, however, by the recording angel in imperishable characters upon his eternal scroll. It is reported that on August 25th, when Louvain was razed to the ground, Dr. Noppe, Principal of the Medical Faculty of the University of Louvain, was about to visit one of his servants in the hospital, who had been shot in three places. At this time the famous library was already burnt out. He attended to the girl's wounds and hurried back to his residence, only to find it in flames, despite the fact that a large Red Cross flag was flying over it, and that a notice was upon the door to say that a Dutch medical man lived there. The professor and his wife remained in the cells of the hospital to attend to the physical needs of some 150 wounded patients, and did what they could to relieve the sufferings of the distracted townsfolk. All honour to the men who love not their lives unto the death, and who remain faithful to their posts as ministers of healing.

In the provinces recruits for the new armies are in some instances examined by local civilian practitioners. A small fee, half-a-crown, is paid by the War Office for each examination. Considering the amount of skilled service and the necessity for rigid apseisis the rate of remuneration does not err on the side of extravagance, and a private patient would very properly be expected to pay a much larger fee. The public, however, has acquired a rooted belief that medical service should be obtainable either free or for a ridiculously small sum. In various Yorkshire newspapers an objection has been raised to the amounts paid to local medical men for the examination of recruits. In one instance a correspondent writing under the signature "F.R.C.S.," states that he devotes two hours daily—all the time he can spare—to this duty, in return for which he receives ten shillings. On the other hand, he points out that medical men will be hard hit by the war, owing to the number of bills that will remain unpaid. That fact should be appreciated by the Government in their dealings with the medical profession. It would, indeed, be a bad stroke of political economy to foster conditions that tend to reduce the efficiency of the medical service of the nation.

The importance of anti-typhoid inoculation has been pretty widely recognised not only by the medical profession, but also by the War Office and the public at large. Statistics apparently prove beyond doubt that the incidence and mortality rates are thereby reduced, not to mention the detection of that most dangerous of camp inmates, the typhoid carrier. From a public health point of view it is highly desirable to exclude as far as possible the introduction of enteric fever by soldiers on their return from the war. There is no need, however, to labour the point. Prophylactic inoculation against typhoid fever is a scientific precaution of great value, and should be administered to all British troops who join our armies in the field or, so far as that goes, who are placed in camps at home. The difficulty of the Army Medical Department will be to find medical men to administer the typhoid vaccine, a little operation that requires skill and experience. In Scotland the Royal Colleges have placed their laboratories at the disposal of the War Office. In London the Army Medical Service could secure ample help of the kind in some of the first-rate clinical laboratories attached to various large and small hospitals. Some of the larger hospitals are depleted of staffs and overburdened with wounded soldiers, but more than one small special hospital we could mention would be able to administer, if necessary, several hundreds of typhoid inoculations daily. The attention of Sir Launcelot Gubbins, Director-General of the Army Medical Department may be drawn to this matter. An offer to do this particular work has been made by a well-known professional association, which, if we mistake not, has been organised and supported for very different purposes.

Books and the Man. The majority of medical and scientific books differ somewhat from many works of general literature in that the former tend to serve the needs of a given generation of students. We prize and regard with reverence the weighty tomes and works of reference produced by the great medical teachers of half a
century ago, but they do not figure upon the list of books recommended for candidates for present-day examinations. Some textbooks, indeed, are fortunate enough to run through a large number of editions and are ousted from their place only with great difficulty by insistent claims of some pushing rival. The shelves of the second-hand bookshops bear abundant testimony to the comparatively short life of the average medical work. And so it must ever be in the case of such a progressive science as that of medicine, fresh discoveries in which spring to light with startling rapidity may seem perilous originals, to the tyro to know what books he ought to purchase at the outset of the career. The student will do well to be guided in this all-important matter by his teachers and maters and only to purchase those textbooks that will be of immediate use. As he proceeds further in his medical studies his library will of necessity, increase. Broadly speaking, it may be said that the aspirant after a medical degree at one of the Universities will require to spend more upon books than he who is bent upon obtaining a diploma from one of the colleges or corporations authorised to grant such. In his last year or two the senior student will need to supplement his textbooks by reading original works in the various medical journals. Finally, it should be remembered that the most successful practitioner is he who has the broadest outlook, therefore, care should be taken to supply all the mental faculties with that *pabulum* which can only be obtained by a liberal course of general reading.

The *Importance of Physical Training.* The alleged inferiority of the modern athlete is the keynote of a communi-
cation from the pen of Sir Lauder Brunton to the *Times Educational Supplement.* In the absence of comprehensive statistics dealing with the physical measurements of ancient as well as modern athletes it is not easy to judge with scientific precision whether the degeneration of limb, so loudly complained of by dramatist writers, is a real cause for national searching of heart. There does not appear to be any lack of a pure spirit of sportsmanship in the country today, so far as the physical condition of our national interests are concerned, but it is just open to question if sufficient attention has been paid in this country to regular, systematic training in physical exercise. Each of the great national games and sports exercises certain but seldom the whole of the muscles of the body, whereas the Swedish drill, intelligently persevered in during childhood and youth, would go far to remove any reproach that may be hurled, rightly or wrongly, against the athletic side of our present educational system. The establishment of chairs of physical training in the Universities of this country, after the manner of that already existing in the University of Pennsylvania, as well as the introduction of sports masters in every school who would be directly responsible for all physical training, have been suggested as being among the most practical means of improving the muscular fitness of the nation at large.

The administration of anaesthetics by medically unqualified or un-
and Unquali- registered persons is an obvious tied Practice, danger to the public. The safe administration of anaesthetics demands a combination of technical skill and knowledge that cannot reasonably be looked for apart from a thorough medical training. There is, of course, an unavoidable margin of deaths that must occur during anaesthesia, just as there must be, say, in a given fever, such as malaria or measles, or in the operation of ovariotomy, even when the patient is placed under the best modern conditions. Those deaths, however, represent the minimum, and the number rises rapidly as the medical competence or resources of the medical men concerned. A comparison, for instance, of the deaths under anaesthesia at two of the largest hospitals in the kingdom revealed a startling difference in results. A change in administration methods of the less favourably dis-
tinguished institution brought about a remarkable diminution of this most distressing form of fatality. These facts prove, first, that to a certain extent anaesthetic deaths are avoidable, and, secondly, that special training and experience are needed to produce really competent anaesthetists, even amongst qualified medical men. It goes without saying that in the hands of medical men qualified persons the administration risks attending the anaesthetics would be greatly multiplied. To permit such irregular practice is illogical on the part of a State that demands a rigid course of special study and training by repeated examinations before any person is granted a legal qualification to practice medicine or surgery.

It seems, indeed, a self-evident fact that the promiscuous administration of anaesthetics must constitute a grave public danger. The need of legislation on the subject has been urged upon the Government time and again. Will they consent to bring before the public, and the lives of our fellow-citizens—that is to say, if he exercise the small amount of caution needed to keep within the four corners of the law. On the other hand, as a matter of public safety, a considerable expenditure of money and labour, secured a State medical qualification, finds himself subject to all sorts of pains and penalties should he offend not only against various written and unwritten laws of his profession but also against the general moral and penal laws of society. In view of the peculiar conditions of medical practice it is right and proper that a high ethical code should be en-
forced. But what about the topsey-turveydom of a system that protects society so sternly against the lapses of the qualified practitioner but leaves it completely at the mercy of the cancer-curer, the bone-
setter, the venereal quack, he vender of worthless nostrums and the rest of the crew of parasites who flood the world with their lying advertisements?

The Medical Roll of Honour. Since the date of our last issue the list of British losses in the war have steadily mounted until it has reached a total of 18,700 (on the evening of September 18th). Additional names are those of—Killed: Capt. A. S. Williams, R.A.M.C. Wounded: Capt. McConaghy, R.A.M.C., Lieut. W. K. Morrison, R.A.M.C., Capt. C. W. Holden, R.A.M.C., Missing: Capt. P. O. P. Davy, R.A.M.C., Lieut. E. Davies, R.A.M.C., Capt. H. C. Hildreth, R.A.M.C., Capt.
THE REPORT ON PATENT MEDICINES.

At the present moment public attention is engrossed by the terrible war which is devastating the Continent of Europe. Matters of social moment accordingly pass by unnoticed amid the stress and anxiety of the Titanic conflict that has been thrust upon the people of the United Kingdom.

At such a juncture, then, the recently issued Report of the Select Committee of the House of Commons upon Patent Medicines is not likely for some time to come to secure that amount of publicity and interest which is warranted by its outstanding importance. It is, of course, impossible to discuss a document of this kind within the limits of a brief article, but readers will find its salient results elsewhere in our columns in the shape of the findings and the conclusions of the Select Committee.

Readers will observe generally that it clears the ground for the long delayed reform of an evil that strikes deep into the roots of social well-being, inasmuch as the evil type of proprietary nostrum damages its victims in pocket, in health, and, above all, in the inducement to substitute worthless in place of skilled treatment. The Committee carefully ranges patent proprietary medicines into non-secret and secret remedies. The non-secret include genuine and valuable drugs, such as adrenalin and urotropine; and others that owe their attractiveness to skilful combinations, or to the use of an excipient that may be itself secret. Secret remedies, on the other hand, include simple medicinal substances that may be harmless except in their misleading claims to curative virtues, or they may contain dangerous drugs, or be simply fraudulent, which, in the words of the Report, "are, and are known to the makers to be, cruel frauds: and the sale and advertisement of them should be prohibited under drastic penalties." From this passage readers will gather that the Report is of an outspoken nature calculated to secure the approval of the root-and-branch reformer, and such indeed is the case.

The survey of existing British law is not altogether satisfactory—the Committee deal simply with the Patent Medicine Acts of 1862, 1884, and 1812, and review the various laws whereby the fraudulent representation and other evils of the quack medicine trade might be restrained. It ignores the fact that there is a great mass of legislation dating from the days of Henry VIII., whereby summary powers were conferred upon the Royal College of Physicians of London and upon other bodies to seize and destroy false medicines and punish the vendors thereof.

Much of this restrictive legislation is unenforced, but possibly the Committee thought it wiser to refrain from a survey of laws that have fallen into desuetude. Among its emphatic findings, we note the following: (6) That no Department of State and no public officer is charged with the duty of controlling the sale and advertisement of proprietary remedies in this country; that the Home Office and the Local Government Board are virtually powerless in this respect; that the Privy Council Office, though supposed to be specially concerned with the sale of drugs, has no initiative in the matter, and, in fact, it fulfils no useful function in this connection. (7) That the existing law is chaotic, and that successful prosecution for fraud in the advertisement and sale of secret remedies is fraught with the greatest difficulty, though the Public Prosecutor has perhaps not sufficiently tested the power of the existing law in respect to such cases. (8) That consequently the traffic in secret remedies, except as regards scheduled poisons and the grosser forms of impropriety is practically uncontrolled in this country.

A similar firm handling is evident in the recommendation, which, if carried out, would practically put an end to one of the most nefarious forms of money-making that has hitherto defiled humanity's ceaseless struggle for existence.

The Select Committee, at any rate, has done its best to expose and check the evil. The chairman, Sir Henry Norman, himself a distinguished journalist, has faced the question of newspaper advertisement, which is the breath of life to quackery, both fairly and squarely. Standing for the best traditions of British journalism, his remarks will no doubt have a due effect upon the latter day cynicism of the so-called "yellow press," which thrives on the weaknesses of mankind, and appraises all human effort from the single standpoint of material self-interest.

The Report is specially welcome to the MEDICAL PRESS and CIRCULAR, which, in season and out of season, has for more than two generations raised its voice in protest against the evils of quackery. It is a matter of inexpressible gratification to find our contentions more than supported by the formal finding of a governmental investigation.

Our readers will doubtless join us in a devout wish that the labours of the Select Committee may be attended ere long by the fruition of legislative approval. The present century has witnessed various social changes of a far-reaching nature, a fact that renders one hopeful that the Report under notice may not share in the oblivion that has consigned many a similar document to the forgotten dust of our national archives. It will be our duty when the termination of the war affords more leisure for the consideration of social reforms to discuss in detail many of the principles, findings and recommendations of this admirable Report.

Now that the Report of the Select Committee on Patent Medicines is published, we wonder what notice will be taken of it in the daily Press. The Report contains twenty-eight pages, not including the evidence, and goes fully and fearlessly into the matter before the Committee, and it is not too much to say that whatever public will hear much about it. We know as well as anybody that a newspaper is not primarily out for philanthropy. A paper cannot live upon circulation alone, but needs every word that proceeds out of the mouth of the advertiser. That is the real difficulty. We saw it in the case of "The Rocket," with such forceful publicity. The large, unadvertised proprietary frauds. Legislation is our only hope, and the influences that are brought to bear to avoid unpleasant publicity will be exerted to their fullest to scotch any effective bill. We need a crusade. Nowadays a crusade demands publicity for its success, and the public are against it the voice crying in the wilderness will seem still and small. We must keep on hammering away. We must never forego an opportunity of telling the truth about a patent medicine. Not with vague and abusive vapidations, which may be impouted by the ignorant to competitive jealousies, but with cold facts relating to composition and price, that will appeal to the pocket of the prospective purchaser. No one will pay half-a-crown for a couple of draughts of salt and sugar when he knows how he is being had. To ensure this we must take the trouble to learn something about these enemies to the public health. We study bacteria to defeat their machinations and we must do the same with the cure-all frauds.

Hoppickers and Hygiene.

The announcement that certain of the refugees from the Continent, who are daily arriving in this country, have been drafted into the hopfields, there to find employment, makes one pause for a moment to consider what provisions exist for looking after the health of this large body of workers. It is suggested that, when the pickers were dumped down, as it were, in large numbers into a district with little or no regard for the needs of ordinary sanitation and decency. Private enterprise, so often the pioneer of official action, was not long in making the attempt to ameliorate the physical lot of hoppickers during the time of their harvesting operations. The late report of the Royal Commission, upon the lodging and accommodation of hoppickers has been recently issued by the Local Government Board. During the present season it seems more than likely that there will be a greater strain than ever upon the accommodation provided for the pickers, and increased inspection will certainly be necessary this year. It is suggested that the attention should be paid to the sanitary requirements of tents, special huts, and farm buildings utilised for housing the pickers. Private accommodation suitably screened and protected should be provided in due proportion to the number of pickers. The water supply should be free from pollution, and if it might be said, such supply should be protected from contamination by the refuse and sewage of a hoppers’ encampment.

Between Two Stools.

Most of us have at some time or another met the man who is always dosing himself in vain efforts to preserve his youth. Alzheimer, from the fact that a stimulant and takes one; alcohol, strychnia, ammonia, or what not. Next he realises that he has rather overdone the trick, and he looks about for something to soothe his raw nervousings into some sort of comfort. We know this class of man, and find him hard to deal with. He has no settled policy about himself, and no outstanding feature of folly to which we can direct our attention. National mental state is at present rather like this man’s. It is not our fault. Mr. Wells says it is the fault of what he calls the "official" or "expert" mind, and he instances the obviously poor recruiting posters that adorn our post-offices. The fact remains, however, that we are capable of low and absurdly disgusting alternation. One week the cry is "carry on" and "business as usual," and the next we are called on in the name of King and country to leave our occupations whatever they may be and to join Lord Kitchener’s army. We are all ready and anxious to do what is right, and we are ready to make any sacrifice that will may be called on to give, but we must be told what it is that we are really wanted to do. No man will rise up and leave his practice and his family if he is likely to be told the next week that he would have done better for the land he loves by sticking to his daily round. Doctors on the whole have little temptation to leave their work. Some businesses have almost gone out of the Market Board, and there is a demand for the new doctor as is busy as ever. If we are wanted we are here and ready. We will trust our neighbours to do our work and to look after our interests till, and if, we return. But we need a charted way between the Scylla of shirking our duty to the country on the one hand and the Charybdis of careless-ness of our future on the other. We know the Government has its hands full at present and we hate grouse, but if we do not say what we want we cannot expect to get it.

A Nation’s Manhood.

"England considered no sacrifice too great which in the important struggle in which she was engaged." Thus wrote F. de Bourrienne in his "Life of Napoleon," with reference to the Peninsular War. That is how a Frenchman, Napoleon’s private secretary, recognised the efforts being made by England to subdue the forces of his master. Almost a hundred years have passed, and now we find ourselves again in the throes of a similar struggle. The sacrifices of the past have become those of the present if England is once more to do her share in bringing to his knees an unprincipled usurper of the rights and liberties of the nations of the world, that nation is England, as a nation, doing her best in the struggle before her? If so, how is it that many thousands of her sons, physically fit and capable,
withhold themselves from enlistment? How is it that Lord Kitchener should have to plead so earnestly for the recruits of which he is in need? Repeatedly he has affirmed that he wants every man that he can get. The Government has endorsed his appeal, and yet in the crisis in which this country is involved, the young manhood of the nation is not ashamed to continue the pursuit of pleasure, ignoring their duty. That heritage which the Empire now enjoys through the sacrifices of our ancestors is a sacred trust. We must support, maintain, and protect it, whatever the cost, unsullied, not only for ourselves but for those who succeed us.

The Philosophy of the War.

One of the most interesting occupations we can give ourselves is the tracing of tendencies. In the present war our sensibilities are daily swamped by sensational but unimportant details of outpost engagements and survivors' stories, it is a cooling change to rummage in the dusty past in our efforts to find a thread to lead us from some dim beginning through misty means to the crystalline calamity that now confronts us. There are people who attribute the war directly to Nietzsche's influence on the German people. It would give the supposition a greater appearance of probability if the attention were turned to the influence which Nietzsche is popularly supposed to have taught. The inventor of the Superman is usually credited with having taught a ruthless individualism and a brutality fully justified by the mere fact of its own existence, and because he was unfortunate enough to end his days in a madhouse, and to be the author of mystifying and unconventional phrases like "I should only believe in a God that would know how to dance," he is generally supposed to have reached his apotheosis in the German military aristocrat of the present day. Of course, such a view is unjust. The exhortation that he so ably directed to the German people, with what must seem to us some sinister foreboding, was "to have fidelity, and for the sake of fidelity, to risk honour and blood, even in evil and dangerous courses." This alone must check our assumption that the Teutonic policy is based on Nietzsche. Still, he was an individualist and the present war was essentially un-democratic in inception. Which side we take reckless autocracy bears the responsibility. In even allegedly representative countries those in power must some day answer for their actions. The brake of the average opinion checks any thoughtless or contemplated recklessness. We are not blind worshippers of Demos, but we see that pure individualism presupposes that the most powerful men are also the best, with which proposition we cannot agree. Matters affecting a whole people and which are comprehensible by the man-in-the-street must depend for their successful conclusion on his considered approval.

The Intravenous Injection of Mercury in Syphilis.

Now that salvarsan and neo-salvarsan will be practically unobtainable until such time as British chemists can be found to undertake its manufacture, we may well look around for other remedies for use in cases of syphilis. If we are compelled to fall back upon mercury we have the assurance that it is anything but a broken reed, in fact, it will probably remain the best anti-syphilitic drug for a long time to come. Those who have done their best persistently to discredit its efficiency will now have only too glad to avail themselves of its remedial action. At the same time, mercury needs to be administered with great care and not in a haphazard fashion. Some excellent results in the treatment of syphilis have been obtained by the intravenous injection of the bichloride of mercury by Drs. J. Kingsbury and Paul E. Becher, of New York (a), in doses of one-sixth to one-third of a grain in distilled water, the amount of fluid injected rarely exceeding 12 c.c. The advantages claimed for the intravenous route are the immediate introduction of the curative agent into the circulating fluid, rapid therapeutic results, mathematical dosage, and an absence of pain. Too great concentration of the bichloride solution may give rise to some phlebitis, which should be avoided. The benzaote of mercury was also employed in a 1 per cent. solution, the dose being from 2 to 12 c.c., but it was inferior to the bichloride. The method is not recommended as a routine but for use in selected cases. There is now abundant room for a full trial of the new French substitute for neo-salvarsan, which is said to be more intensely fatal as regards the spirochaetes of syphilis, although not quite so effectual as a tonic.

PERSONAL.

DEPUTY-GENERAL-SURGEON P. M. ANDREWS, R.N. (retired), has been appointed to Portsmouth Dockyard.

DR. C. HASTINGS PHILIP, M.P., B.C. Cantab., has been appointed Honorary Anaesthetist to the Herefordshire General Hospital.

SIR ARTHUR CHANCE has been appointed a member of the First Senate of the National University of Ireland in succession to the late Sir Christopher Nixon.

PROFESSOR DAVID WATERSTON, M.D., of King's College, London, has been appointed Bute Professor of Anatomy at St. Andrews University, in succession to Professor Musgrove.

DR. D. G. THOMSON, Superintendent of the Norfolk County Asylum, delivered the Presidential Address on taking the office of President of the Medico-Psychological Association of Great Britain and Ireland.

The name of Lieut. J. C. MacBryan, the son of Dr. MacBryan, of Box, is in the list of wounded in the recent fighting at the Front. He left the 1st Somerset a year ago to enter the medical profession.

The Council of the University of Sheffield has decided to invite Dr. J. B. Leathes, F.R.S., at present Professor of Pathological Chemistry in the University of Toronto, to accept the Chair of Physiology rendered vacant by the acceptance of Professor J. S. Macdonald of the Chair of Physiology in the University of Liverpool.

The medical arrangements of the new Sheffield University and City Special Battalion have been organised by Dr. Scruffield and Dr. Forbes, and under the control of Mr. W. Swallow. The clerical arrangements were organised by political agents of both the Conservative and Liberal Parties which, Mr. J. S. Skinner and Mr. C. J. Preston, while Mr. A. E. Jameson acted as paymaster.

A base hospital for Leicestershire, containing 500 beds, has been organised within five weeks by adapting the Old County Asylum at Leicester for the purpose. The arrangements have been directed by Major L. K. Harrison, R.A.M.C., who is in command of the hospital, assisted by Major Wallace Henry and Quartermaster G. E. Barfield, with 100 men of the R.A.M.C. Corps and 90 nurses.

(a) Journal American Medical Association.
Of all affections of the lachrymal apparatus obstruction of the lachrymal passages is the commonest, and is perhaps of all the diseases of the adenca of the eye, among the most intractable to treatment. There are two reasons for this intractability, first, the patient neglects to come for treatment until the condition has become chronic, and secondly, the anatomical and physiological arrangements of the parts make it exceedingly difficult to effectually apply treatment.

I will recall to your minds some of the anatomical relations of the structures engaged in the drainage of the conjunctival sac. At the inner extremity of each lid, just at the inner border of the tarsus there is a small papilla, upper and lower papilla lachrymale, surmounted by a minute opening, the punctum lachrymale. These puncta are applied to the surface of the eye-ball, in that area of the conjunctival sac known as the lacus lachrymalis. From these puncta, canaliculi lachrymalis pass inwards behind the caruncle to the sacus lachrymalis, passing at first in a vertical direction for a short distance before turning sharply inwards. The lachrymal sac lies behind the internal palpebral ligament in the fossa sacca lachrymalis formed in front by the nasal process of the superior maxillary bone, behind by the lachrymal bone. From the sac the lachrymal duct passes downwards, outwards and a little backwards, through the bony nasal duct to open into the interior nasal fossa. The mucous membrane of the duct rests upon a submucous tissue containing a plexus of veins, any undue engorgement of which is sufficient to close the lumen of the duct. The mucous tissue lying in the membranous tube thrown into folds, and one fold in particular, more marked than the rest, is found near the lower extremity and called Hasner's valve. The narrowest part of the duct is at the neck where it leaves the lachrymal sac and it is narrowed again at the opening into the nose. This opening is placed obliquely through the nasal mucous membrane. The conduction of tears from the eye is carried out as follows: by the action of the orbicularis palpebrarum muscle during the movement of winking, the internal palpebral ligament is pulled forward, the lachrymal sac being adherent by its anterior wall to the ligament, the walls of the sac are separated from each other, this suspension action draws the tears from the lacus lachrymalis through the canaliculi. But the lumen of the duct becomes greater than that of the canaliculi, it would be expected that the suction would expedite itself in sucking air from the nose up the duct, but this is effectually prevented by the lower opening of the duct into the nose being placed obliquely and acting as a closing valve. Upon the cessation of winking the elasticity of the walls of the sac compress the contents. The contained fluid will pass by way of the least resistance, down the duct, its lumen being greater than that of the canaliculi.

Should an obstruction take place from any cause in the lachrymal duct, the result is that the tears are pent up in the lachrymal sac. They can be pressed back along the canaliculi into the conjunctival sac by pressure with the finger over the internal palpebral ligament. Should the tears remain long in the sac the secretion becomes turbid from the collection of epithelial debris, mucus, dust and foreign matter carried in from the conjunctiva. This turbid secretion increases and distends the sac and becomes the medium for the luxurious growth of bacteria and takes on the characters of mucous-pus. The presence of the material in the sac leads to a catarrhal inflammation of the mucous membrane which still further aggravates the trouble.

This is the condition found in the majority of patients when first seen, and has probably been in existence many weeks and is known as chronic dacryocystitis. There are times when a loss of continuity of the epithelium lining the lachrymal sac occurs, and infection of the mucous and sub-mucous tissues takes places leading to abscess formation. The abscess as a rule points over the sac but the pus may burrow outwards and downwards in the tissues of the lower lid and cheek. This condition, acute dacryocystitis, is always preceded by the chronic inflammation following obstruction. The treatment for this acute condition follows the ordinary rules of surgery for superficial abscesses.

The symptoms of chronic dacryocystitis are, first, epiphora, the tears being unable to enter the already full sac, flow over and wet the cheek; secondly, swelling, immediately internal to the eye, between the inner canthus and the side of the nose; thirdly, regurgitation, mucous pus escaping from the puncta lachrymale upon pressing over the swelling.

After a variable time the catarrhal inflammation subsides and the purulent nature of the discharge ceases, the regurgitated fluid being mucoid only and finally clear.

The walls of the sac after a time become thickened, lose their elasticity from long continued distension, and pass into a condition of atony— the sac remaining distended with fluid even should the obstruction of the duct have been removed, a condition known as hydrops of the lachrymal sac.

Owing to the constant running over of the tears, the skin of the lids becomes excentaneous, and should the epiphora last for a long time, contraction of the skin of the lower lid commences, and will lead to ectropion (turning outwards), of the eyelid, more or less severe.
The presence of a continual mucous-purulent discharge is not only annoying to the patient but a danger to the eye, and is a frequent cause of severe corneal ulcers, and infection of wounds operative or accidental. Every slight erosion of the corneal epithelium, from a speck of dust, may be the starting point of severe inflammation.

The causes of dacryocystitis must be looked for in the obstruction of the nasal duct. This infection may be from either the nose or the conjunctiva. The latter is far less common than the former, but will occur in cases of severe pneumococcal and streptococcal inflammation of the conjunctiva, especially where there is a formation of membrane, and particularly in these classes of cases affecting children. In the majority of cases there is a stricture of the nasal duct and in consequence the events above described follow in due course. This stricture is most frequently at the neck of the sac, less often at the lower end of the duct. It has its origin from some pathological condition of the nasal mucus membrane, conveyed to the mucus membrane of the duct such as chronic rhinitis, and ozena is not infrequently present in dacryocystitis. Ulceration of the nose, even tuberculous or syphilitic, is responsible for many cases, and tumours, particularly polypi, must be added.

The treatment of the condition and its success depends on the length of time it has been allowed to proceed; it is so often that an early case is met with. The discomfort of the continual discharge and often an attack of acute inflammation drives the patient to the surgeon.

If a case be seen early syringing out the sac frequently, with regular application of pressure over the sac to empty its contents, will bring back a healthy condition, provided that any obstruction of the duct has been removed. This may be done in slight strictures and early cases, by passing small medium-sized probes, after dilation of the canaliculus, without suturing the sac. The dilation of the canaliculus should be done carefully until it will take a No. 3 conical probe, which should then be passed into the sac horizontally until its point rests against the inner wall of the fossa saccus lachrymatis and then, keeping its point applied to the inner wall, its direction should be changed to the direction of the duct, that is, downwards, outwards and a little backwards, which is well indicated on the surface by the line of the sulcus between the nose and the cheek. It is never wise to commence probing with the finer probes, as much injury may be done and false passages made if any force is used to overcome obstruction; frequently folds of mucous membrane are encountered in which the point of a small probe will be entangled but which present no difficulty to the larger sizes. It happens sometimes that, after probing successfully with fairly large probes, the point of the syringe is with difficulty passed owing to bands of tissue of the canal and to be withdrawn again and again before its point can be induced to avoid the obstruction. Having passed a probe: through the stricture and left it in a short time, the duct should be syringed through and if the whole duct is open, the fluid will pass into the throat. If this does not occur there is a second stricture below the first that the probe has not passed through, which must be dilated also. To ascertain that the probe has passed through the whole length of the duct and its point rests upon the floor of the nose, a second probe should be laid parallel with the first along the outside of the cheek, end to end, its lower end will indicate the position for the lower end of the probe in the duct, or the point of the probe may be looked for in the nose with the aid of a nasal speculum.

In the other cases the stricture will require lengthy treatment and large probes will have to be passed to counteract the tendency of the stricture, particularly if it is old and fibrous, to contract again. To admit large probes the canaliculus, the lower one, must be slit with a Weber's canaliculus knife. Probing should be done regularly, at least once a week and the size of the probes gradually increased at each sitting, until a No. 10 or 12 is through.

The treatment by probing has to be continued for many months, the patient attending, not infrequently, for a year or more.

When once the passage is free a few drops of 10 per cent. protargol or 15 per cent. argyrol may be applied after syringing.

Finally under certain conditions recourse must be had to operative interference of a radical kind. I refer to removal of the lachrymal sac. This operation may be undertaken for the following reasons: (1) For extensive contraction or obliteration of the duct; (2) where it is impossible to pass a probe or where the passage cannot be dilated beyond the capacity of the finest probes; (3) Where there are changes in the bones, often of a tuberculous or syphilitic nature; (4) in atony of the sac, the walls of the sac having lost all elasticity, and the conduction of tears failing even should an open duct be obtained; (5) similarly in hydrophthalmia of the sac; (6) in those patients who have not the time or inclination to undergo the lengthy treatment of probing; (7) and finally, before proceeding to perform any major operation upon the eye, especially preparatory to cataract extraction. No operation requiring a wound of the eye should be attempted if it can be avoided whilst pus can be regurgitated from the lachrymal sac, for it will assuredly end in panophthalmitis and loss of the eye.

After removal of the lachrymal sac it is not infrequently found that the patient makes no complaint of epiphora, though, of course the drainage passages have been obliterated, and the reason must be found in the small amount of tears secreted. As a matter of fact in normal quiet activity of the lachrymal gland, the amount secreted just suffices to replace that lost by evaporation. Should there be sufficient overflow of tears to cause discomfort, which cannot be kept in check by applications to the conjunctiva and the removal of all sources of irritation, removal of the accessory gland will have the desired effect. In doing this the ducts of the main gland, at least many of them, will be cut across, and the supply from the glands considerably reduced, the lachrymal secretion being supplied through the remaining ducts and by Krause's glands.

NOTE.—A Clinical Lecture by a well-known teacher appears in each number of this Journal. The lecture for next week will be by A. H. Tubby, M.S.Lond., F.R.C.S., Surgeon, Westminster Hospital; Subject: "The Treatment of Ankylosis by the Formation of New Joints."
ORIGINAl PAPERS.

THE RESULTS OF RADICAL OPERATIVE TREATMENT OF CANCER OF THE UTERUS.

By THOMAS Wilson, M.D., Lordl., F.R.C.S., Eng., Professor of Midwifery and Diseases of Women in the University of Birmingham.

In a short historical introduction, it was pointed out that in the early eighties, the different forms of amputation of the cervix enabled a five years' absolute cure to be effected in less than 2 per cent. of the cases of uterine cancer that applied for treatment. Vaginal hysterectomy increased the total curability to from 4 to 10 per cent.; the extended operation by way of the vagina, and the abdominal method popularised by Wertheim, have each possible a percentage operability of 45 to 60 per cent., and an absolute curability of 15 to 20 per cent., as claimed in some of the larger Continental clinics.

In this country the abdominal operation is becoming the routine method, because, in the first place, it affords better oversight of the field of operation than the vaginal method; in the second place, because operations by the vaginal route have never been extensively practised here, and thus skill is easier of attainment in a new operation if it is performed by the abdominal method; and thirdly, because only by the abdominal route is it possible to remove the affected glands. This last advantage is likely to prove of increasing value in the future. Many operators in their haste have concluded that it is useless to remove the glands, and have stated that when they are invaded the disease always recurs after operation. Wertheim has, however, published 13 cases in which carcinomatous glands were found, and which nevertheless remained free from recurrence for upwards of five years. For stated reasons the abdominal operation is likely to become more and more generally adopted. It cannot, however, be applied to all cases. The prolonged Trendelenburg posture is dangerous for old patients, for those who are very fat, and for certain women with visceral complications. In such cases the vaginal operation affords a better immediate outlook, and in the old patients especially it is often followed by a long freedom from recurrence.

DIFFICULTIES OF ESTIMATING RESULTS OF OPERATIONS FOR CANCER.

The difficulties of estimating justly the results of any curative method of treatment of cancer are very great by reason of the uncertain course of the disease. In different patients the earliest symptoms make their appearance at very various stages of the disease. The duration of the disease is in the highest degree uncertain; of two women with the affection apparently in the same stage, one may die in a few weeks and the other live for several years. In the practice of the operating surgeon groups of cases, successful as regards ultimate cure, alternate with other groups apparently similar, but all ending in rapid recurrence. All which things tend to show that the actual living virus of cancer, when at length it is discovered, will be found to progress through varying phases of growth and activity, now active and virulent, now stationary or sluggish.

These uncertainties in the course of the disease have been illustrated, and to some extent ex-
paring the total number of cases of cancer that apply for treatment with the number known to be free from recurrence five years later. And even here there are many opportunities for error.

Another important observation that should be, but is not, superfluous must be made: that under no circumstances is it any longer justifiable to publish the mixed results of treatment of cancer of the body and of the cervix. The two varieties should be kept entirely distinct and separately discussed.

In the large German clinics we find that the cases of cancer of the uterus cervix afford a ratio of operability of 45 to 60 and even higher, and an absolute curability of 20 per cent. Wertheim's five-year completed statistics of 450 cases show an operable ratio of 46 per cent., with a primary mortality of 19.5 per cent., and an absolute curability of 19 per cent., 186 of 979 patients being known to be alive and free from recurrence at the end of five years.

In this country, with rare exceptions, the operability is not greater than from 30 to 40 per cent., and the total curability than 10 per cent. The low operable ratio is not due to any difference in the disease, but rather to the fact that the general public and the main body of the medical profession have not grasped the truth that uterine cancer is curable in a large proportion of those cases that apply early for treatment. The consequence of this ignorance is that women do not seek medical aid promptly, and that when they do the necessary investigation is only too often delayed.

The Surgery of Uterine Cancer in Great Britain.

Published papers in the British journals on the extended operation for uterine cancer have been comparatively few, and to a large extent made up of descriptions of technique with occasional suggestions for its improvement. There are no British five-year statistics.

My own work on uterine cancer has been done in the gynecological department of the Birmingham General Hospital. I have taken all the cases applying for treatment in the out-patient department and all those admitted to the wards, and have added all my own private cases. My thanks are due to Miss M. B. Webb, M.D., whose very efficient and enthusiastic help in following up my results I here gratefully acknowledge.

From the year 1896 until December 31st, 1913, there have been 566 cases of uterine cancer. Of these, in 67 the disease affected the uterine body, and in order to clear the ground I deal with these first. Among the 67, 15 vaginal hysterectomies with no mortality, and 29 abdominal hysterectomies with 3 deaths, were performed. The five-year results are given in the accompanying table:

Cases of Cancer of the Uterine Body seen until June 30th, 1909.

<table>
<thead>
<tr>
<th>Category</th>
<th>Number</th>
</tr>
</thead>
<tbody>
<tr>
<td>Total cases seen</td>
<td>50</td>
</tr>
<tr>
<td>Radical operations</td>
<td>31</td>
</tr>
<tr>
<td>Deaths following operation</td>
<td>2</td>
</tr>
<tr>
<td>Cases free from recurrence</td>
<td>12</td>
</tr>
<tr>
<td>Absolute curability</td>
<td>24%</td>
</tr>
</tbody>
</table>

The absolute curability of cancer of the body of the uterus here shown appears small when compared with the rate of 50 to 75 per cent. usually claimed, but I believe the latter rate is based largely on fallacies and small numbers, and will prove to be exaggerated.

Cervical Cancer.

Until the end of 1913, there were 520 cases of cancer of the cervix uteri. These can be conveniently divided into two groups according as operation by the vaginal or the abdominal route was the method of choice. In the first period, lasting until the end of 1905, there were 246 cases, of which 37 were operated upon by the vaginal method with 1 death, and 7 by the abdominal route with 6 deaths. In the second period, from January 1st, 1906, to December 31st, 1913, 274 cases were seen, among whom 20 were operated upon by the vaginal route with no deaths, and 72 by the abdominal with 8 deaths. The total immediate mortality of the vaginal method has been 57 cases with 1 death, or less than 2 per cent.; and of the abdominal, 79 operations with 14 deaths, or 17.7 per cent. The great majority of the abdominal hysterectomies were performed by Wertheim's method.

The ratio of operability has steadily increased; in the years 1896 to 1899 it was 14 per cent.; in the last four years it has been more than 30 per cent.

My total five-year results up to June 30th, 1909, have been investigated and show that, with an increased operable ratio and the adoption of the abdominal method of operation, the absolute curability of my cases has risen from 5.5 to 10.2 per cent.

Results of Vaginal Hysterectomy for Cervix uteri.

<table>
<thead>
<tr>
<th>Category</th>
<th>Number</th>
</tr>
</thead>
<tbody>
<tr>
<td>Total cases</td>
<td>288</td>
</tr>
<tr>
<td>Average operability</td>
<td>31</td>
</tr>
<tr>
<td>Death following operation</td>
<td>1</td>
</tr>
<tr>
<td>Patients survived</td>
<td>16</td>
</tr>
<tr>
<td>Absolute curability</td>
<td>5.5%</td>
</tr>
</tbody>
</table>

Abdominal Hysterectomy for Cancer of the Cervix uteri.

<table>
<thead>
<tr>
<th>Category</th>
<th>Number</th>
</tr>
</thead>
<tbody>
<tr>
<td>Total cases</td>
<td>98</td>
</tr>
<tr>
<td>Operable ratio</td>
<td>32.5%</td>
</tr>
<tr>
<td>Deaths following operation</td>
<td>9</td>
</tr>
<tr>
<td>Patients survived</td>
<td>10</td>
</tr>
<tr>
<td>Absolute curability</td>
<td>10.2%</td>
</tr>
</tbody>
</table>

Of the patients surviving operation, 16 of 51 = 31 per cent. of the vaginal, and 10 of 23 = 43 per cent. of the abdominal, remained well and free from recurrence for five years and upwards.

It follows from my experience that the final results are steadily improving and may be confidently expected still further so to do. The immediate mortality of the extended abdominal hysterectomy for cervical cancer has fallen; thus, in my own work, in the six years ending December 31st, 1913, there were 6 deaths in 62 operations, a rate of about 10 per cent. The operable ratio has doubled in the last ten years, and may be expected to rise considerably further when the possibilities of the operation are grasped by the profession at large and by the public. The total number of patients remaining free from recurrence for five years and upwards has also increased nearly twofold in the last decade, and we may hope before long with the surgical methods now at our disposal to achieve an absolute curability of 25 per cent. of all cases of cancer of the uterine cervix.
THE DRUG TREATMENT OF DYSMENORRHEA. (a) By J. C. M. WALTER, M.A., M.D., L.L.D., D.P.H.

If we take up any book on "Diseases of Women," and look at the chapter on dysmenorrhea; dust out the platitudes, the theories, the traditional teachings, and the silly superstitions, and come down to the rock-bottom question, what does it teach me to do for the woman who is in recurrent pain, and who refuses to consider any operative measure? There are some vague mumblings about general hygiene, exercise, free bowels, suitable clothing—with suggestions as to a stay in bed, a hot water bottle, perhaps a little broth of potassium or phencarin, and a portentous warning against alcohol or morphia.

My friend, George Bernard Shaw, describes all professions—and especially the profession of medicine—as a conspiracy against the public. Probably he means that we are united for the purpose of enforcing fees for our services. Do we always give honest value for our fees? Does the gynecologist give honest value to the mother when he warns her to give up the glass of toddy, with which she generally will cure her daughter's dysmenorrhea—and substitutes some coal tar compound? The gynecologist promptly says yes—he prevents the girl from becoming an habitual toper; he claims to have saved her from a drunkard's grave, and he thinks his guinea is well earned thereby. Of course this is hooey. Carlyle to the contrary notwithstanding, the number of fools is not great—amongst the class of people who pay fees. What happens in practice is this: the mother, warning from the doctor's draught is not nearly so effective in curing her monthly pains as her accustomed glass of gin toddy, is forthwith filled with a fanatical faith in the virtues of alcohol.

Let me shock you—if obstetricians can be shocked. I believe that if alcohol or morphine cure dysmenorrhea and if we know of no better drugs—then we ought to give alcohol or morphia. Nobody in this neurotic twentieth century has a right to be deprived of relief from pain—or be kept from indulging in the little indulgence, bibi, cito et juvente, simply because there is a possibility of forming a bad habit. This argument, if faced honestly, would wipe, not only alcohol and morphia, but everything that makes life worth living, out of existence.

If alcohol be an effective remedy for amenorrhea, you ought, I submit, to give alcohol without any cant about the fear of making the woman a secret tippler. Observe, I say you ought to give alcohol very—very cautiously to the woman whose patient you take to a stiff glass of punch, some hot port wine, or some gin whenever she has a monthly pain.

You remember that in our superior way we used to sneer at our predecessors, who ordered egg-flip as a prescription under the portentous title of mistura spiritus vini gallici, or who, when they wished to exhibit opium, prescribed a pill described as pilula saponis composita. They were simply wiser than we. They understood the psychology of the prescription. Thousands of women have been seduced into drinking habits by the knowledge of the potency of alcohol as an anaesthetic in amenorrhea, and by their experience of its soothing effects in time of acute unrest, but had the physician been content to order the alcohol as a medicinal draught to such abuse would follow its use, and he would have the credit of devising a real cure for a troublesome ailment. Alcohol in amenorrhea is made much more active by certain essential oils. In some cases the effect of those aromatic oils is simply carminative; in others they appear to have almost a specific effect on the apparatus for menstruation. A convenient form in which to administer these aromatics is the tincture carminativa of the codex. You prescribe about a dram of this in a little hot water every three hours whilst pain exists.

So far I have simply made one point—namely, that the doctor, being satisfied that alcohol gives relief, shall prescribe it, not sub nomine but as an ordinary draught, whose composition is known only to the physician. This is by no means a minor point, for there is much difference between curing a patient yourself and sending her a sharp-pointed curette with instructions how to do the job as there is between prescribing an alcoholic compound as a prescription and direct giving a patient a little wine or whiskey herself.

Most of us will agree, I think, that morphine cures the pain of dysmenorrhea. Most of us declare with horror against its use. I submit that the physician should not hesitate, as often as necessary, to administer it hypodermically himself, taking care to disguise its nature from the patient.

We ought to have a more extended armamentarium of drugs than alcohol and morphine. Next in the order of activity comes phenacetin. It is simply the best of the coal-tar compounds for dysmenorrhea. Do not order it in tablet form, but in separate draughts made up with a little mucilage, carminative tincture, and essence of ginger. Do not give a timorous ten-grain dose, but boldly administer fifteen grains, at least, for the first dose, and repeat it as required. Phenazone is not as satisfactory in dysmenorrhea as phencatin, but may be used where the therapists object to the insoluble powder. Pharmacologists, but in my opinion it is distinctly useful in the cases under discussion. It should not be prescribed alone, but in doses of about four grains, combined with eight of sodium bicarbonate and one grain of caffeine.

I need scarcely touch on the bromides; they have always been used in this disorder, and will always continue to be prescribed; but their tendency is, I think, to depress that excitatory function which is so often wish to augment in those subjects to dysmenorrhea and phencatin.

Of the organic extracts, thyroid, parotid, ovarian and luteal, have been used. The best of these is thyroid. If there be no organic obstruction, such as stenosis of the cervix, and when the ovaries are sound the normal balance of metabolism seems to be restored and the amount and regularity of the flow to become improved. When the abdominal pain has been removed about 10 to 15 grains may be given daily for eight or ten days preceding the date of menstruation.

Belladonna relieves dysmenorrhea best as a suppository—the 1/2 P. belladonna suppository containing about 1 1/2 grains of the extract is quite a potent preparation.

Many gynecologists are inclined to deride
the use of external remedies for this ailment. Some external applications are of distinct value—by far the most active being oil of wintergreen. It is not my business to discuss the theory of its action. It certainly gives extraordinary-relief. It is best applied by painting freely a 30 per cent. solution of oil of gaultheria in almond oil over the affected quadrant of the abdomen every four hours. In more acute cases it may be used with rectified spirits of wine—2 parts to 1 of wintergreen covered with cotton wool. In certain cases about ten per cent. of menthol may be added. It is probable that external remedies are useless as antidotes except wintergreen, menthol, and, perhaps, cocaine.

The only usefully in dysmenorrhea, but only, I think, when applied to the nasal mucous membrane. It is needless to discuss whether there be euritogenic centres in the nose. Every practitioner has noticed a very close connection between nasal affections, especially those of a stenotic or catarrhal character, and affections of the genital apparatus in both male and female. You also find that you can often cure the one affection by treating the other. Of course there is question of a cocaine habit, but quite a weak solution of cocaine, say six to eight grains to the ounce of glycerine and borax applied with a brush to the nares, or used as a spray-diluted with water, is quite effective.

Hot hip baths with mustard and turpentine stipes are always admirable, but only as convenient methods of applying heat and counter-irritation.

Some people sneer at the list of about fifty drugs, which a certain treatise on treatment gives for dysmenorrhea, but there are obscure cases which baffle even the special treatment selected from a wide range of remedies. Gelsemium, either alone or with croton chloral, is excellent in neurotic and neuralgic creatures. I think chloral hydrate is specially indicated in the dysmenorrhea of the florid and full blooded. Fifteen grains of it, with as much bromide of potassium, and as many minims of tincture of gelsemium given in chloroform water every three hours when required, is a splendid treatment. For the gelsemium about a drachm of succo hyoscyaminii or their minims of tincture of sem. Stramonii may be substituting. Apioi seems to be getting into disrepute and valerian regaining confidence. I have given both drugs pretty freely, and think apioi of most use where scantiness is the major trouble, and valerian where the spasmodic paroxysmal pain predominates. Viburnum prunifolium is probably of more value where the dysmenorrhea is due to affections of the uterus, rather than the tubes or ovaries. Certainly it seldom fails to relieve when given with phenaetin and bromides, but one is doubtful to which of the drugs the credit is due.

I have omitted ergot from the category so far, because although one often orders it with apparent advantage, one hesitates to say that it is a drug which can ordinarily be prescribed with confidence and safety.

Let me finish with an old-fashioned remedy, but one of real merit—asafoetida. Despised by many is an old woman's case, its penetrative volatile constituent seem to have an almost specific effect on the ovaries, and though perhaps too stimulating in some cases it is very useful where dysmenorrhea is due to sluggishness of function.

SAN REMO AS A WINTER HEALTH RESORT.

By PROF. H. KRAUSE.

The number of health sanatoria of various kinds, which started some few years back, especially in Germany, increases from year to year, and the specialisation of such establishments, equipped with the most modern requirements, is being continually developed. Consequently those health resorts, whose benefit depends chiefly on their climatic surroundings, begin to struggle hard in the general competition. Winter resorts, too, a growth of the last ten years, have proved a great attraction to the exercise-loving members of Western Europe, and will continue to attract many of those who formerly in the colder months sought the comforts of the Sunny South. Thousands of people, who formerly used winter by winter to frequent the southern watering-places, now satisfy their craving for open air and healthy exercise in the highlands of Switzerland and the Engadine. Still a considerable number of winter travellers cannot resist the charm of the Riviera climate, and the only reason to account for this is the incomparable attraction of the winter sun, which, combined with the warming properties of the Mediterranean, fashions, as it were, from the winter a sub-tropical vegetation and transplants the traveller, after quite a short journey, from the grey, austere northern atmosphere to the verdant beauty and charm of spring.

However, we do not wish to speak of the crowd who throng to such places in quest of pleasure or amusement, but of the weary and heavily burdened, to which either the sanatorium or climate or both are to bring renewed health and vigour. Sanatoria have of late years gradually changed from a general to a highly specialised type, the various climatic resorts differing from each other in many respects, such as the humidity or density of the air, wind force and mean temperature, each having in consequence a different therapeutic value. Nearly twenty years have gone by since Leyden at the International Medical Congress held at Moscow introduced the following words:—

"The time has come when the homes of our tubercular patients no longer bleach in the cemeteries of the Riviera: the poor sufferers can die at home." From this followed the introduction of the many highly organised tuberculosis establishments, which now exist, and based on these models other sanatoria have been founded year by year for other diseases, in which the patient can reckon on finding competent doctors and meeting with all possible care and comfort, especially if the case is a surgical one, requiring several weeks or months of treatment.

The situation is, however, different in many chronic cases, which may last for years. Doctors no longer require patients suffering, for example, from diabetes, tuberculosis, tabes—if they have the necessary means, to remain for years of their lives in sanatoria; indeed, most of the sufferers would be unwilling to do so. For such cases a sanatorium in our day is a hygienic, dietetic, and school, which sometimes doubtless accomplishes the process of healing, but more usually merely prepares or introduces it by bringing before the
patient in a permanent way the particular conditions of life which suit his particular case. When he has passed through this course of schooling, which in the less severe cases may require but a short time, the important question presents itself to the physician, whether a further stay, although advantageous to the disease itself, may be harmful to the patient's psychical state of mind. No experienced medical man, especially in chronic diseases, underrates the force of moral resistance. A healthy man according to his needs and means is allowed to choose for himself his place of life and environment, and the same principle, as far as possible, should be conceded to the invalid.

Authorities are beginning to declare against a too lengthy stay in a sanatorium, and in suitable cases shorten the period of isolation and advise a return to normal professional life: even in less favourable cases a release from strict discipline is often thought advisable and time and opportunity are afforded to the patient to put into practice the self-control and mode of life which he has been taught in the sanatorium.

When the time for this change of treatment comes, the patient turns instinctively to the South. Even in plant life this yearning for light and sun manifests itself, and the physician would be wrong to oppose it on principle. The mere number of medical men themselves, who seek and find renewed health and strength on the Riviera, will force him to renounce his opposition. How many of my colleagues have contended as much to me: they have found it for themselves and they will hand on the discovery to their patients.

I myself have the daily opportunity of observing that under the influence of the Riviera climate the effect and processes of medical treatment are so much quicker and more favourable, and I can no longer doubt that this climate possesses in a very high degree a stimulating power, which extraordinarily hastens the cure. Nor can we be surprised at the astonishing number of reports made at the Congrès International de Thalassothérapie de Cannes, 1914, on the enormous curative effects of the cure sea, that have been treated in cases of pulmonary tuberculosis and diseases of the bones, states of weakness, maladies of heart, nerves, anæmia, nephritis, &c. I have made a few but very satisfactory experiments in sun-treatment, and now can mention with pleasure that a helio- or surgical cases has recently been opened at San Remo in a favourable situation close to the sea: this contains big glass-covered verandas for helio- and orthopaedic gymnastic apparatus. Comparing the favourable accounts of French doctors with my own experiences of the Riviera climate and the successful treatment of many patients in San Remo, I maintain that in certain categories of diseases it is of the highest importance to give a thorough trial to this method. Especially favourable results are obtained in the treatment of weakness and convalescence, anæmia, neurasthenia, arterio-sclerosis, diseases of the heart and blood-vessels, chronic nephritis and surgical tubercular exudations. My personal experiences are more immediately concerned with affections of the upper air-passages, catarrh of the middle ear, asthma bronchiale nervosum et catarrhale, and neurosis of the respiratory and circulatory organs, tuberculosis of the lungs and throat. The treatment of these I have always found a great and welcome aid in the climate of San Remo. Its desiccating property is well known, which most efficaciously promotes resorption through the dryness of the air, the evaporation of its exceptionally salty sea-water, and the radiation of its ever-present sun. In San Remo I have been better satisfied with the course taken by many even advanced cases of diseases of the larynx than in the ungenial climate of the north: not rarely small (?) excisions suffice to introduce the resorption of external sinuses and promote the cicatrization of ulcers. It may be admitted that in such cases, favourable social conditions, different surroundings, complete rest have their influence, but a remainder is always due to the climate alone. In San Remo, too, less severe cases of lung trouble react satisfactorily, especially where weakness of the heart is an aggravation. In my opinion this weakness of the heart represents a very special indication for the choice of the San Remo climate. A large number of cases have been sent to us from sanatoria of the plain and mountain, which have been very favourably influenced here. Whether this amelioration has been caused by augmentation of the red cells, hemochrom and hematin, due to the influence of the sea, and attested by trustworthy observers, or has been due to the strengthening of the heart muscle by the mild sea air, or to the easier and more extensive respiratory and circulatory action, or to the co-operation of all these phenomena, I cannot say, but in any case the patient's respiration deepens, appetite and weight increase, infiltrations become clearer and disappear, coughing and expectoration lessen. Similar observations have induced Professor Torianini, of Pavia, the famous inventor of the artificial pneumo-thorax, to make San Remo a residence for his patients, his successful treatment of whom is so universally recognised.

Particularly worth mentioning I think are my observations on bronchial asthma, which I have had to now treat according to the principles given in my pamphlet "Zur Therapie des Asthma bronchiale" (Therapie der Gegenwart, July, 1913). Proceeding in this way, particularly in cases of nervous asthma, I found (?) the psychical therapy confirmed, and this was combined with the ascertaining and removal of the special causes (e.g., respiration through the mouth, affections of the nose and pharynx, digestive troubles, vagotomy, &c.). Moreover, the asthmolysin, mentioned in my pamphlet, has proved an excellent nerve-stimulant, but in minimum doses prophylactically: it undoubtedly renders superfluous the abundant use of narcotics. But here, too, we must not overlook the part which the climate played in the treatment. I have certainly found it easier in San Remo than in other resorts to cure the complicating neurasthenia and catarhal symptoms. The deciding factor in a permanently successful treatment of asthma is not this or that medicament, this or that surgical operation, but the invigoration of the mental and bodily energies of the patient struggling against the causes which provoke the disease.

For such patients I find in San Remo two well-managed health establishments at my disposal, the Villa Azzurra (Dr. Fischetti) and the Bellevue
THE ROLE OF TUBERCULIN IN TUBERCULOSIS. (a)

By NATHAN RAW, M.D.,
Physician, Mill Road Infirmary, Liverpool.

In this short note I must confine my remarks purely to the pathological aspect of tuberculin and its general bearing on the treatment of tuberculous infections.

In order to understand the effects of tuberculin when injected into the human body, it is necessary to briefly refer to the varieties of tubercle bacilli and their influence in producing varying lesions in the human.

Originally of a common species, it may reasonably be assumed that long environment has resulted in three distinct types:

1. The *typhus humanus*.
2. The *typhus bovinus*.
3. Avian bacilli.

THE PREPARATION OF TUBERCULINS. (b)

The various "tuberculins" are preparations from tubercle bacilli, or from the media in which they have been grown. Koch introduced his first tuberculin in 1890, long before the specific treatment of chronic infections by injections of bacterial emulsions became general. The main varieties of "tuberculin" may be regarded as marking stages in the progress of Koch's investigation.

Koch found that the injection of sterilised cultures of tubercle bacilli, even in considerable quantities, into healthy guinea-pigs produced only local suppuration; in tubercular guinea-pigs very small amounts of the same preparation caused death. By the methodical use of high dilutions, so that the doses given produced no violent reaction, the tuberculous process was apparently arrested. Koch observed, further, that emulsions of bacilli (in the quantities he used) remained unabsorbed at the site of injection and caused suppuration. From this he argued that the curative constituent must be soluble. Thus originated the tuberculins containing those constituents and products of the tubercle bacillus which are soluble in the medium (gycerin-veal bouillon) in which it is grown. For their preparation the organism is grown for six weeks as a film on the surface of the broth.


By merely filtering off the organisms from the six weeks' culture the two bouillon filtrates commonly known as T.O.A. (Tuberculin original air, prepared with a bacillus of human origin) and P.T.O. (Perlsucht Tuberculin original, from a bovine strain) are obtained. These are the two tuberculins, and are, for that reason, now used by many workers at the commencement of a course of immunisation.

OLD TUBERCULINS (T. and P.T.).

The tuberculin first introduced by Koch, however, was a concentrated preparation made by evaporating the six weeks' broth culture to one-tenth of its volume, and filtering. This preparation, commonly known as "old tuberculin," also exists in two varieties, made respectively from human and bovine strains of the bacillus, the latter being distinguished as Perlsucht Tuberculin (P.T.). This old tuberculin was introduced into therapeutics before the experiments necessary to determine the proper dosage, frequency of administration, etc., were complete. The result was disappointment and, in not a few cases, disaster. The treatment fell for the time into disrepute, and in Great Britain, at any rate, was practically abandoned until within the last few years. As an aid to diagnosis, however, tuberculin continued to be used, and for this purpose old tuberculin is still the preparation always employed.

The old tuberculins and bouillon filtrates may be classed together as "exotoxic" tuberculins, as distinguished from the "endotoxic" preparations, also called "new" tuberculins.

NEW TUBERCULIN (T.R.).

Meanwhile, Koch was experimenting with a view to the production of a tuberculin which should produce immunity to the bacilli themselves, since he had come to the conclusion that old tuberculin immunised only against their soluble toxins. The following process is that which he adopted to secure this. Young and highly virulent cultures are dried in vacuo and then ground in an agate mortar until the microscope shows no intact bacilli. Distilled water is added, and after thorough mixing, the suspension is centrifuged. The upper layer, an opalescent whitish fluid called by Koch T.O. (Tuberculin Oberschicht), is decanted off and discarded. The deposit is again dried, ground, treated with distilled water, and centrifuged. The supernatant fluid from this and subsequent similar extractions is kept, the process being repeated until no deposit remains. The successive extracts, with the exception of the first (T.O.), are mixed, glycerine to the extent of 20 per cent. is added, and the fluid is made up to such volume that each c.c. corresponds to 10 mgs. of the dried bacilli with which the preparations started. Apparently, however, only a portion of the original bacillary substance reaches the final product, since the latter, known as T.R. (Tuberculin Rückstand), is said to contain only about 2 mgs. of organic solids per c.c.
NEW TUBERCULIN (B.E.).

Working on the subject of agglutination, Koch found that the agglutinating power of the blood was increased more rapidly by injections of dead tubercle bacilli than by T.R., and was thus led to devise still another immunising preparation, bacillary emulsion (new tuberculin, B.E.). This consists of an emulsion of one part of dried pulverised tubercle bacilli in 100 parts of distilled water, to which 100 parts of glycercine are added. Bacillary emulsion is analogous to other vaccines consisting of sterilised emulsions of bacteria, and may be supposed to act in the same way. As compared with T.R., it has the advantage of requiring a much less difficult and complex process of preparation; in the doses now in use it has not been shown to be inferior in other respects. It is used for curative purposes.

In my endeavour to find if it was possible to protect animals from an acute infection by means of tuberculin, I inoculated twelve guinea-pigs and rabbits with large doses of human and bovine tuberculin, leaving them for three weeks and then injecting small doses of tubercle bacilli of the opposite strain to the tuberculin used.

In no case was I able to produce a complete immunity, although I thought that the infection was not so virulent and did not tend to progress.

Other observers have obtained the same results, so that I think we are justified in our conclusion that by means of tuberculin only we are not able to completely immunise an animal against infection, even for a few weeks.

With regard to the cultural appearances of the different strains of bacilli we have to admit that they are not constant. After having made some hundreds of pure cultures of all types, I am not at all certain of picking out the individual strains in many instances, although as a general rule one can do so.

The cultures which I show to-night are fairly typical of their type, but some intermediate types, as described by the English Royal Commission, are sometimes met with.

It comes to this, then, that we have not yet in our possession any certain method of distinguishing accurately the precise nature of a tuberculous infection, hence we cannot accurately decide whether certain lesions are of human or of bovine origin. I hope that soon our cultural and bacteriological methods will be so improved as to decide this important question.

In the paper which I published in the British Medical Journal in 1907, I ventured to suggest that a considerable amount of tuberculosis in children was caused by the bovine tubercle bacillus. Since that time a great amount of scientific investigation has been carried out over the whole world, and especially by our own Royal Commission, with the result that we are now certain of the following conclusions:—

1. That the great mass of tuberculosis, occurring in the human subject in the form of pulmonary tuberculosis, is caused by the human bacillus (typus humanus), and is conveyed from person to person by infection.

2. That a considerable amount of so-called surgical tuberculosis in children and adults is caused by the bovine bacillus (typus bovis) received into the alimentary canal through milk and food.

Originally of a common species, the bacilli have, owing to long environment in different hosts, assumed marked characteristics, so that we are able, experimentally, to divide them into two types:—

(a) Bacilli of the typus humanus, which cause:
   (1) Pulmonary tuberculosis and pleurisy.
   (2) Secondary tuberculous enteritis.
   (3) Tuberculous laryngitis.
   (4) Fistula in ano, and possibly some other lesions.

(b) Bacilli of the typus bovis, which cause:
   (1) Primary abdominal tuberculosis.
   (2) Tuberculous lymph glands.
   (3) Tuberculosis of bones and joints (probably).
   (4) Genito-urinary tuberculosis.
   (5) Acute miliary tuberculosis.
   (6) Lupus. Meningitis.
   (7) Pulmonary tuberculosis (a small percentage).

I have for the last twelve years separated my wards in hospital into human and bovine wards, and after an observation of over six thousand cases of tuberculosis, I am impressed with the fact that it is rare to see lesions of the human and bovine type associated in the same patient. In fact, they seem to be antagonistic to each other, so that one rarely observes a patient suffering from pulmonary tuberculosis develop any other lesions beyond those mentioned in the human group. It is also rare for cases of gland or bone tuberculosis to develop true pulmonary tuberculosis except in the course of a general systemic infection.

It is necessary to mention this clinical fact to explain my reason for using tuberculins of the opposite strain in the treatment of the disease. There seems to be little doubt that a mild infection by bovine bacilli in the human body, such as neck glands, by way of the alimentary canal, will protect against an infection by human bacilli, and it is most probable that a large number of people are immunised against pulmonary tuberculosis in after-life by having been infected in early childhood by bovine bacilli through milk or food. In all the experimental work throughout the world it has been found to be a rare occurrence to find both types of bacilli in the same body.

VARIA TIONS IN VIRULENCE.

Whether or not a patient is going to be destroyed by tuberculosis seems to me to depend on two important factors:—

1. Virulence of infection;
2. Individual resistance.

The variability in virulence of the tubercle bacillus is well recognised. In many cases, fortunately, the injection shows little tendency to progress in the body, so that we constantly see in practice patients who have suffered from tuberculosis for twenty or thirty years. In other cases, the injection is virulent and rapid, and kills the patient in two or three weeks.

In the former cases the bacilli are of low virulence; in the latter they are highly virulent, giving the body no chance to offer any resistance to the attack.

TREATMENT BY TUBERCULIN.

It is in the avirulent bacillary infections that tuberculin is of such great service, and I have found it of little or no value in acute virulent infections.

The whole object of treatment by tuberculin is to produce an immunity in the blood against infection by tubercle bacilli; and, what is even more important, to prevent the further spread...
of the bacillary infection in the tissues. Whether or not it is possible to ever produce a complete lifelong immunity against tubercle is a matter of doubt.

As a result of my experience, I have found that the lesions in the body which are caused by the \textit{tubercle bacillus} are benefited more quickly and certainly if a tuberculin prepared from the opposite strain—namely, bovine tuberculin—is used; and in all cases of pulmonary tuberculosis I now only use bovine tuberculin. It is less toxic, and does not so readily cause reaction, is more easily tolerated, and causes the lesion to disappear from the sputum more quickly. For the lesions caused by the \textit{tubercle bacillus}—namely, lymph glands, tuberculous peritonitis, lupus, tuberculous disease of the bladder, bones and joints—I invariably use Koch's old tuberculin prepared from human cultures.

The question of dosage is of vital importance, and my routine practice is to administer a course of tuberculin in twelve weekly injections, then resting for a month, and, if necessary, repeating the maximum injection every week. My dosage is as follows, of either human or bovine tuberculin:

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A special watch must be kept on the temperature, pulse and blood. It is rare to observe a general reaction if the above dosage is carefully followed.

In a great many cases the tubercle bacilli disappear entirely from the sputum at the end of a course of injections, but, unfortunately, if the tuberculin is not persisted in they in many instances speedily return; so that in some cases of pulmonary tuberculosis the injections should be continued for an indefinite time.

Whilst tuberculin \textit{per se} cannot be expected to heal cavities in the lung or replace damaged tissues, yet it undoubtedly has the power of preventing the spread of the tubercle to healthy parts by means of its immunising effects. Time is thus given for repair of the affected tissues.

In conclusion, I would like to express my opinion, after treating over a thousand patients with injections of tuberculin, that it is a remedy of the greatest value, especially in early cases and where the deposit of tubercle is localised, as in one apex or in a lymph gland or single joint; but where the tuberculin is disseminated and complicated by secondary infections, the use of tuberculin cannot be expected to be of much avail. It ought, however, to be tried in every case with the hope of some relief or possible benefit, as we cannot allow the patient to suffer and die without making every effort to arrest the progress of the disease.

Tuberculin is not going to revolutionise the treatment of tuberculosis. It is a valuable aid to the other methods of treatment, hence it must be used with care and discrimination and with a full knowledge of its dosage and therapeutic effects.

I would conclude by saying that the best treatment we can offer to-day to a person infected with tuberculosiis is a prolonged open-air life, preferably in a well-conducted \textit{sanatorium}, excess of nutritious food, gentle exercise followed by plenty of rest, and a course of tuberculin by a careful physician.

**THE HOUSING OF THE WORKING CLASSES—STANDARD OF AN HABITABLE HOUSE IN TOWN AND COUNTRY.** (a)

BY A. B. DUNNE, B.A., M.B., B.C. CANTAB., Barrister-at-Law, etc., Medical Officer of Health for Doncaster and Rotherham.

The question of a standard of an habitable house is one which must have presented itself to most medical officers of health when called upon to discharge the duties under Section 20 of the Housing of the Working Classes Act, 1860.

I propose to limit my paper to a consideration of the standard applicable to houses inhabited by what may be broad ly termed the working classes. The question of a standard for new houses both in town and country presents no essential difference, although subject to modification by locality, type of workmen to be housed, rate of wages, etc.

Another point, and in my opinion a very important one, is what standard should be applicable to existing houses? This raises issues in which "the personal equation" of the individual medical officer of health must of necessity play an important part, and still more so that of the local authority.

Let us first of all direct our attention to the standard which is required for a house to be occupied by the regularly employed artisan or collier. For the less fortunate workman in the towns and the agricultural labourer a cheaper class of house is required, simpler and more restricted in its conveniences.

I have recently been interested in a scheme for housing the working classes initiated by the urban district council of Bentley, which may be regarded as a typical modern mining community. A type of house is designed to let at 7s. per week clear. A description of this class of house, designed by the council's surveyor, Mr. R. G. Whitley, for the accommodation of artisans and colliers, well illustrates the standard of an urban working man's dwelling.

The ground plan shows living room, scullery, food-store, coal-place, and closet; on the first floor there are three bedrooms. There are no outbuildings or projections from the main buildings, all are under one roof. The living-room is 12 ft. by 12 ft., 6 ins. clear, and scullery 11 ft. 6 ins., with copper, sink, and bath provided. A w.c. is placed in a closet, access to which and the coal-place is from the recessed porch of the back entrance.

There is a recessed porch to the front door. A food-store 6 ft. by 2 ft. 2½ ins., which ventilates directly into this porch, is provided alongside the living-room. A staircase 2 ft. 8 ins. wide leads directly out of the living-room, and is placed over the coal-store and closet.

The first floor contains three bedrooms as follows: No. 1, 12 ft. 6 ins. by 10 ft. 3 ins.; No. 2, 11 ft. 6 ins. by 9 ft. 6 ins.; No. 3, 9 ft. 6 ins. by 7 ft. 6 ins. All the bedrooms can be entered directly from the landing, and are provided with fireplaces, with the exception of No. 3. The frontage of such a house is 18 ft. 6 ins., and the depth 23 ft. 10½ ins., and are intended to be erected in blocks of six houses with a common garden.\(^1\)

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1. Paper read at the Congress of the Royal Sanitary Institute Blackpool, July 6th to 11th, 1914.
It will be noticed that no "hall" or "parlour" is provided. Such, then, is a standard house for, if one may so call him, a standard workman with a standard family. A few general observations are necessary. I take it that any dwelling intended for permanent occupation must be built of bricks for permanent occupation must be, and the currency of the building trade may term them. So far as I am aware, no cheaper form of material has successfully established its claim to supplant them.

**Site of Dwellings.**—Much of the present despicable state of the housing which we now enjoy is due to the fact that any place was thought good enough to build a house upon, and to a certain extent the same is true to-day. Therefore, one of the most useful provisions in any town-planning scheme is that which enables the local authorities to determine what parts of an area are to be allotted to dwelling-houses, factory sites, etc. Much lowly and otherwise unsuitable land for building-houses upon will thus be ruled out. Now that the value of direct sunlight is becoming more appreciated, there is additional reason that the living-room should have a south-east or south-west aspect. The minimum accommodation required resolves itself into the question of individual requirements and wages; but, apart from this, what should guide an authority in designing a house?

Having visited many workmen's homes, I am of opinion that a large sunny living-room, at least 14 ft. by 12 ft., is a sine qua non, and my opinion has been confirmed by answers I have received from housewives whom I have questioned, as well. It has been argued that another room or parlour should be provided; that the husband or young couple must be thought of. My answer is that the claims of the housewife come before the husband, and that the young couple will look after them, themselves. What use is a parlour in most cases? I have more often than not found them unfinished, or used to store the bicycle or pram in; sometimes let off to another family, or used as a bedroom for a lodger. The choice lies between a large, cheery living-room, with plenty of elbow-room, and a cramped living-room and a pokey parlour.

Is a "hall" required? No. This cannot be without sacrifice of valuable space which can be better utilized in the general living-room, than being wasted by being cut off as a dark, narrow passage, which leads to a front door seldom, if ever used.

Of what material should the floor of the living-room be? Much may be said for a board floor, but this presumes sound, seasoned wood, and good honest workmanship. A board floor is hard to keep clean, often harbours filth, and is much more difficult to scrub than a tiled one. I am myself in favour of tiles or "quarries" set in cement. Few will deny that one's own kitchen thus floored is amongst the cleanest and most comfortable of rooms. Ask a woman's opinion, which is easy to keep clean, and she will say a tiled floor. This floor is dry, clean and durable.

A good closed range is both economical in cooking and cleanly, and has this advantage over an open or Yorkshire range, that more than one pan at a time can be used for cooking. An essential in a living-room is the provision of one or more large cupboards. A good scullery is the necessary essential. I have presumed that water is laid on over a glazed earthenware sink provided with a large hardwood drainage board. A copper should be provided fitted with a galvanized iron cover, so arranged as to permit the steam to escape up the flue, easily. Lastly, there should be provision with both hot and cold water laid on, and should have a hinged lid to cover it when not in use. Much amusement has from time to time been aroused by tales concerning the uses to which the bath has been put. I have made it a point to examine as many baths as I could, and have not up to now found any rabbits or boxes of bedding-out plants kept in them. I think too much has been made of the misdeeds of tenants.

Is a water-closet an essential? In a house such as I am describing, erected in a locality where there is a public water supply and disposal system, a pedestal water-closet is an essential. Between the water-carriage system and any other, at all events as regards urban communities, "the verdict of the stricken field has been given," to use a picturesque phrase of the Lord Salisbury. The w.c. is placed in a closet which is isolated from the house by the rear recessed porch; this arrangement allows of a greater degree of privacy, and permits of a backyard unobstructed by outbuildings, an important matter when the washing is done at home and the clothes have to be hung out to dry in the backyard.

**The Foodstore or Pantry.**—This very essential provision has hardly received the attention which it deserves. At the Congress at York a very instructive paper was read on the subject which was regarded by me as a model. The foodstore in the past has been an after-thought, but I have noticed in the new colliery village houses that very satisfactory ones are provided; in fact, more so than in my own house, which is of the understairs type.

The ideal foodstore is on the ground floor, with one wall an outside one at least. It need not necessarily be large, as food is not bought and stored in large quantities nowadays, but it should be cool and well ventilated directly to the open air, and should not be placed under the stairs. A cold slab is a very useful adjunct. A space of 6 ft. 3 in. will usually be quite sufficient.

How many bedrooms should there be?—For the proper separation of sexes, which now is impossible in many houses, three bedrooms should be provided. In fact, the question of bedroom accommodation ranks along with the living-room as the two important questions in housing. As the usual size of beds are, double 6 ft. 6 ins., and 4 ft. 6 ins., and single 6 ft. 6 ins., and 3 ft., two of the bedrooms should be of sufficient size to accommodate a double bed. The larger will usually be occupied by husband and wife, and should in addition be able to take a small bed or cot for the little one. A room 12 ft. 6 ins. by 10 ft. 6 ins. by 8 ft. will do this comfortably.

The bedroom window should not be less than one-tenth the floor space; this, in my opinion, can with advantage be increased. Let me put in a plea for the sash window, a simple room to be more conveniently ventilated than by one of the casement type. The latter, with their cheap fittings, soon get broken and out of order, and then the window is seldom opened. The third bedroom should easily accommodate a single bed, but as single beds are but rarely used by the working classes, it were better that this room should be designed for the use of a double bed. All bedrooms should have a fireplace, but in the type of house we are considering it is usually impracticable to provide fireplaces in all three bedrooms. A ventilating opening must be placed in the outside wall.

**The Back Yard.**—Experience leads me strongly to urge the asphalting of the whole of it. In theory, to reserve the open part of it for flower beds is all very well, but in practice all uncovered earth soon becomes trodden down, and then soaked and soddened with tea-leaves, scraps of broken food, potato peelings, etc. Therefore, an
asphalted back yard is an essential, as thereby alone can it be kept clean and sanitary. Finally, sanitary dust bins should be provided. The walls of which a tins supplied are too small in most cases to contain the week's household refuse. Unfortunately, these tins soon get knocked about and worn out, and the lids lost, though fastening them by a chain to the house wall will obviate this. A back yard common to a block of houses should not be countenanced. It is a fruitful cause of untidiness and about everybody's business to keep is nobody's. The rule should be every house its own back yard.

When we consider the standard of a habitable house for the poorly-paid worker in the town and the agricultural labourer, we are at once faced with the difficulty that the average weekly income of the former may never reach $25, and in the latter rarely $15, or $20. How can these afford to pay, keeping in mind the expense of rearing a family and the enhanced cost of living? I certainly think that 4s. and 3s. a week are the utmost that can be asked, any more is at the risk of bringing up a semi-starved and impoverished population. Can houses be built to let within these rentals, and of what material? Shall there be a wall without minimum room accommodation? It has been suggested that the £100 cottage will solve the difficulty in the agricultural districts. Will it? I have my doubts, which I have confirmed by the account that I have read by Dr. R. W. C. Pierce in his annual report for 1915, to the Guildford rural district council on the cottages built by Mr. St. Loe-Strode.

The labourer is worthy of his home, which must be soundly built of durable materials, plain in character, and necessarily shorn of some of the conveniences and amenities found in the urban workman's home. To mention one in particular, a bath. At the church congress at Southampton last year, Lord Salisbury said that the agricultural labourer did not want one; his lordship's statement was warmly traversed. There are conveniences now lacking in many rural cottages which might well take precedence of a bath. How about a copper? It does duty for both purposes in thousands of homes. I should certainly prefer a copper to both any day. A boiling and the cottage housewife has my sincerest sympathies when she has to boil the weekly wash in the pot over the open kitchen fire.

As water will rarely be laid on, a well-designed privy should take the place of a w.c. Even for houses under the rank of the country mansion, an experience of country rectories in several dioceses has led me to maintain the opinion that there is much to be said for the advantages of the earth closet over the w.c.

Finally, as my paper would run into several appendices, I must conclude with a few words on the standard of habitability of existing houses. What provision is made, one in arriving at the conclusion that a dwelling house appears to be in a state so dangerous or injurious to health as to be unfit for human habitation? Local authorities are apt to take a different view from their professional and statutory advisers as to the grounds on which the representations are based. Briefly, I would such houses are existing alone in such a marked degree or in conjunction with other, as would support such a representation:

1. Dampness in living rooms of old houses, due either to walls built without damp courses, or of very hygroscopic materials, such dampness rising up the walls to a considerable height, or extending over a large area, and persisting even in dry weather.

2. No through or sufficient ventilation. Amongst such dwellings I would include those houses which are built " back to earth," where the adjacent earth reaches a high level, and back to back houses, so common in the northern towns.

3. General dilapidation after which I include cottages with walls perished, roofs leaky, rafters rotten, bedroom floors sprung and unsafe, and broken tiles laid on earth.

4. The hopeless cases, for instance, dwellings which have been improvised out of old malt-kilns, barns, cart-sheds, and other miscellaneous buildings.

In conclusion, I feel that I have merely touched on the fringe of the question, but what I have said has been prompted by an experience of the actual conditions under which numbers of our fellow-countrymen, their wives, and families are living. The fortitude and patience of the women under the often adverse circumstances of their homes are admirable, and in their devotion to their homes and their children they put to shame many mothers in better circumstances. The cleanest and brightest home I was ever in was that of the wife of an agricultural labourer; in others respects it was quite as remarkable: it was merely formed by a portioning off of a cottage, a corner of the kitchen, approached by an almost perpendicular ladder, was the space between the tiled roof and the living-room ceiling.

Standards are of little use unless efforts are made to reach them. The question of housing cannot remain as it is, touching as it does the most homogeneous classes of our population in their daily lives. The public elementary schools have inculcated a higher standard of living amongst the people, and what the present adult generation will tolerate their children will not; cui bono to teach the girls housewifery and cooking in our schools when the lessons there taught are to be nullified in the home.

The future well-being of the nation depends in a large measure on the satisfactory housing of our industrial population.

OPERATING THEATRES.

ROYAL FREE HOSPITAL.

EXOSTOSIS OF THE TIBIA.—Mr. Willmott Evans operated on a boy, at 14, who had been admitted complaining of a swelling on the inside of the knee. The history was that the swelling had been noticed there for the last three or four years; it never caused any pain, but was steadily increasing in size. On palpation the swelling was felt to be hard and to be attached to the inner side of the upper end of the tibia; the skin was not attached to it. The swelling was evidently slightly pedunculated. A diagnosis of cancellous exostosis was made, and an operation for removal was advised.

The boy was anaesthetised, and an incision two inches in length was made over the swelling. This was deepened until the surface of the tumour was seen. It was found to be capped by a bursa. By means of a chisel and a mallet the bony pedicle was cut through and the tumour removed. Bone forceps were employed to smooth the remnants of the pedicle. The deep fascia was stitched together and the skin wound closed with Michell's clips. An aseptic dressing was applied.

Mr. Evans said there are two varieties of exostoses—in the one the bony swelling consists mainly of cancellous tissue, but on the most superficial part there is a thin layer of cartilage which grows on the surface, while the deeper part is converted into bone, so that this tumour may be regarded as an osseous chon-
Dr. VITTOZ’S EXERCISES FOR DEVELOPING MENTAL CONTROL.

By Miss Hilda Wigram.

I.

Dr. Vittoz’s mind-training is based on the fact that he believes he has discovered a system of muscular vibrations, by which the state of mind of the patient can be shown to the physician. He places his hand on the patient’s forehead, and by means of these vibrations, which he feels, he can diagnose the patient’s mental condition.

This is because of the fact that, as it enables him to find out the mental habits of his patient in an hour or two, whereas it would take the ordinary physician days of careful observation to make these same diagnoses. It is not, however, likely to be of practical importance, and the hand sufficiently sensitive needs careful and patient practice, and it is hardly probable that we shall find medical practitioners able and willing to devote time and attention to such a side branch of psychotherapy. Since there have been somewhat one-sided criticisms of Dr. Vittoz’s exercises and system, I propose to deal with a few special points in his training, the value of which appear to have been overlooked.

His system divides itself naturally into two parts:

I.—The exercises from the point of view of diagnosis.

II.—The system of education and training of the will.

I. I will take first the few that Dr. Crichton Miller quotes in his interesting article on the re-education of attention and control of habits. (1)

(1) Figures of eight or ∞.—The value of this consists in the regular attention without break that it necessitates. Many patients can with ease put up mentally figures, letters, etc., but cannot make a ∞ or ∞. Spaces occur in the figures, in which case the physician may be sure that the patient has difficulty in completing the smallest task he undertakes; this should be pointed out to the patient.

(2) The Figure 1—Dr. Miller classes as an alternative exercise, but it in reality serves a totally different purpose. With difficulty the patient summons his entire concentration, saying the “1” to himself, writing it, and hearing it said. Directly it is finished the mind should rest, the purpose being not to train concentration, but to draw the attention of the case which with the patient leaves the figure, the physician determines the amount of difficulty he has in putting all working thoughts away when he wants to rest.

(3) Tactile exercises are among the most valuable. According to the way the patient feels one thing construe, the physician can determine how great an extent the subjective state is controlling him.

These with all other conscious acts are, I submit, the foundation on which the whole theory of attentive control rests.

(4) Concentration on different parts of the body gives confidence to the patient, as after very little practice a certain pricking sensation comes in the member thought of, and gives him reason to hope that his mind may attain some control over his body.

Putting up numbers and wiping them out is one of the many tricks. Any exercise, however, which shows him whether the patient has the power of retention and not of elimination, or the reverse, it also shows him whether the patient is always looking ahead mentally, or looking back, whether he is inclined to hasten away from what he does not want to think of, or to cover it up with other things; whether things are clear to him, or always rather vague; whether he can keep several things in his mind together, or whether each succeeding thought tends only to obstruct the previous one. Whether he can act decidedly, or whether always with hesitation. It is also possible for the physician to determine by these vibrations whether the patient needs mind training or some other treatment. If the mind is found in a state of very great tension, torpor, or confusion, it is clear that the person needs training, and that may be all that is necessary. As a rule in these cases the mental repression or conflict is near enough to the surface of the conscious to be dealt with by mental training of the mind, and that is sufficient treatment.

If, however, the patient shows certain physical or mental symptoms, and on examination his mind is in a state of comparative clearness, the physician should immediately suspect a much deeper repression, and the analysis would of necessity have to be more
searching. Of course, the patient may suffer from mental confusion and also from an unconscious resistance to treatment. It is usually possible to give two or three weeks' mental training, before beginning an analysis, as it clears the patient's mind of all side issues, gives him a certain amount of confidence in himself, and also gets him into sympathy with the difficulty which saves much time in the ensuing treatment.

11. Having given a few specimens of Vivottz exercises I will now deal with his system of re-education.

It must be borne in mind that Vivottz places absolute reliance on the value to the patient of the exercises he gives him. He finds the patient lacking in mind control in some way, sometimes to a very grave extent, and he argues that it is not except to his total advantage and to the patient's advantage to let him know that he has at his disposal the power to control his mind, and he teaches the patient this from the very beginning of the training. It will be argued that the power of concentration, consciousness, and relaxation is something which has this end in view, but where I think Vivottz's system differs from that of others is that he goes into far greater detail; by means of the exercises he is able to gauge the amount of control the patient has, and to tell him what he must do to make a task he knows he has the power to perform. A great many failures seem to be accounted for by the fact that the physician asks too much, a desperate effort is made and mutilate is the result: or the effort is made with so much tension that a reaction follows, and the patient is in despair. Under Vivottz's system, a very gradual course is followed and the patient gains confidence. By the mechanical exercises he establishes a base line on which he can take his stand. This principle involves a mental training every good physiotherapist has in this end in view, but where I think Vivottz's system differs from that of others is that he goes into far greater detail; by means of the exercises he is able to gauge the amount of control the patient has, and to tell him what he must do to make a task he knows he has the power to perform. A great many failures seem to be accounted for by the fact that the physician asks too much, a desperate effort is made and mutilate is the result: or the effort is made with so much tension that a reaction follows, and the patient is in despair. Under Vivottz's system, a very gradual course is followed and the patient gains confidence. By the mechanical exercises he establishes a base line on which he can take his stand.

The end towards which Vivottz aims is the absolute reliance of the patient on himself; and this principle will be attained at the very beginning of the training. It must be borne in mind that the patient is the author and director of the treatment, and is careful to teach the patient how to be conscious and to relax in great detail. To one patient straight lines are a source of joy, to another anathema, and of course any source of irritation must be immediately removed. A particular exercise so altered in character that though it performs the same service the patient does not recognise it.

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grasp of the principles at bottom of the Vittot education, everything becomes an experience, a real exercise of mental power. He realises that he has a control in himself which he can daily increase, a power of concentration and detachment at will. That, he can go on and on with his powers, in increasing them, experimenting, should be impressed on every intelligent patient; he must not be led to think he is to be turned out at the end of two months' training the 'finished article.'

Another reason why I believe the Vittot system to be underestimated is because few medical men understand to what extent their patients lack concentration. Because they conduct an argument with their physician with some ability he is blinded to the fact that very often they cannot attend a public lecture, and also for this reason his patient. But for those cases in which it is necessary at a certain crisis to use it, I would add a few words which may help the physician. The moment he realises that a 'crisis is imminent, and that some personal help is required of him, he should clear his mind of all and perfectly voluntarily and calmly give out all his power. If he does it with any unwillingness or with excitement he will pay for it in an abnormal fatigue. After seeing a case of this sort he should allow himself a moment or two if possible, to recover the power, so as to be sure that he does not carry over any unnecessary excitement to a case that would be better without it.

EXCERPTS FROM THE REPORT OF THE SELECT COMMITTEE ON PATENT MEDICINES.

The following excerpts from the Report present its findings and recommendations, which are of the highest importance in the public health:

After careful consideration of the evidence laid before them your Committee find:—

(1) That there is a large and increasing sale in this country of patent and proprietary remedies and appliances of Compound medicated wines.

(2) That these remedies are of a widely differing character, comprising (a) genuine scientific preparations; (b) objectionable remedies for simple ailments; and, (c) misleading statements making grossly exaggerated claims of efficacy; causing injury by leading sick persons to delay in securing medical treatment; containing in disguise large proportions of alcohol; sold for improper purposes; professing to cure diseases incurable by medicament; or essentially and deliberately fraudulent.

(3) That this last mentioned class (c) of remedies contains none which are developed from therapeutic or medicinal knowledge, but that they are put upon the market by ignorant persons, and in many cases by cunning swindlers, who exploit for their own profit the apparently invincible credulity of the public.

(4) That this constitutes a grave and widespread public evil.

(5) That in British Dominions and foreign countries severe legal restrictions exist, and that there is a need still further to strengthen the law against these articles.

(6) That no Department of State and no public officer is charged with the duty of controlling the sale and advertising of proprietary remedies in this country; that the Home Office and the Local Government Board are virtually powerless in this respect; that the Privy Council Office, though supposed to be specially concerned with the sale of drugs, has no initiative in the matter, and, in fact, its fulfils no useful function in this connection.

(7) That the existing law is chaotic and has proved inoperative, and that successful prosecution for fraud in the advertisement and sale of Secret remedies is fraught with the greatest difficulty, though the Public Prosecutor might, perhaps not sufficiently tested the powers of the existing law in respect to such cases.

(8) That consequently the traffic in secret remedies, except as regards scheduled poisons and the grosser forms of immediate proprietary, is practically uncontrolled in this country.

(9) That this is an intolerable state of things, and that new legislation to deal with it, rather than merely the amendment of existing laws, is urgently needed in the public interest.

(10) That a grave injury is caused to the public by the existing large sale of medicated wines.

(11) And that while, for reasons already given, it is not desirable to require the exhibition of formula of every secret remedy, nevertheless it is intolerable that under the protection of the law enormous quantities of alleged remedies should be sold the composition of which is unknown to any person except the manufacturer; and, therefore, the formula of all secret remedies should be required to be communicated to a competent officer appointed under the authority of a Minister of State, but that such formula should not be divulged to any other person except as hereinafter recommended.

RECOMMENDATIONS.

56. Your Committee therefore recommend:—

(1) That the administration of the law governing the advertisement and sale of patent, secret and proprietary medicines be co-ordinated and combined under the authority of one Department of State.

(2) That this administration be part of the functions of the Ministry of Public Health, when such Department is created, and that in the meanwhile it be undertaken by the Local Government Board.

(3) That a competent officer be appointed to this Department, with the duty of advising the Minister at the head of the Department concerned regarding the enforcement of the law in respect of these remedies.

(4) That there be established at the Department concerned a register of manufacturers, proprietors and importers of patent, secret and proprietary remedies, and that every such person be required to apply for a certificate of registration and to furnish (a) the principal address of the person trading as such, (b) a statement of the kinds of remedies carried on in this country, and (c) a list of the medicines or medicines proposed to be made or imported.

(5) That an exact and complete statement of the ingredients and the proportions of the same of every patent, secret and proprietary remedy of the contents other than wine, and the alcoholic strength of every medicated wine, and a full statement of the therapeutic claims, made or to be made, and a specimen of every claim, and of the cure of ailments other than recognised surgical appliances, be furnished to this Department, such information not to be disclosed except as hereinafter recommended, the Department to construe such statement, at their discretion, by analyses made confidentially by the Government Chemist.

(6) That a special Court or Commission be constituted with power to permit to be set in a proper case, if it appears to them that there is an intention of non-compliance with the law, the sale and advertisement of any patent, secret or proprietary remedy, or appliance, and that the Commission appointed for the purpose be a judicial authority such as a Metropolitan Police Magistrate sitting with two assessors, one appointed by the Department, and the other by some such body as the London Chamber of Commerce.

(7) That the President of the Local Government (or of Minister of Health) have power to sub-
CORRESPONDENCE.

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stitute the necessary proceedings to enforce com-
pliance with the law, the sale and advertisement
of any patent, secret or proprietary remedy, or
appliance.

(5) That a registration number be assigned to
every remedy permitted to be sold, and that every 
bottle or package of it be required to bear the
imprint "R.N. . . ." (with the number), and that no
other words referring to the registration be
permitted to be printed on the bottle or pack-

(6) That in the case of a remedy the sale of
which is prohibited, the proprietor or manufac-
turer be entitled to appeal to the High Court
against the prohibition.

(11) That the Department be empowered to
require the name and proportion of any poisons
or potent drug forming an ingredient of any
remedy to be exhibited upon the label.

(12) That inspectors be placed at the disposal
of the Department to examine advertisements
and observe the sale of proprietary remedies and
appliances.

(13) That an annual fee be payable in respect
of every registration number issued.

57. Your Committee make the following recom-
mendations regarding the amendment of the existing
laws:

(1) That the Stamp Acts be consolidated and
amended to remove the numerous existing
anomaly[s], or otherwise enable exceptions in
this connection, pure drugs vended entire under a
fancy name should no longer be exempt from
duty; the distinction between the name of an
ailment, and the name of an organ to which it is
due should be maintained; and the exemption of
medicines generating carbonic acid gas should
be omitted (see par. 10). Further, any reference
in advertising matter to the Government stamp
should be prohibited, and no name of a proprietor
or firm be printed upon the stamp.

(2) That the Indecent Advertisements Act be
amended on the lines of Lord Bray's Bill.

58. Your Committee further recommend the follow-
ing further enactments:

(1) That every medicated wine, and every
proprietary remedy containing more alcohol than
that required for pharmacological purposes, be
required to state upon the label the proportion of
alcohol contained in it.

(2) That the advertisement and sale (except
the sale by a doctor's order) of medicines purporting
to cure the following diseases be prohibited—
Cancer Diabetes Locomotor ataxy Consumption Paralysis Bright's disease Epilepsy
Locomotor ataxia Rupture (without opera-

(3) That all advertisements of remedies for
diseases arising from sexual intercourse or refer-
ing to sexual weakness be prohibited.

(4) That all advertisements likely to suggest that
a medicine is an abortifacient be prohibited.

(5) That it be a breach of the law to change
the composition of a remedy without informing
the Department of the proposed change, or that
fancy names for recognised drugs be subject to
regulation.

(6) That the period of validity of a name used
as a trade mark for a drug be limited, as in the
case of patents and copyrights.

(7) That it be a breach of the law to give a
false trade description of any remedy, and that
the following be a definition of a false trade
description—"A statement, design or
regarding any article or preparation, or the
ingredients of medicines contained therein, or
the curative or therapeutic effect thereof, which is
false or misleading in any particular." And that
the onus of proof that he had reasonable ground for
believing it to be a breach of the law to give a
false trade description be placed upon the manu-
ufacturer or proprietor of such remedy.

(8) That it be a breach of the law—

(a) To enclose with one remedy printed
matter recommending another remedy.

(b) To invite sufferers from any ailment to
correspond with the vendor of a remedy.

(c) To make use of the name of a fictitious
person in connection with a remedy. (But it
should be permitted to him the power of applying
permission to permit the exemption of an old-
established remedy from this provision.)

(d) To make use of fictitious testimonials.

(e) To publish a recommendation of a
secret remedy by a medical practitioner unless
his or her full name, qualifications and
address be given.

(f) To promise to return money paid if a
cure is not effected.

CORRESPONDENCE.

FROM OUR SPECIAL CORRESPONDENTS AT HOME.

SCOTLAND.

Red Cross Hospital at Haddington.

The first Red Cross hospital, already established from
military hospitals, has been established at Haddington. Troops were hurriedly sent to
this district since the outbreak of the war, and a number of
the men were overcome by the effects of
their forced march. There were arrangements
for the treatment of such cases, the Medical Officer, through the Territorial
Association, on arrival, called upon the Voluntary Aid
Detachment at Haddington of the Red Cross Society to
supply a temporary hospital there. The work was
expeditiously and efficiently done by the Detachment.

The military authorities have felt the need of a
continuation of the institution, and have requested the
Scottish Branch of the British Red Cross Society to
recognise it as an auxiliary hospital where cases of ill-
ess of a temporary nature might be treated. The Red Cross authorities have visited the hospital
and found everything most satisfactory. Members of Voluntary Aid Detachments have been sent
by the military authorities to assist at the military hospital
at Maryhill, Glasgow, and at the hospital at
Haddington.

Inoculation of Troops against Typhoid Fever.

Dr. J. J. Graham Brown, the President of the Royal
College of Physicians of Edinburgh, and Dr.
F. M. Caird, the President of the Royal College of
Surgeons of Edinburgh, have issued a communication
to the Press on the advisability of inoculating our
troops against typhoid fever before they go abroad. The high necessity of this procedure, they
point out, does not appear to be sufficiently recog-
nised. Yet our experience in the South African War
showed that, were typhoid fever to break out among
such masses of men, it would destroy many more lives
than the fire of the enemy could do. The inoculation
ought to be performed at least a fortnight before the
men leave this country. To relieve the officers of
the Royal Army Medical Corps, who, already overburdened
with work, it is suggested that arrangements could be
made that the Fellows of the Scottish Royal
Colleges would undertake the task of inoculation. The
laboratory of the Royal College of Physicians has been
prepared to supply the necessary vaccines; and when the
organisation is complete it is calculated that many
hundreds of inoculations could be performed each
week.

LARGS MEDICAL VOLUNTEERS.

An example of patriotism is afforded by last year's
ambulance classes at Largs and Fairlie stations of
the Glasgow and South Western Railway. Dr. Crow,
the teacher, and seven members of the class have
volunteered for service in the Royal Army Medical
Corps. Four other members of the class are at
present serving in the Territorials, and if the present
offer of service is accepted, practically every member
of the class will be serving. Two of the class have
volunteered for foreign service. Dr. Crow, the
graduate of Glasgow University, is at present a member of Largs Local Council.
LETTERS TO THE EDITOR.

We do not hold ourselves responsible for the opinions expressed by our Correspondents.

THE SELECT COMMITTEE AND THE NEWS-PAPER PRESS.

To the Editor of The Medical Press and Circular.

Sir,—There can be no apology for returning to this subject from which we have already once strayed. The Select Committee, in its report, has furnished the profession with a weapon which, if effectually used, will enable them to smash that section of quackery—the sale of fraudulent secret remedies—which is doing most injury on the poor and ignorant. It is a purely humanitarian movement. It will put no money into the hands of the profession, but on the contrary will deprive them of the gains they now acquire through the damage to the public health which these practices give rise to. It is true I have always urged that the greatest blow which could be inflicted upon grossly fraudulent quackery would be exclusion of its advertisements from newspapers, and I have pointed out that it has been the conduct of the majority of papers standing in the front rank of journalism which has given an unanswerable excuse to lower class papers for following the example of their betters. The majority of the leading papers—there are a few honorable exceptions, led by the Spectator—are, and have all along been, of the opinion that the nefarious character of the trade they have been abetting: most of them have been alive to the fact now demonstrated irretrievably by the Select Committee that the trade is not only fraudulent but "cruel and deadly." It leads to the destruction annually of vast numbers of ignorant people who, trusting in quackery, have let their diseases—curable in an early stage—pass into a mortal phase; it injures many and kills many by the dosages of poisons, such as alcohol and cocaine, which are contained in "heal all," advertised at stupendous cost. Many leading papers have had medical men as regular editorial contributors, and if the first-class papers have allowed these medical editors to write in their own papers, the newspaper managers in an amazing fashion. They have allowed them occasionally to write leaders denouncing quackery or particular class of quacks whose advertisements have not been regularly appearing in their own pages. The newspaper managers were evidently aware that an article at rare intervals denouncing quackery and fraud could only confuse the ingenious reader and lead him to look at the advertisements in such a high-toned paper as theirs, but a better article could better serve the ends both of the astute knaves who direct the quack medicine trade and the clever newspaper proprietors who wish to attract advertisement instead of being prevented from doing so by any penalty involving a criminal charge. I think a fairly clear account of some of the facts was given in my evidence, which will be, I hope, printed in the separate volume to be issued at once. The paragraph, page 10 in the Report, embodies some of my testimony. After giving shamy

FORCIBLE FEEDING.

To the Editor of The Medical Press and Circular.

Sir,—Having carefully read Sir Victor Horsley's letter in reply to mine, I am led to infer that he is more concerned about the vote than about forcible feeding. The tenor of the whole of it reveals this, and is what is known in homely circles as "letting the cat out of the bag." Sir Victor shrewdly guesses that I am not particularly interested in woman's enfranchisement, as, indeed, I believe comparatively few men are interested in it. I believe the 11th of September 1911 is "forcible feeding," and am anxious to hear what Sir Victor has to say about it. I think the militant suffragists have themselves proved public indifference to their cause, otherwise the clamor that has been raised for the women's franchise for the past five years would have been necessary to resort to violence as a means of exciting public interest and attention to their cause, and they not unnaturally attribute the attention which necessary arises from audacious though that were the same as enthusiasm and interest in their cause. It is certain, however, that prior to militancy they made little advance, and finding that what Sir Victor calls "political evolution not speedy enough," they resolved to carry out political revolution to gain their ends. Should these be eventually obtained, they cannot claim, like other countries, to have gained it through moral and intellectual forces, but from sheer violence, hence the necessity of adopting all available means for resisting such violence, and this, I take it, is the medico-legal aspect of the question, which I now approach.

Sir Victor Horsley, in his last letter, when criticising the analogy between what he calls "forcible feeding" and what is done in the prisons, makes what is to me the astounding, yet significant statement that "hanging does not deter," presumably meaning that it does not prevent homicide, from which I infer he would have us believe that forcible feeding does not prevent suicide. There is, however, a scarcity is there in making the statement. Although I am unable at the present moment to name chapter and verse, I am under a strong impression that in some countries where capital punishment has been entirely
or almost abandoned, homicide has increased to a degree sufficient to necessitate a revival, or at any rate more stringent and practical punishment. I am, of course, aware, like everybody else, that no penalty in criminal law has entirely abolished the crime for which it was, or supposed to be, adapted. On the other hand, there is, I think, a shadow of a doubt cast upon it by a very great degree, and according to their severity, reduce crime to its minimum, otherwise all criminal law, except as a weapon for revenge or vindictiveness, would be null and void.

I should like to follow Sir Victor still further in detail, but your valuable space forbids, and he skips over much ground. I am sorry if I unintentionally misrepresent him in any way, and am glad to have him credited as he has not, as he suggests, read Hansard (not, by the way, altogether immaculate evidence, judging from recent disclosures). But I have carefully read the debates in the House of Commons as reported in the Times, especially the Home Secretary's speech of July 12th last, when he attempted to demonstrate from certain figures that since the passage of the "Temporary Discharge Act" there had been a considerable reduction of crimes, although they had increased in magnitude and been claimed from these figures the successful working of the Act, but forgot to remind the House that prior to the passing thereof the militaries were let out scot free, after, of course, "the attempt is made to cast aside, so long as these desperate characters are discharged temporarily on these terms, without even being forcibly fed, it is hopeless to expect these crimes to cease. There can be no doubt, I think, that the Home Secretary completely deceived the House and himself when he emphatically stated in the House of Commons that the militaries were not to be allowed to die in prison, and I have expressed this view before almost in the same words, because it is obviously impossible to carry out any sentence in the teeth of those who threaten suicide, are not forcibly fed, and who are let loose to the peril of millions upon millions both as to life and property, lest peradventure one or two of these should die in prison. If this is not "straining at a gnat and swallowing a camel," what is? I am, Sir, yours truly.

Clement H. Sems.

Chancotnory Road, Hove.

September 17th, 1914.

POST-GRADUATE TEACHING IN SCOTLAND.

To the Editor of The Medical Press and Circular.

Sir,—A slight error has crept into your very interesting Educational Number of last week. The British representative on the International Bureau for Post-graduation instruction which met at Berlin was not Prof. Noel Paton, but Principal Sir Donald Macalister. The post-graduate classes announced to be held as usual about this time in Edinburgh and at the Glasgow Royal Infirmary were abandoned on account of the war. I am, Sir, yours truly.

September 14, 1914.

Scotts.

MEDICAL NEWS IN BRIEF.

St. Mary's Hospital Medical School (University of London).

We are asked by Sir John Broadbent, Bart., Dean of St. Mary's Hospital Medical School, to announce that the opening of the winter session will take place on the 1st of October, and that the work of the Medical School will be carried on without interruption, and all courses of instruction in preliminary, intermediate and final subjects will begin on October 1st, as arranged.

The examination for entrance scholarships will be held on September 21st—23rd.

Owing to the European war and the absence of certain members of the staff and junior students at the Front, the presentation of prizes by Sir Philip Magnus, M.P., will not take place on October 1st, but will be postponed.

Books for the Hospitals.

The War Library have sent out 37,000 books and magazines all over the kingdom in response to appeals from hospitals and have received an appeal from the Admiralty for ten naval hospitals to which they have not been able to send a full supply, as the demand from all centres is enormous. They therefore beg for further liberations of books to the War Library, Surrey House, Marble Arch, London, carriage paid.

The Trade in German Drugs and Chemicals.

The Times announces that applications have been received for licences to manufacture in Great Britain the following well-known proprietary articles:—

For "salvarsan," application is made by H. S. Wellcome, of Snow Hill Buildings, London.

For lysisol, application is made by Charles Zimmermann and Co. (Chemicals) Limited, 9-10 St. Mary-at-Hill, London, and by Robinson Brothers (Limited), West Bromwich.

For formamin, by J. E. Gribichs, East Sheen.

For sanafarin, by J. E. Gribichs and Callard, Stewart, and Watt (Limited), Old Bond Street, London.


In regard to applications for the avoidance or suspension of patents or for licences to make or to sell a plant that is more or less expensive to be laid down it is possible the Board may grant perpetual licences, and that the original owner at the conclusion of the war will only be allowed to resume his rights subject to that limitation. It seems very probable that in every case the facts brought before the Board will rule its decision, and it is unlikely that any steps will be taken that will imperil the rights of British proprietors of patents, designs, or trade marks registered in the enemy States.

A Barnstaple Prosecution.

MINNIE JORDAN, of Instow, was charged, at Barnstaple, under the Infected Disease Order, with not giving notification of a child suffering from scarlet fever. Mr. R. E. C. Bardsley appeared for the Barnstaple Rural District Council, who prosecuted. The defence offered, through Mr. B. T. James, was that Mrs. Jordan at the time was suffering from rheumatism, and was ignorant of the law. A fine of 2s. 6d. and costs was imposed.

MEDICAL WAR ITEMS.

FISHMONGERS' HALL at London Bridge is being equipped as a hospital for wounded officers and will be ready in a fortnight.

SIR WILLIAM OSLER and Mr. Donald Armour have undertaken the organisation and equipment of a hospital to be known as the "Queen's Canadian Military Hospital" of 50 beds, which will be under the control of the War Office. The Canadian War Contingent has been asked to arrange to maintain the hospital for twelve months.

The War Hospital equipped and organised by the Church Army and sent out to serve under the French Red Cross has reached its station in North Wales. Mr. Kimberley, who is, I believe, the Hon. Medical Adviser of this Hospital.

The first batch of 24 wounded men were received at the Prince of Wales's General Hospital, Tottenham, last week. Shortly after their arrival they were visited by Viscount Hill, and the Chairman of the Governors, accompanied by Lady Hill.

Considering the dangers of a possible epidemic of small-pox in this country in consequence of refugees from the Central Powers, it is said that the Local Government Board is exercising all vigilance to safeguard the health of the people.
NOTICES TO CORRESPONDENTS, &c.

For Correspondents requiring a reply in this column are particularly requested to mention their name and address, or Initials, and to avoid the practice of signing themselves "Reader," or Subscribers, etc.

Subscriptions.

Subscriptions may commence at any date, but the two volumes each begin on January 1st and July 1st respectively. One volume is required per household or school. Foreign subscriptions must be paid in advance. For India, N. Searle and Co., Calcutta; for Australia, Geo. A. Robertson and James, Sydney; for New Zealand, Geo. Robertson and Co., of Sydney and Melbourne, are our special agents for Australia.

ADVERTISEMENT.

For One Insertion—Whole Page, £1 15s.; Half Page, £2 10s.; Quarter Page, £1 5s.; One-eighth, 12s. 6d.

The following reductions are made for a series:

Whole Page, 13 insertions at £1 15s.; 26 at £3 3s.; 52 insertions at £2, and pro rata for smaller spaces.

Small announcements of Practices, Assistancies, Vacancies, Books, etc.—Seven lines or under (70 words), 4s. 6d. per insertion; 6d. per line beyond.

Contributions are kindly requested to send their communications, if resident in England or the Colonies, to the Editor at the London office, 2, Henrietta Street, Strand, if resident in Ireland to the Dublin office, in order to save time in reforwarding to office when sending reprinted or otherwise, (all payments for articles to be addressed to the Publisher.

Owing to the recent action on the part of the Canadian Army Medical Corps has been swallowed up in the Territorial Force, and its headquarters are now at the York Yepper London, S.W. Yes, the late Mr. Arthur T. Searle, Medical Director of the Medical Press and Circular, was for many years Colonel of the Volunteer Army, which he brought up to a considerable size of efficiency.

Queens.—The name of the dentist who has advertised offering his services free to all to whom he appears to be of service is not entered on the Medical Register, and we believe his claim to the title of “Doctor” is founded on an unrecognised diploma.

Medical and Surgical Advertisements for the Canadian Army Medical Corps are now being collected, and we shall not accept any further advertisements of this description.

We are asked to announce that eleven medical men as officers are urgently required for the establishment of the eastern or third Anglo-Indian field ambulance—a home and service ambulance. Applications, stating age, should be sent at once to A. Graham, M.B., Captain, Acting O.C., 3rd K.E.A.P., Headquarters, 3rd East Anglian Field Ambulance, Church Hill, Walthamstow, Essex.

Army Serjeant (Kt)—If you send us full particulars we may be able to refer you to the very man you want. In spite of the shortage of medical men there are plenty who, by a rearrangement of work, could look after a practice in special work, and some past the age for active service would doubtless be glad to accept the necessary confirmation in order to help others who have answered the call to duty at the front.

We are asked to announce that the Officers of the IDLEMAN, GILES, SCOTT and COMPANY, the well-known manufacturing chemists, of Clifton, Bristol, write to us that although the various changes in a chemist's work have greatly advanced in the interest of the pharmaceutical art, public not to be notified in the series of Letters by Robert Schacht, or of any of its contributions. There will be consequently no reason why patients should be charged, or increased charges for medicines in these salts are prescribed.

G. H. Brown (North London).—Bromide of potassium has run up to fabulous prices, and a similar statement applies to other salts of potassium, the main supply of which, to the United Kingdom, has hitherto come from Germany.

Deaths.

BARNES.—On September 10th, at 6, Grantham Road, Bremerton, the Rev. W. G. Barns, of the Royal Army Medical Corps, aged 64.

CLARK.—On September 10th, at 2, Northumberland Street, Newcastle upon Tyne, Dr. John Clark, M.D., F.R.S., aged 65.

GREEN.—On September 10th, at 6, Grantham Road, Bremerton, the Rev. W. G. Barns, of the Royal Army Medical Corps, aged 64.

HURST.—On September 10th, at 2, Northumberland Street, Newcastle upon Tyne, Dr. John Clark, M.D., F.R.S., aged 65.

MURPHY.—On September 10th, at 6, Grantham Road, Bremerton, the Rev. W. G. Barns, of the Royal Army Medical Corps, aged 64.

PORTER.—On September 10th, at 2, Northumberland Street, Newcastle upon Tyne, Dr. John Clark, M.D., F.R.S., aged 65.

RUSSELL.—On September 10th, at 6, Grantham Road, Bremerton, the Rev. W. G. Barns, of the Royal Army Medical Corps, aged 64.

WILLS.—On September 10th, at 6, Grantham Road, Bremerton, the Rev. W. G. Barns, of the Royal Army Medical Corps, aged 64.
Panel practice shares in the general disturbance of occupations due to the war. Many medical men thus engaged have gone to the front and have left their work to locum tenentes or to friendly brother practitioners. It is pleasant to find that the pathway of these patriots has been rendered as smooth as may be by the local insurance committees. From various parts of the Kingdom it is reported that the posts are to be kept open for them after the war by doing away with the formality of legal signing of a fresh contract at the outset of 1915. There can be little doubt that the sacrifice involved in throwing up practice for Army service during the present crisis falls with especial severity upon the medical man who is engaged more or less in panel practice. The shortage of medical men renders it extremely difficult for him to secure a qualified man to take over the duties temporarily. On the other hand, while on war service he will receive 24s. a day and rations, by no means too large a scale for the highly skilled and experienced service that is rendered. In some quarters the amount has been stigmatised as extravagant, but the Army Medical Department has acted wisely in the matter, for a smaller rate would have rendered it absolutely impossible for not a few men engaged in private practice to run their practice while abroad, especially now that the fees for locum tenens' work have been so considerably advanced.

Medical Examination of recruits are being examined medically at half-a-crown a head reflects little credit upon the business methods of the War Office. At one time it is known that in Whitehall and other recruiting centres in London queues of 200 to 300 men, and more, were waiting for each medical officer. A simple sum shows that 200 men at half-a-crown per head means £25—a sum that seems out of proportion for a day's work. The principle of paying for individual examinations is unsound, and when applied to hundreds of thousands of recruits is inexcusable. A business firm would engage an army medical officer to give his whole services at a stated salary, which would cover medical examinations of the kind under notice. The worst of it is, that the whole of this inexcusable burden is thrown upon the overburdened taxpayer, at a time when every penny is needed to meet the enormous expenses of a great war. It is to be hoped that Lord Kitchener will find time to attend to this detail, and stop so lamentable a waste of money. The Army Medical Department has shown marvellous efficiency in many directions. It has met the sudden strain upon its resources with a readiness, a completeness and an efficiency that have hitherto been unknown in the annals of our country. With a little more time the machinery and the art of the medical examination of recruits will also doubtless be placed on a satisfactory footing.

Meanwhile, lest readers should think too much has been made of the small matter, the following letter is appended. It should be borne in mind that it is written from the provinces, where the number of recruits is smaller than in London:

The Case in the Provinces

Six.—A large number of recruits are daily examined by doctors. For each examination we are paid half-a-crown. A few of us are doing whole-time work, and earning enormous sums, while the majority give part of their time. When all the circumstances are considered, such as the nature of the examination, the assistance received, the concentration of recruits in one place for examination, etc., all of which render medical examination both expeditious and simple, it is not too much to say that 1s. per case would be fair remuneration.

Most of us can afford to give four-fifths of each half-crown, if not all, to the Prince of Wales's Fund. We earn from 6s. to 8s. per day for a whole day, down to £1 or so for one or two hours.

If the whole-time men gave half of this entirely adventitious income, and the part-time men two-thirds up to the whole of their receipts, the fund would be swelled considerably, and not one of us would be a penny the worse.

Yours, etc.,
M.B., Ch.B.

September 7th, 1914.

SEPTEMBER 23, 1914.

No. 13.

NOTES AND COMMENTS.
declared. The members of the surgical and nursing staffs had put themselves to considerable inconvenience in ridding themselves of their responsibilities at home, and to some expense in preparing personal outfits. They are quite willing to put up with this if there were any legitimate reason for it, but they have some right to know. We hope that the suggestion which is freely bandied about of some friction between Devonshire House and the War Office is without foundation. The publication which is subscribing large sums for Red Cross work should make sure that their good intentions are not frustrated by any lack of tact on the part of those responsible for the administration of the funds. We would like to believe that the organisation of the Royal Army Medical Corps is so efficient that there is no need for outside help, but that additional hospital work on the Continent is needed is, we think, clear. We cannot believe that soldiers dangerously wounded would be brought in such numbers to Netley and other home hospitals if there were adequate means of treating them abroad. The two units which have been countermanded would have been able to save a considerable number of such men a long and painful journey.

In our last issue the important part played by socks in the soldier's outfit was discussed in these columns. It was pointed out how they should be without darns and made of good woolen worsted. Since then reports have been published by correspondents at the front, describing the pitiable condition of some of the soldiers who had been engaged in the prolonged days of fighting and forced marching entailed by the falling back of the Allies forces from Paris to the Marne. The men in question were said to be absolutely crippled by galled feet, due to wearing coloured socks continuously for many days together. Aniline colours are much used for dyed hosiery, and their irritant action upon the skin is a well-known fact. Moreover, coloured socks that might be tolerated under the conditions of ordinary civilian life may have a very different effect when worn night and day and kept closely applied to the feet, often being bathed in sweat or sodden with moisture, to say nothing of the warmth engendered in boots which are worn night and day. By all means let the soldier wear white or grey worsted socks, of the best workmanship and material he can obtain.

Apart from specified bacterial Medical therapy, there has been in the past Treatment of a few years a revived interest in the Tuberculosis, drug treatment of tuberculous diseases. Several drugs have been recommended as if they were specific. Iodine, in one form or another, is the active principle in many of them; the compound associated with Dewar's name consists chiefly in the intravenous injection of iodine. "Dioradin" is alleged to contain "peptonised iodine." Dr. Laird, of Sligo, has reported good results from the use of a mixture in which sodium iodide appears to be the most active constituent. In another direction, Dr. Mischin, of Dubin, has, in our columns and elsewhere, reported marked success resulting from the use of all sulphide, the active principle of garlic. His results have been strikingly confirmed by certain American experience recently reported. (a) Dr. McDuffie, of New York, has clinically investigated a great number of methods of treatment recommended by various authorities. Of these, only two gave any suggestion of having any specific action on the tubercle bacillus—garlic and mercury. Of the two, McDuffie gives first place to garlic. It certainly seems as if this drug deserves a fuller study than it has yet received from pharmacologists and clinicians.

The Medical Roll of Honour.

The fighting of last week has been fast and furious. The Germans, in their endeavour to stop the disastrous retreat of their right wing, have retreated slowly and have done repeated fierce assaults on the advancing Allies. The casualty lists have been enormous, and the battle faces greater than any yet waged by mankind. The official reports from September 18th to 20th give the names of 44 officers killed in action, 105 wounded, 17 missing, and four unoffically reported to be prisoners of war. Killed: Capt. E. R. M., R.A.M.C.; Wounded: Lieut. C. Dalton, R.A.M.C.; Lieut. E. J. Wyler, R.A.M.C.; Officers previously reported missing who have now reported themselves: Capt. B. Dwyer, R.A.M.C.; Major F. S. Irvine, R.A.M.C.; Officers unofficially reported prisoners of war: Capt. W. K. Beaman, R.A.M.C.; Major W. R. Fry, R.A.M.C.; Major J. C. Eames, R.A.M.C.; Officers previously reported missing, but now officially reported prisoners of war: Lieut. P. P. Butler, R.A.M.C.; Major P. H. Collingwood, R.A.M.C.; Capt. W. Egan, R.A.M.C.; Lieut. S. M. Hattersley, R.A.M.C.; Capt. J. P. Lynch, R.A.M.C.; Capt. H. E. Priestly, R.A.M.C.; Lieut. L. M. Kouth, R.A.M.C.; Capt. A. A. Sutcliffe, R.A.M.C.; Capt. A. C. Dalton, R.A.M.C. It is further reported that Lieut. A. Keith Armstrong, KIA, has died of his wounds.

LEADING ARTICLES.

ALCOHOL AND THE WAR.

The great war in which the British Empire is unhappily embroiled is likely, for a long time to come, to overshadow and disturb the domestic life of the nation. In most of its essentials it is peculiarly a conflict conceived and carried out on scientific principles. That proposition is sustained by a consideration of the degree of precision to which the movements of large bodies of troops have been brought, and the advances in commissariat, field defences, long-range weapons, field telegraphy, explosives, aviation and other details of modern warfare. No less great has been the amount of science, that is, the application of the results of reasoned observation and of ascertained principles and experience, to be seen in the Army Medical Service. Asepsis is now a prime consideration in the first treatment of wounds in the fighting line, so that a very large proportion of those who are not killed outright are likely to make a speedy recovery. Field and camp sanitation is now attended to by specially trained men, and the camp diseases, notably enteric fever, are no longer likely to play havoc amongst our troops, as they did so recently as during the Boer War. Among these and other changes not the least significant is the disuse of alcohol in our own army. Not only has alcohol been strictly relegated to a subordinate position amongst medical comforts and necessaries, but its disuse has been urged upon the troops by
Lord Kitchener, and in garrison and other towns the public houses have been shut or closed at an earlier hour than that which prevailed before the war. Upon physiological grounds it will be generally admitted by medical men that soldiers exposed to the hardships of a strenuous campaign, so far from increasing their endurance will actually diminish it by the use of alcohol. A similar phase of temperance has been observed in the French and Belgian armies. Complete abstinence, moreover, has become the rule amongst our allies, the Russians, who have abandoned their vodka to a man. On the other hand, the German soldiers appear to have indulged to the fullest extent the drinking habits which characterise them as a nation. It has been shown by the testimony of responsible war correspondence and confirmed by official investigation, and by a mass of collateral evidence that drunkenness and crimes that are a disgrace to civilisation have marked the trail of their march through Belgium and France. The contrast between the temperate Allies and the intemperate Germans to a certain extent may be taken to constitute an experiment upon a gigantic scale of the advantages and disadvantages of alcohol to the soldier on active service. It may be hoped that the lessons of the war in this matter may not be lost upon the legislature. That which is good for the troops in war time, will be equally good for them in the piping times of peace. Why should not the hours of opening of the public houses be curtailed throughout the length and breadth of the Empire, both in the morning and at night? Under what circumstances can it be excusable for anyone to imbibe alcoholic liquors in the early morning or, on the other hand, what hardships would be inflicted on the Londoner by closing the public houses at the same hour now enforced in the large provincial towns? For that matter, why should not ten o'clock be late enough as the closing hour in town and country? The plain fact of the matter is, that we are, as a nation, still in need of sound temperance legislation. The disuse of alcohol by our troops in time of war affords a striking proof of the attitude of a branch of the administrative government, one chief duty of which is to study and enforce the principles that lead to the fitness of the individual soldier.

CURRENT TOPICS.

Medical Attendance upon Dependents of Soldiers and Sailors.

In view of the offer recently made to the Government by the British Medical Association and the Pharmaceutical Society of Great Britain of cooperation in a scheme for providing medical attendance, with medicine and appliances, to those dependents of soldiers and sailors on active service who are in poor circumstances, it is announced that a sub-committee of the Central Committee for the Prevention and Relief of Distress has been set up for bringing the scheme into effect. The constitu-

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Salvarsan in Non-Syphilitic Diseases.

The potency of salvarsan is such that its effects in diseases other than syphilis have been regarded by many authorities as almost specific. Thus, beneficial results have been obtained by the administration of salvarsan in tuberculosis, dysentery, relapsing fever and severe anaemia. An interesting paper was read at the recent annual meeting of the American Medical Association by Dr. William H. Best, (a) of Brooklyn, who has been conducting an investigation into the action of “cup” in many different diseases. Many skin affections, such as dermatitis herpetiformis, erythema multiforme, lupus vulgaris, mycosis fungoides, pemphigus, pityriasis rubra, psoriasis, and tuberculides related to lupus vulgaris, all showed a marked improvement in the cases to which the results obtained were most gratifying. Those diseases caused by a definite micro-organism, or in which a microbial origin may reasonably be surmised, were benefited by the treatment, while systemic disorders in which arsenic is often beneficial were generally influenced in a like degree.

Invasion.

ENGLAND is at present exerting all her strength to make ready for an invasion that may never take place. But there is another invasion which may be fraught with little less danger, and which has already begun. We refer to the foreign refugees that are pouring into the country. Now, we would be the last to shut our country’s gates to these refugees. We deplore the fact that they are fighting side by side with us, but we have no other choice.

These are self-evident facts, and we cannot afford to ignore them. The economic aspect of this sudden influx of mostly unskilled labour is not our especial concern, and we leave the matter to be discussed in quarters that are more directly affected. For ourselves there is a very present fear of small-pox before our eyes. The iconoclastic efforts of the anti-everything cranks have succeeded in making our vaccination laws a thing of no account in many parts of the land. We hope that these people will not reap their deserts. But great care is needed. We look with confidence to the arbiters of our health to take every precaution against the invaders whose weapons are not rifles, but their own innocent but no less hungry stomachs, and such casual bacteria as they may have collected. The danger is no less great because it is unwitting. Let us, by all means, show the utmost hospitality to our unfortunate guests. Let us also take care that neither they nor ourselves suffer from preventable disease of which they may be the innocent carriers.

Salvarsan is certainly a specific in diseases caused by any variety of spirillum, such as filariasis, franknesia, relapsing fever and Vincent’s angina. As an adjuvant in the treatment of those diseases in which we have previously used the drug, with the notable exception of lupus and leprosy, salvarsan has also been found useful. It may not be supposed, however, that salvarsan is a panacea for every disease under the sun, for its limitations and dangers are such that none but the most unwary would dream of using it except where it is specially indicated.

The Lost Inheritance.

AMERICA is a comparatively new land, but she has some old traditions—as old, at least, as her discovery. We are sorry to see that one of the dear old tales is being repudiated. It is sad to see the stories we learnt as children discredited. Yet so it must be. Truth will out even among scientists, and we must bear the brunt. We always thought that syphilis came from America; that the dauntless Spaniards returned to Spain with golden trophies and a coppery rash. The legend of Columbus and the spirochete was as real as the Parthian Bracer, the spider, and more probable. It had its day, and we have read a long article on the subject, and stand convinced. It seems a paradox, but a galaxy of evidence has been produced to show that the Morbus gallicus had its origin in France. We cannot go into the pros and cons, but the arguments seem irrefutable. It makes one feel disappointed. The pale spirochete has been the evil means of much good work. Clinician and scientist have wrought their best for its extinction. Its machinations have encouraged the best efforts of the medical profession. Around its destruction we have erected a tower of saving strength. And now America disowns it. America says that it was known and recognised in France and Spain in the thirteenth century. It alleges that its ravages have been discerned in the bones of Egyptian mummies right from the tombs of kings. So be it. We cannot stand in the way of truth. One by one our old beliefs desert us, smashed to atoms by facts whose only justification is that they are. We cannot fight against them. All we can do is to believe them. Certainly till some day a later and more certain one comes to set up again the images we have lost.

Poliomyelitis in Lancashire and Westmoreland.

An interesting report has recently been made by Dr. H. A. Macenew to the Local Government Board upon the prevalence of poliomyelitis in certain parts of Lancashire and Westmorland in the autumn of 1913. No very definite conclusions have been arrived at as to the mode of spread of the disease as a result of the inquiry, but several suggestive facts were elucidated with regard to its epidemiology. In one part of Barrow there was a mortality of thirty per cent. Paralyzation was a marked feature of the cases, both legs being affected in twelve of those reported. A peculiar white dust produced in connection with the deposition of slag from local iron and steel works, resembling sifted sugar, was found in a certain district of Barrow. Neither milk nor other articles of diet appeared to have any influence in the spread of the disease, but a large number of flies was said to be in the houses within the affected area. Children appear to be more prone to poliomyelitis than adults, though in some of the Lancashire districts and in Westmorland, as well as in other epidemics investigated in

PERSONAL.

The King and Queen, with Princess Mary, on the 15th inst., paid a private visit to Netley Hospital, Southampton, where some 900 wounded and sick soldiers are under treatment. Their Majesties alighted at the hospital station, and were received at the entrance by Colonel D. J. R. Lucas, C.B., R.A.M.C., the officer in charge, and other officers, and the Matron.

On the 14th instant, H.M. the Queen visited the hospital equipped by the British Colony in Antwerp in the building lent by the Missions to Seamen, and was received by Sir Francis Villiers, the British Minister. Her Majesty shook hands and talked with every wounded soldier, and the ladies of the Committee and full medical and nursing staff were afterwards presented to the Queen.

Miss E. C. Houlten, M.B.Lond., has been appointed a member of the Women's Medical Service of India.

The late Surgeon-General Sir Anthony Dickson Mome, K.C.B., V.C., has left estate of the gross value of £24,607.

Dr. Edward Lewis, of Anglesey, has been appointed Medical Officer for the County of Glamorgan under the Mental Deficiency Act.

Deputy Surgeon-General O. W. Andrews, R.N., Medical Officer of Health for Gloucester, has been appointed to Portsmouth Dockyard.

Dr. Arthur Burrows, M.D.Lond., has been appointed Radiologist to the Manchester and District Radium Institute, the Royal Infirmary, Manchester.

Dr. James Reid, of Portsoy, was the recipient the other day of a suitable presentation in token of the esteem and respect in which he is held in the district.

Dr. Charles Tanfield Vachell, M.D., aged 66, of 11, Park Place, Cardiff, late Consulting Physician to the Cardiff Infirmary, left estate of the gross value of £21,793.

Dr. Harold Scurfield, M.O.H. of the City of Sheffield, has accepted the invitation of the Council to become Professor of Public Health in the University of Sheffield.

We are asked to announce that the dinner of the past and present students of King's College Hospital will not take place on October 2nd, as arranged, on account of the war.

Mr. G. H. Marine, C.B., F.R.C.S., Surgeon to St. Thomas's Hospital, has gone to France to join the staff of the Principal Medical Officer of the Expeditionary Force as Consulting Surgeon.

Dr. A. C. Farquharson, at present serving as Captain R.A.M.C. (T.F.), 6th Durham Light Infantry, has been unanimously adopted as the prospective Liberal candidate for the North Leeds Division.

Sir Wilmot Herringham, M.D., Vice-Chancellor of the University of London, will deliver, at 4 p.m., to-day (Wednesday), the public opening address of the session at King's College, on "The Universities and the War." The Principal of King's College will take the chair.

A handsome three-light memorial window to the late Dr. W. B. McQuitty, of Belfast, was dedicated the other day in St. Jude's Parish Church, Belfast, by the Lord Bishop of Down and Connor and Dromore.

The Royal Sanitary Institute have arranged a course of lectures and demonstrations on first aid, personal hygiene and camp sanitation at their premises in Buckingham Palace Road to 750 men of the Field Ambulance detachments.

Miss Fanny Cresswell Paris, daughter of the late Dr. John Aytton Paris, formerly President of the Royal College of Physicians, and author of "Pharmacologia," celebrated her 100th birthday at her residence at Yarmouth, Isle of Wight, last week.

Among the medical profession volunteering for active service at the front are the whole of the members of the staff of the Lister Institute, London, amongst them being Dr. William J. Penfold, third son of the late Mr. J. B. Penfold, Brampton, who goes out in charge of the enteric fever hospital.

A native of Bury and a Vice-President of the Association of Lancastrians in London, Lieut.-Col. Thomas Horrocks Openshaw, Surgeon to the London Hospital, has been appointed Principal Surgeon to the base hospital now being erected at South Queensferry, Fifeshire, for the reception of sick and wounded naval officers and men.

At a Court of Governors of St. Bartholomew's Hospital the Acting Treasurer reported that an offer to place a wing of the hospital (174 beds) at the service of the War Office for the reception of sick or wounded soldiers had been accepted. The hospital had undertaken to bear all expenses of maintenance, and the wing had been made ready for occupation at the beginning of the month, but up to the present no patients had been received.
CLINICAL LECTURE.

ON

THE TREATMENT OF ANKYLOSIS BY THE FORMATION OF NEW JOINTS. (a)

By A. H. TUBBY, M.S.Lond., F.R.C.S.,
Surgeon, Westminster Hospital, etc., etc.

[Specially Reported for the Journal.]

The subject which I have chosen for the lecture to-day is one which deals with very modern surgery, and requires very careful examination. Up to within perhaps the last nine years we generally thought that the best results which could be achieved in the cure of joint disease were by means of a stiff joint after all the disease had settled down. We have now reached, or have attempted to reach, a stage beyond that, and we have come to the conclusion that after all the disease has subsided for some time, and all traces of it have gone, we should then make an attempt to fashion the joint and restore the use of the part. But, like all other new procedures, it is one which must be approached with very great caution, and, indeed, it is very difficult to achieve satisfactorily. As you know, ankylosis is of two kinds—the fibrous and the bony kind, and it very often happens that the fibrous ankylosis gives sufficient movement of the joint to make it thoroughly useful and to render it unnecessary to interfere.

In the case of the lower limb, good, firm, bony ankylosis is a very satisfactory result, and it is difficult to make up one's mind and come to a decision as to whether ankylosis of the lower limb shall be interfered with or not. Now with regard to the methods of treating ankylosis, they are practically three, with numerous subdivisions. One is by excision of a portion of bone, and trusting to obtain a false joint such as sometimes unfortunately follows a fracture. The second method is by what is called the interposition method—interposing some material between the bone-ends—which will take the place and act as a substitute for the synovial membrane. The third method is total transplantation of a joint from one subject to another. Now, I may say at once with regard to the last method that I have had no practical experience of it, but there are some satisfactory results which have been published lately, and perhaps I may have time to make some reference to them.

With regard to excision of bone, you may take it as a broad statement, and as a very true one, that you cannot hope to obtain anything like a perfect new joint by this method—in fact, as a rule, excision of a portion of the bone is a complete failure so far as the making of a new joint is concerned. We therefore turn to what are called the "interposition" methods, and they are classified according to the substance which is interposed between the bone-ends. You may use mineral substances such as gold, silver, platinum, or plates of ivory may be interposed, but the satisfactory retention of these presupposes aseptic tolerance which is not always present. Too often it happens these foreign substances are extruded, and the last condition of the patient is worse than the first. Therefore I do not think I need occupy time in a discussion of the question whether ivory, gold, silver, platinum, or india-rubber should be put in because other and more satisfactory methods have been found. With regard to interposition methods the material used may be one which has been living and has been rendered sterile and for a time non-absorbable; such a material is cartilage membrane, as is also that new material which has been brought into notice by Professor Dacier, of the Johns Hopkins University, which is obtained from the submucosa of the pig's bladder. Both these materials are prepared so that they are entirely sterile, and they are further hardened so as not to be immediately absorbed, but are inert for some days. Then the process of absorption commences. You can so harden them that some kinds are absorbed in ten days and some remain non-absorbable for thirty days or even longer, but eventually they disappear. These materials act as an envelope or covering for the bone-ends, and help to form the synovial membrane. Other materials, which have been transposed, generally from the patient himself, are living materials.

Now the most useful thing of all perhaps is a muscular flap. For instance, if you are dealing with a case of ankylosis of the elbow you may interpose a muscular flap; or instead of muscle you may use some of the subcutaneous fat, or a combination of fascia or fat, or you may follow the latest method which has been introduced by Professor Putti, of Bolgna and take a large flap of fascia, especially in the case of an operation on a knee joint, completely free the fascia, and transplant it bodily into the joint. Now, experience shows that these living transposed and transplanted flaps answer extremely well. In the case of a muscular flap we now know how it is that it acts in the formation of new synovial cavity. In order to understand it, I must ask you to consider what takes place in the case of a false bursa. When irritated the subcutaneous fat becomes absorbed, and large spaces form in the connective tissue. Gradually these connective tissue spaces run together into one cavity, which forms a false bursa. You ask how all this comes in with regard to muscle. Muscle, when transplanted, undergoes fatty degeneration extremely rapidly, and in that fatted degenerated muscle a false bursa or a synovial cavity forms. The muscle selected is always near the joint, so that it is very easy to interpose it between the bone-ends. It is further well supplied with blood, and stands handling very well; so that of all living substances that may be interposed between the bone-ends muscle is probably the most satisfactory; after that come the fascia lata together with some fat, and then large plates of subcutaneous fat, in order of usefulness. If, however, you make a large flap of subcutaneous tissue you
deprive the skin of its nourishment, and it may perish. Other materials have been tried. Perios-teum, for example, has been transplanted into the knee joint, but the results on the whole do not seem to be very satisfactory.

Lastly, it was thought quite rational if we used transplanted cartilage. For this purpose costal cartilages, were chosen, and I have done two operations with rib-cartilages, which I can tell you were unqualified failures, for several reasons. One is that the cartilage itself is a non-vascular structure, not supplied with blood-vessels, but is permeated by lymph channels. As you know, the cartilage gets its nourishment from the perios-teum, and if the bone or boneまれ d cartilage be cut into small bits you simply put into the joint a number of small pieces which have to depend for their nourishment upon exuded blood; and as a matter of fact most of these pieces of cartilage die. The second difficulty is in fixing the small pieces of cartilage to the bone. Another reason why cartilage is a failure is that when it begins to degenerate, as it must when transplanted from its original position, it undergoes fibrous change and merely forms fibrous tissue which connects the two bone-ends. So, for these reasons costal cartilage should never be used for the purpose of curing ankylosis. Other materials employed are peritoneal membrane, and substances of that nature, but unless properly and thoroughly prepared they undergo such rapid disintegration and such rapid absorption that they disappear before the bone-ends have had time to become covered.

Now we come to the consideration of the purpose, and how, and when, and why this somewhat advanced operation should be undertaken. The affections which give rise to ankylosis are comparatively few, and they are well recognised. One of the most common is injury. Another cause is tuberculous disease of the joint. A third is septic, a fourth is gonorrhœal trouble, and these really are the main causes which we meet. It is for the sequelal of these four conditions that the question of the restoration of the joint should be carefully considered, and I may say at once the most favourable is traumatic ankylosis; and, for instance, from a severe fracture of the elbow or the knee-joint. Next in order, as favourable, is perhaps gonorrhœa; then perhaps ankylosis following after septic arthritis. The difficulty is in determining whether an operation should be undertaken for post-tuberculous ankylosis. Let us consider the broad points on which we should approach such an operation. The first fact to take into consideration is the age of the patient. Everyone knows that up to the age of about 18 years the epiphyseal lines are still active, for example, with a knee-joint which has become fixed, in order to rectify the ankylosis we may have to take away so much of the bone that we may encroach upon the epiphyseal lines, then the operation should not be undertaken. In a broad way we can determine this question by having stereoscopic X-ray photographs taken, and we can form an estimate of how much bone will require to be removed and if the epiphyseal line will be excised upon if it is on no account should the operation be done. It is considered that the best and most favourable ages for ne-arthrosis are from 18 to 30, as the subject is then in the period of most active life. It is the time when injuries are most prevalent, and it is when the patient wants to use his limb to the best advantage. After 30 years of age, the tissues do not tolerate interference very well, and the transplanted portions may break down.

We must next take into consideration what previous malady the patient has had. If, for example, a patient has rather a bad traumatic ankylosis, providing his general health is good, he will, other things being equal, afford a good opportunity for the operation. On the other hand tuberculous patients do not bear the operation well, and they do not heal up well. Very often the superficial tissues have been injured by tuberculosis, the skin is scanty and scarred, and interference with it may be followed subsequently by sloughing. So, therefore, except in certain cases of hip disease, one would prefer to put tuberculous ankylosis in the category as unsuitable for the operation. As regards gonorrheal and septic ankylosis, operation is not contraindicated if the disease is quiescent or has subsided; and, further, you must make sure and ascertain that the blood is quite free from infective organisms. The great point is to be sure that there is no danger of setting disease up again. You can ascertain this by a consideration of the history of the case, by X-ray photographs, when you can see at once if there are any tuberculous foci, and by a very careful examination of the blood to see if any germs are circulating in it.

Having so far cleared the ground you may more closely approach your subject. An important point is the occupation of the individual. If he is one who requires to regain skilled movements, especially of the upper extremity, then I consider an operation on the elbow-joint, for instance, or it may be on the shoulder, is quite justifiable. If, on the other hand, there is ankylosis of the lower extremity and the man has no pressing necessity to be constantly bending his knee, as, for example, in the case of a sailor who is going up the rigging, then it is generally better to leave the knee joint alone, because a firm, straight, stable knee is far better than a rather painful, partially-moving joint such as you may obtain by these new methods of treating ankylosis; and therefore you must take into consideration not only the profession, but the function of the part which you wish to restore, which in the lower extremity is stability and strength in walking. The function of the upper extremity is not so much firmness as the execution of fine and delicate movements. Therefore many more operations for ankylosis have been done in the upper extremity than in the lower, until recently. The next point you must take into consideration before you embark on an operation is this—you should ascertain the exact state of the joint as far as possible. This you can do by means of X-rays, which tell you whether the ankylosis is bony or fibrous or whether partially bony and partially fibrous. You can also note the extent of the adhesions in the joint by injecting the joint with an inert gas, such as nitrogen. Then you should decide what material you will use. If it is a knee or elbow-joint in which there has been violent septic inflammation of the tissues, and excessive destruction of them, together with considerable loss of the skin, then it would perhaps be more satisfactory to use cartilage membrane or pig's bladder, rather than attempt to transplant muscle.

Before doing the main operation on a joint, you
must get rid of all secondary contradictions about it. For instance, if the ham-string are contracted, you divide them freely through longitudinal incisions. I will give you details of a few cases which I have attacked with very satisfactory results. A man, perfectly healthy and strong, at 46, fell over a croquet-hoop and injured his right elbow. The joint was so much damaged, and there was such an amount of inflammation in it after the fracture, that he had very limited movement—not more than five degrees and the elbow was ankylosed not at a right angle but an obtuse angle. It was, therefore, very awkward for him, and he came to me desiring to know if I could do anything to increase the movement, and he was operated on in October 1900. The joint was opened by a posterior incision, the olecranon, the head of the radius, and the inter-condylar part of the humerus were sawn off; and a flap of muscle from below the external condyle was retracted for a considerable period of such that the bone tissue and subcutaneous fatty tissue was pulled into place. The patient did extremely well, and I may say the end result was this—that he recovered absolutely perfect movement. One point in the success of the operation was the removal of sufficient bone. In this particular case about one and a quarter inches of bone were taken away at the time of operation. I think I may attribute to this fact the freedom from pain which the patient had after the operation.

I will give one more example where cargile membrane was used for an operation on the knee joint after septic arthritis. The patient was at 28, and was bitten by a lion in the Soudan on Christmas Day, 1900. I should say he was about ten days away from Khartoum at the time. The wound was kept clean by dressing until January 10th, 1910, when acute inflammation supervened, and he was taken as rapidly as possible to Khartoum, where an incision was made on the outer side of the joint, and a considerable amount of subcutaneous fat and tissue was excised and came away through the incision. For some days his temperature remained at between 102° and 104° Fah. Afterwards the joint was moved several times, but little or no movement was regained. When I saw the patient on May 2nd, 1910, the joint was still swollen and puffy, and gave me the impression that septic changes were still going on—that is to say there had not been a complete absorption of the toxins. There was a cicatrix, extending four inches, on the outer part of the joint. The supra-patellar bursa was quite obliterated, and the extensor tendon was absolutely bound down to the front of the femur. The joint was flexed at an angle of 15 degrees, and there seemed to be from this point about 10 degrees of flexion by passive movement. When, however, we attempted passive movement of any sort the temperature of the patient rose from 101° to 102°, and his condition was complicated by the fact that he was subject to malaria, and an attack was brought on very easily. However, he was anxious to have something done, and he said he would be quite satisfied if he ended up with a straight leg. I thought, perhaps, we might do rather better than that. He went to St. Thomas's Home and was treated with hot air massage, and the joint was moved from time to time under anaesthetics. This went on until September 20th, 1910. The patient was full of pluck, and he had eleven anaesthetics for passive movement of the joint. It was then evident no further progress was being made, and the obstruction appeared to be due to the following causes. First, the obliteration of the supra-patellar bursa; secondly, adhesions within the joint; and, thirdly, the dense cicatrical tissue on the outer side of the joint. I decided to open the joint freely, clear the adhesions, make a new supra-patellar bursa, and try and restore as far as possible the movements. A semi-lunar flap, four inches long, was cut in the front of the patella, the result of the operation, and the border of the patella, was raised from the front of the femur. The supra-patellar bursa was found to be obliterated. The joint was then opened, and on its outer side adhesions nearly as thick as one's thumb were found, and on the inner side there were numerous fine adhesions. All were either separated or cut away, and in order to cover the spaces left on the external condyle and external tuberosity of the tibia, I stitched over the bones a layer of cargile membrane. I then put two other layers of cargile membrane and securely stitched them so as to form a new supra-patellar bursa. Finally, I divided the scar tissue on the outer side of the joint by a number of incisions, and closed the wound. The patient healed well. On June 21st, 1911—nine months after the operation—the angle of flexion was 26, and he could extend from 26 degrees up to 15—that is to say, he had added 11 degrees of extension. As to voluntary flexion, he could go 26 degrees, and with passive movements he could flex to 65 degrees. The result was that he regained 45 degrees of voluntary flexion and control. It gave the man just the movements he wanted. When he left St. Thomas's Home some roughness was felt in the joint, especially towards its outer side. The joint jumped just like a motor-car going over cobble-stones, but in a month's time those rough places had become smooth, and the movements of the joint had become even. He then, I was led to seek another occupation, and he obtained the post of superintendent on a rubber plantation in Borneo. On February 13th, 1912, he wrote to me:—"The leg is behaving remarkably well. The latitude of movement does not increase but my muscular development is splendid. I think my muscles are nearly as strong as those of the left leg, and my calf measurements do not vary much now. I do a great deal of walking up rough road tracks which are very hilly, and except for what restricted movement the leg causes me no trouble." On March 13th, 1913, he wrote:—"You will be much pleased at the development of my left leg. I am able to walk over rough roads, and there is no trouble except for limitation arising from movement. The latitude of movement does not increase." This is a case in which one was handicapped by the original cause of the trouble, and by the fact that the patient had constant attacks of malaria at the time of the operation, also by the septic state of the tissues. I have done similar operations for ankylosis, and I have learned from Professor Putti, of Bologna, the value of transplanting of flaps of fascia, and I now have a case in the Royal National Orthopedic Hospital of bone ankylosis of the knee-joint of septic origin, in which I have used such grafts with a promising result.

Now, as regards the after-treatment of cases of ankylosis, one difficulty, which must always be taken carefully into consideration, is the fact that they are extremely painful cases,
and in selecting your patient, unless you are quite certain that the patient will have sufficient pluck and perseverance to go through a prolonged, painful, difficult and somewhat irksome after-treatment, my advice to you is—leave the case alone. Therefore, do not select a weakly male or a nervous female for your treatment. If you do, you are bound for disappointment, because they will not, and cannot, face the pain and the persistence required. Now, the patient I have told you about, who had a black, was a man of the most unlimited pluck. Nothing ever daunted him; he was used simply to work and work away at that knee-joint, prepared to do anything and submit to anything with the object of obtaining increased movement, and a large part of the success was due to his splendid pluck and fortitude which carried him through so many difficulties. One other point in the after-treatment of these cases is—should we attempt early passive movements or not? In my earlier cases I used to begin passive movements quite soon. I am convinced I made a mistake. I feel it would be better to leave the question of passive movements for three weeks after the operation. If we implant tissues in the way which has been indicated, by early passive movements we must certainly displace them, and cause them to ruck up, and produce a good deal of haemorrhage into the joint, and this while transformation in the fibrous tissue is proceeding. I am therefore convinced that the proper thing in these cases is not to attempt passive movements for three weeks, but, as soon as the wound is healed encourage the patients themselves to make active movements. They will not allow their active movements to go so far as to disturb the parts, whereas passive movements often result, I think, in distinct harm and discount the value of the operation. Another point is that of supervision. I do not think I should care to undertake the treatment of one of these cases of ankylosis by an artificial joint, unless I could have the patient under my immediate observation for four to six months afterwards, because the treatment must extend over that time; but with these reservations, with careful selection of cases, with good judgment, and thorough technique I believe the operation has a distinct future. It is not an operation that is to be widely practised, but it has possibilities in competent and careful hands.

NOTE.—A Clinical Lecture by a well-known teacher appears in each number of this Journal. I lecture for next week will be by J. D. Martine, M.B., F.R.C.S., Anaesthetist to the Royal Waterloo Hospital for Children, Throat Hospital, and St. Peter’s Hospital.

Subject: "The Medico-Legal Position of the Anaesthetist."

THE TREATMENT OF TABES DORSALIS IN THE LIGHT OF ITS RECENT PATHOLOGY.

By TOM A. WILLIAMS, M.B., C.L., Edin., Neurologist to Epiphany Free Dispensary; Memm, Corren, Soc. de Neurolog, de Paris; Memm, Corren, Soc. de Psychol, de Paris.

Before considering the treatment of tabes dorsalos, it is necessary to have a clear notion of its pathogenesis, so that one may always keep in mind the process against which efforts are to be directed. The review I shall attempt is all the more required in that there will emerge from it conclusions entirely at variance with the pessimism of the dystrophic theory, so recently re-emphasised by Ferrier and still later by Mott. Both of these writers have, as is to be expected too similarly the considerations regarding the posterior roots which Nageotte was the first to place forward convincingly. An examination of his facts should convince the impartial that tabes cannot be a dystrophy of the sensory plexons; for it is a degeneration secondary to a meningitis of specific nature which fails most heavily upon the posterior roots from anatomical and physiological causes.

In serial sections of the roots of the spinal cord, one cannot fail to see that the meninges in approximating to and ensheathing the radicular nerves leave a potential space, a canal, for consider­able distance along the roots where the anterior joints the posterior.

Nageotte’s serial sections of the roots clearly show that just at this canal occurs a round cell infiltration of the perineurium and peri and endoneural sheaths. This spot is, in the lower lumbar and sacral nerves, a long distance from the root. This ring is that described by Rokitansky, Obersieiner, and followed them Orr and Rows, believe to mark the commencement of the posterior column degeneration. The inflammatory process upon the radicular nerve differs only in intensity, but not in nature, from that upon the meninges, generally speaking. But on some spots there may even be found a well-marked granuloma of minute size; and this may sometimes be seen in the process of degeneration into a cyst.

This exudate, which not only lies upon, but infiltrates the endoneurial trabeculae of the roots, cannot but impinge upon and injure the nerve fibres. And it is their destruction at this spot which induces the degeneration of the posterior columns of the cord. But it is not only the intramedullary fibres which atrophy, but those in the roots as well, that is in their course from the site of the lesion towards the cord. The results do not differ from those caused by the root pressure of tumours of the theca veraebralis or by tubele of the same. The effects of the increased intramedullary tumours are similar, too. In this latter example, however, the lesion of the root is produced mechanically by the pressure forcing apart and flattening the nerve fibres. But the site of the process is the afore-mentioned canal called by Nageotte the radicular zone.

In the root itself, however, regeneration is possible when the lesion is absorbed if that takes place. But within the cord no regeneration can occur; for no neurolemna is possessed by the fibres there.

Now as a granulomatous process often undergoes resolution with only an insconsiderable cicatrix, many of the roots in tabes may not appear degenerated to the naked eye on account of the new-formed fibres maintaining their bulk at a normal circumference. But under the microscope such a nerve shows an abundance of new-formed fibres, many of them ending in the small, curling neuromata so familiar in amputation stumps. These regenerating fibres are not Rülickean. Of course, when an extensive fibrosis has occurred the fibres regenerating from the ganglia cannot traverse the radicular zone; and we find then the flattened and empty roots which so often occur in cases of long duration.

In some individuals the adherence of the meninges may be more areolar and extend nearer...
symptoms is explained by the prolonged exposure of those to meningeal irritation during their passage across the subarachnoid space. And moreover the implication of the optic nerve in this situation, where it is no longer a posterior root, but a body of relay neurones, is another proof that the disease is not a mere affection of the internuclear dyrstrophy. Again, most persons lie rather on the back than the face, and this may partly account for the lesser implication of anterior roots. The lesson of hypostatic pneumonia and of abscess draining surely indicate the importance of posture.

Marinescu and Minea have also minutely studied the occurrence of roots of anomalies, and in many cases have shown definite regenerating fibres. (The process of regeneration is most conspicuous in the early stages.) They exist not only in the roots, but extend to the ganglia, and there is a great difference between the internal and external poles of this, the persistence of old axons being much greater at the latter. The fibres are embryonal and resemble those found in regenerating nerve. They usually arise from the glomeruli, and are generally collaterals, though they may be rejeuvnations of old nerve fibres appearing as a fine black staining fibre from the extremity of an axon which has become conical; they are hard to trace. They find a place in the Marques de Lejonne's nerve and at the emergence of the radicular nerve at the superior pole. Marinescu considers them as a reaction of the cytoplasm caused by direct irritation, for they occur also in transplanted ganglia and in myelitis. They therefore believe that the tabetic degeneration is a primitive atrophy of the internal origin of the eradicating nerves. They consider syphilis toxic, for they cannot otherwise explain the fact that changes occur not only in the radical nerve, but the intra-ganglionic fibres. They therefore believe that the interstitial and vascular inflammation is only concomitant and secondary.

Against this view must be urged the vast disproporportion of the degeneration of distal and proximal to the radicular zone respectively. It must be remembered that many observers have found the ganglion cells implicated, and the explanation of this is simply the extension backwards of the process which is begun at the radicular zone, for this is always much more gravely attacked. But it is possible to explain the peripheral neuritis in certain cases. And, indeed, in a later communication, the same authors point out the inverse ratio between the number of uniform fibres and those degenerated, both within the ganglion and in the radicular nerve. The regenerating fibres in the more chronic cases rarely reach the posterior roots properly, as they traverse a most circuitous route, often turning backwards. The degenerations extend right back to the ganglion, and the axolysis and interibrillar accumulations resemble those in sectioned nerves; but the process differs from this in that a degeneration extends right back to the ganglion, which does not occur when after a mere section. Moreover, the regenerating fibres remain embryonic, all of which goes to prove the primitive intoxication preventing them from complete development.

These considerations entirely negative a dystrophic explanation of a process where anatomical regeneration is so conspicuous a factor, even though mechanical and perhaps chemical and biological reasons, the regenerations may not become functionally effective (see photographs of microscopic sections in "International Clincs," April, 1910.)

The early meningeal infection, the continuance of which eventually produces tuberc fishes, is illustrated by a patient of Gaebler and Malozoi,
who was entirely refractory to mercury, and who seven times presented exacerbations of cutaneous lesions accompanied by meningeal syndromes of fever, headache, vomiting, stiffness of the neck and lympho-eytosis.

The mode of penetration of the inflammatory process into the optic nerve is illustrated by Babincki and Chaillous in their table in Gabbeis. They show that there is no particular type, but in most cases an irregular contraction for white, usually on a par with the general enfeeblement of acuity of vision, though, in a few cases visual acuity is good. True central scotoma is rare, and is generally due to an added intoxication by tobacco and alcohol; but central vision may be distinctly conserved even by a sector of the field, and may even leave part of the peripheral field intact. But Gulewski has shown how central vision may be lost very rapidly as soon as a half sector of the field has been implicated, and that this is due to the situation of the central fibres in the heart of the optic nerve and to reach which meningeal inflammation requires considerable time.

Lesions of the sympathetic fibres are quite common in tabes, the lesion occurring as they pass from the grey matter of the cord, probably Bruce's intermedio-lateral column, to the sympathetic chain, via the spinal roots. Such lesions may even be focalised, as in the case of Jeanneine and Sonzio, in whom ipsilateral sympathetic fibres were killed; and along with hemi-hyperaesesthesia of the face and head occurred without fever or other general symptoms, but with marked redness and herpes of the throat, ear, and face, with a myosis and iridoplegia to light. The man had always been subject to hepatic attacks, but not of this character; there were extensive hemi-hyperaesesthetic areas in the face and left arm, with circumscribed pain since a year, staggering gait. Lumbar puncture showed lympho-eytosis. Sympathetic symptoms largely cleared up in a few days under mercury.

Muscular atrophy in tabes is being more and more frequently reported. Thus Camp reported to the Philadelphia Neurological Society two cases of tabes, which began with a muscular palsy of the extensors of the foot; he emphasised the relationship of this to oculi palsy. Lapinski, too, publishes many cases beginning with motor paralysis, but he believes them due to loss of tonus by lesion of the posterior roots, not taking into account the researches of Bouguereau for the posterior roots. The early occurrence of the paralyses which occur in early tabes is illustrated by the case shown by Cronson and Nathan at the Paris Neurological. There was total bilateral ophthalmoplegia, masticatory paralysis, and uni-lateral facial palsy, with hyperaesthesia, without sensory troubles of the face or any part of the body; but he had lightning pains, muscular atrophy, slight troubles of the sphincters. No muscular atrophy followed, and the paralyses all recovered except that of the right abducens.

This case may be compared to that shown by Lamy, in which, however, the muscles atrophied after 11 years' slow progress, the only other signs being reflexes, palsy of one knee jerk; lightning pains had never been complained of.

Souques, too, reported a similar case of external ophthalmoplegia only with palsy of the palate, respiratory crises, rapid pulse. In the limbs the only symptoms were formication and occasional crises of pain; there were no sphincter troubles. There was a decided atrophy of the intercostal muscles, causing a poly-enchephalitis inferior.

Raymond's cases of muscular atrophy of the arms are most striking. So is that of Souques, in which the muscular atrophy was of the Arras-Duchenne type, without sensory troubles in the arms, while in the lower limbs lightning pains had occurred, and the left knee and right Achilles reflexes were abolished, although both great toes extended on stroking the sole, and there was reflex irido-plegia. He interprets the symptoms as all being due to the same cause—viz, syphilitic meningomyelo-sclerosis, and cites in similar thirty cases of progressive muscular atrophy in syphilis collected by Leri, and the cases of Rendu and Laignel-Lavastine, in which Arras-Duchenne palsy occurred in the course of general paralysis. In all these patients but one, who refused examination, lympho-eytosis was found.

Localised tabes is still more apparently the origin of muscular atrophy in a case of the author. It is one of cerebro-spinal lues, whose symptoms are mainly mental, but who shows unilateral hypo-esthesia of L. V. and S I only, along with marked atrophy of corresponding gluteal.

The case of meningo-radulitis reported by Raymond as occurring in a boy shows definite localization of sensory and motor troubles, L. IV, V, S I, II, III, IV, being implicated. There was then, however, no irido-plegia, though the Achilles and patellar reflexes were absent.

Mott objects that the Argyll-Robertson pupil is too constant to be explained by the incidence of a syphilitic process in the retina, although such might be the case in tabes, or metastases, as he assumes, but of general attack of the meninges, which determines a slowly progressive involvement of those nerve fibres which are clothed by the diseased membrane. Their danger, functionally speaking, is in proportion to their length of exposure, and inversely to thickness of covering relative to the meninges. One may find a strong presumption that the photoreflex arc is particularly exposed to attack, whether because of superficiality of course, or a peculiarity hitherto unsurmised. It is to this rather than the invocation of metastases that we must refer its so frequent implication; as, of course, it escapes in merely focal syphilitic affections of the central nervous system, it being too soon too complicated by a menigitis. As Nageotte long ago remarked, lympho-eytosis long precedes irido-plegia. Even lost knee-jerks often do so, too.

Researches in this direction following up those of Marino might show that the irido-plegia to light was a purely sympathetic phenomenon, and led to the implication of non-medullated or non-medullated fibres during the course from the carotid plexus to the ciliary ganglia; for the photomotor reflex may be due entirely to inhibition of the cilio-splanchnic centre ceasing to antagonise the tonus-regulating sphenicter pupillae under the control of the third nerve. It must be remembered that some fibres of the phrenic nerve and roots are distributed to the more usual contractions. The Argyll-Robertson pupil might be regarded then as one not dilating to the absence of light, which presents the impression to the observer of not contracting to light, for, of course, it has no stimulus to do so unless in a state of dilatation in the proportion to the illumination it undergoes. The fact that only from 35 per cent. of syphilis should ultimately present symptoms of tubes or paresis is no more remarkable than the similarly small percentage which suffers from sclerosis or gumma of the liver, which no one pretends to signify a special degenerative predilection of this set of sympathetic fibres; for it is clearly recognised that gumma is a focal infective granuloma, while in diffuse sclerosis the atrophy of glandular cells is entirely secondary to the connective tissue inflammation. Why then should one desire to invoke as an explanation of
tabo-paralysis such a tendency to parenchymatous dystrophy as is involved by Mott following Fournier? Such an explanation is completely negatived by the constant and continuous growth of the axones from the medulla in the spinal cord. Varicides in their attempts to traverse the inflammatory focus in the radicular zone. It is against all we know of pathology to suppose a dystrophic neurone to be capable of such persistent growth. Whereas the real explanation is before one's eyes in the meningitis focus upon the radicular nerve.

The other reasons which he does not specify, rejects the view of Lesser, Rose, etc., that tubules, etc., are quaternary sphymis, and comparable to the scleroses of orchitis, glomosis, etc., and that the degeneration of the medull elements is secondary to the meningeal and perivascular infiltration and to the proliferation of glia; but the facts I have presented make it difficult to reject these views without due reasons.

To support the dystrophic theory, he is driven to contend for numerous hypotheses, such as that the nerve cells of a syphilitic acquire a habit of increased metabolic activity continuous during life, and that this contributes to excess of lipoids in the blood. To some extent increased functional activity is the effect of increased functional nervous activity in the early stages, and this is specially injurious with regard to the genetic function on account of the loss of the nuclein substances of the sphen, because the lipoids may be products of nuclear activity, and the highly phosphorised nuclein may be really the source of the action.

The excess of lipoids may as easily be explained by an increased breaking down of cells, not necessarily even those of the central nervous system, due to the chronic inflammation process of specific kind. We are very far from being able to affirm a perverted habit of cytologic activity and to base a doctrine upon shoulder a hypothesis in to say the least a pretence. Moreover, we have no proof that loss of highly phosphorised nuclleo in the sphen by sexual activity in any way injures the organism.

Such speculations strike the writer as being at variance with the methods which science has learnt to adopt in order to safeguard its postulates from the encroachment of ill-founded hypotheses.

Of course, such conclusions connote the uselessness of anti-syphilitic treatment to a system which has already "over immunised itself against the syphilitic virus," and compel recourse merely to suppression of causes which use up nerve energy and overturn metabolic equilibrium.

Of course, the physician should neglect the management of these factors; but recent evidence tends to show that there is as much validity in administering mercury in tabs and even paresis when diagnosed early as there is reason to do so in arterial degeneration and guma, whether in the central nervous system or not. The latter are both unamenable to such remedies as the former. But the arterio-sclerotic has been destroyed, and atheromatous arteries have no more power of regeneration than has the central nervous system. But no one withholds mercury for these reasons; for though it cannot restore dead tissues, we do believe that it at least increases resolutive activity and aids in arresting the growth of the infective process. We are inclined yet certain whether mercury and iodides act antibacterially or as antitoxines directly, or whether they do so by stimulating the defensive reactions of the organism by means of the internal secretions or otherwise. There is even a possibility that just as digitalis may shorten the life of the individual by using up cardiac energy prematurely, so may mercury exhaust the defensive powers of the patient. Thus Kron concludes from the study of 452 cases that more treatment commotes earlier tabs, and Craveri believes in low doses from his experience of earlier cases, many of which lacked the Westphal sign and had only one symptom.

Fauci, of Malon, has pointed out that mercury, while it does harm to tabetic with chronic cystitis or intestinal troubles or cachexia, is of great benefit even in some cases of tuberculosis, if not pulmonary. He quotes a case of a man of 40 who had had tuberous osteitis and was attacked by a severe tabes with multiple symptoms. After five months of mercurial treatment he is in excellent health, and all of the annoying symptoms have disappeared. Moreover, in tuberculians not treated by mercury, relapses are very frequent.

In Donath's case the knee reflexes which had disappeared five months after the first symptoms showed themselves, returned twenty-two months later.

The experience of Erb and Babinski strongly confirms the usefulness of mercury; they find that the pain, especially, disappears after thorough treatment, and that the progress of the disease ceases, although, as before explained, regeneration cannot be expected. Lesser believes that the Wassermann reaction is of use in controlling the administration of mercury, in that it becomes feebler during treatment, and that he has found it in only go per cent. of tabetics on account of the well-known tendency to arrest in this disease, whereas the complement is deviated in all cases of paresis. (a)

It must be recollected that the specific meningitis which causes tabs is often complicated, especially in later life, by arteriosclerotic conditions. An old long ago caused Gowers to place degenerated spinocerebellar tracts in the picture of tabs. In estimating the pathogenesis of tabetic disorders, such anomalies must be taken into consideration. Thus Long reports a case of spastic tabs where the reflexes disappeared only at the end of the disease, and the roots were little altered.

In the early stages, too, the palsy tabesful in reacting to the noxa, may show periarterial infiltrations, as shown first by Bentley, as Schroeder found in five cases, not only in the posterior column, but in whole circumference of the cord and optic nerve and brain stem as well, though not in the cortex. These infiltrations were denoted in the author's cases as pseudo-tabs. This is the process that occurs in the cortex of paralytics; but according to Alzheimer, it rarely occurs within the cord of tabetics, although he, in common with Nageotte, has always found infiltration and thickening of the pia mater itself, as has Spiller in most cases.

Another source of error is the acute and grave degenerations of medulla and nerve which sometimes occur in syphilitics, whether tabs or not. Thus Preobraskensky reported a case which died in thirteen days after onset of an acute muscular atrophy of limbs and trunk. It was only at the end of the illness that pains and irreglar penses ensued; the man had syphillis fifteen years before. Post mortem were found atrophy of the anterior horns and infiltration of the vessels of the cord with atrophy of the roots near the cord.

Crouzon and Villaret report that after some months of right scatina (meningo-myelitis) a man of forty-two died in eight days of an acutely inflamed ascending tabes. Bouchet in Cambrai reports that seven years after infection, with no symptoms of treatment, a woman of 23 was admitted owing to albuminuria. She had no cerebral symptoms, not even headache; but she died in coma.

We are of the opinion, that in these cases, at least, the theories of the sclerosis were quite right.

(a) See author's paper "Diagnosis of Tabs in Relation to Salvarsan." Fa. Semi Month, April 25th, 1914.
nine months, a tabetic. Post mortem, was found a meningos-vascularty like that first described by Dejerine and Sottas. Experimentally, Schroeder found in an ape which died seven months after inoculation after a month of ataxia and blindness, without loss of the light reflex and with exaggeration of the knee-jerks, an atrophy of the optic nerve, the myeline of which was replaced by granulous, intense degeneration of posterior columns, with conservation of posterior roots, and no plasma or round cell infiltration. He believes this is not a true tabes, but an acute intoxication like Crouzon's case.

This exaggeration of knee-jerks is comparable to the lightning pains and the rare eye crises which Pel described in 1808 as an early symptom of tabes; they consist of great photophobia and lachrymation occurring periodically and lasting for a few minutes or more, often accompanied by hyperesthesia of the fifth or other cranial nerves. The classification and recognition of these symptoms are certified under "respiratory diseases other than phthisis, pyrexia of unknown origin, other fevers than small pox, etc." so that there is every reason to believe that the number of certified deaths is far below the actual number caused by the disease. There is, however, one reliable source of information as found in the reports of the Oriental Insurance Company. From the report of the number of deaths among our policy-holders we gather that tuberculosis claimed a mortality of 5 per cent. in 1911, 10 per cent. in 1912, and 11 per cent. in 1913. Based upon this calculation, and taking the population from the census returns for 1911 as 214,267,000 for British India and 315,000,000 for the whole of India, roughly speaking tuberculosis claims an annual death rate of 906,710 for British India and 1,169,280 for the whole of India, which means the equivalent of the whole of the population of Calcutta is wiped out in a year from the ravages of tuberculosis.

Europe's phenomenal progress in commerce and industry took the Indian ryot, the weavers and the artisans by surprise and brought about a state of things for which they were not prepared. The result was the crushing of the indigenous industries, unemployment, migration from the villages in search of employment and consequent overcrowding of towns, and high rents and dear food brought conditions of want and poverty. Malaria followed the neglect of the villages and their sanitation, and cholera, typhus, dysentery, tuberculosis, plague, pestilence and famine. To complete the picture, the adoption of European standards of living and the increased facilities for drink have intensified the effects of misery and poverty and prepared the soil for tuberculosis; a condition of things similar to England of 30 or 40 years ago. Owing to rapid growth of towns and cities, the absence of free grazing lands and increased expense of feeding cattle, the common articles of diet like milk, butter and ghee have rapidly advanced in price and cannot be had pure or of good quality. When we consider the prevailing rates of wages for millions of unskilled labourers are not more than two or three pence a day, we can see that any increase in the bare necessities of life soon over-reaches the margin of subsistence, resulting in under-feeding and starvation. The import of large quantities of condensed milk, tinned butter, and other artificial foods, in place of fresh dairy produce, account for the large infant mortality and defective nutrition of the poor.
Consumption is complicated with malaria—
the tropical heat and dust aggravate the symptoms. The social customs of the people, such as early marriage, are features that predispose the soil for tuberculosis. Besides poverty, malaria and overcrowding, Western civilisation has brought great unrest—social, mental, moral and spiritual—among the Indian people. After a close study of tuberculosis for 20 years I am convinced that it is not so much an infectious disease as a chronic disorder of nutrition, dyscrasia, and degeneration. The Indian population which suffers from poverty, hardship, scanty clothing, insufficient food, succumbs to fever and tuberculosis in a much larger proportion than the Indian troops, who are better fed, clothed and housed, and are under better sanitary conditions. There is practically no tuberculosis amongst Indian cattle; millions of people do not drink cow’s milk owing to its dearness or the difficulty of obtaining it pure, and yet tuberculosis, as we have seen, is very prevalent. So in Japan and other oriental countries where little or no milk is drunk, and still consumption is rife, so that the theory of milk infection should be greatly modified.

Remedies.—Just as in England, any cheapening of food and improvement in rate of wages and fixed incomes will reduce poverty and raise the resisting powers of the poor against tuberculosis and diminish the death rate in India. The first duty of the Government and social reformers in India should be to make every effort to keep the people in the country by making it attractive and habitable and reviving village life. This can be done by attention to rural sanitation, hygiene, the clearing of jungle, the provision of a proper water supply by digging wells, the organising of conservancy. The granting of free grazing land would revive the dairy industry and cheapen dairy produce and reduce infant mortality. Also by reviving the agricultural industry and improving the condition of the farmer by promoting indigenous arts and industries of the country, so that artisans will find work in the villages and thus reduce the congestion of the towns.

In the cities—improved sanitation, drainage, pure water supply, town planning with a view to wider thoroughfares, sufficient air, light and ventilation, roads through congested areas, the provision of parks and gardens, cheap lodging for the poor, to be hit at a low rental by the municipality, the distribution of the population to the suburbs by cheap train service, hygiene taught in schools, the inspection of the milk supply. All these sanitary measures will promote the efficiency of the people and help to solve the tuberculosis problem of the towns.

As medical opinion is still divided as to the efficacy of tuberculin any establishment of tuberculin dispensaries in India is at present unwise. I am in favour of the dispensaries system in India which would serve as a central bureau and sorting house working in connection with hospitals and sanatoria. The general hospitals would have special wards set apart for tuberculous cases, and early cases could be treated in sanatoria erected on suitable sites at an elevation of 4,000 to 5,000 feet to ensure a cool atmosphere and equable climate. Above all, I would strongly advocate a system of village colonies where consumptive patients should go and live with their families and at the same time carry out the open-air treatment under ideal conditions. The colonies would contain groups of cottages with large gardens, a hospital, sanatorium, school for children, a farm, dairy, laundry, etc. Here patients could also receive training in agriculture, gardening, dairying, industry, carpentering, etc. These colonies would, in fact, be model villages and embrace many of the features of the so-called communal system of work and training, and can be made partly self-supporting and partly helped by the municipality and Government. Some such scheme earnestly carried out would go a long way to solve not only the problem of tuberculosis but also other social and economic questions.

THE LEPROSY OF RATS.

By PROF. E. MARCHEUX, M.D.

[Specially Reported for this Journal.]

Impotence of the Experimental Method in the Investigation of Leprosy.

The bacillus which was discovered by Armauer Hansen in 1879, and which now bears his name, did not come to be definitely regarded as the specific germ of leprosy till 1879. Since the latter date a number of savants have in turn announced their belief that they had succeeded in obtaining cultures of the same in vitro. But the fact still remains that not one of them has presented the scientific world with any demonstrative proof of the real significance of his discovery. Thus the position with which we at the present moment are faced is that the bacillus of Koch has not yet been cultivated artificially. Therefore we have to admit that the procedure of experimental inoculation has resulted in no greater success. It has, indeed, been very often tried, and on various animals. Quite a number of observers have, indeed, actually recorded such successes as serial phenomena which, on closure of the account, could be clearly proved to have been but the result of a natural process of reaction, of which the preservative tendency was to secure the disappearance of the germs that had been artificially introduced into the previously healthy tissues. It must also be admitted that the essays in way of experimental infection of the human organism have been followed by no greater success. Apart from the celebrated experiment of Arming—which has been so vigorously attacked by Swift—all those of the long series carried out by Daniels, Bargilli, and Prodota, which comprised about sixty individuals, have remained absolutely negative and unconvincing.

Thus we have to acknowledge at present date that our investigations in the direction of attaining to a knowledge of the mode of contagion of leprosy have merely resulted in a series of repeated failures. And the observation, which I once made, that the disease has remained so persistently surrounded has inevitably projected its shadow on the prophylaxis, which has accordingly continued to be, in almost every detail and feature, exactly what it was in the middle ages—blind, if not wholly ineffective.

In order to make an effort to clear for ourselves a passage through and beyond those weathered rats, my collaborator M. Sorel and myself took up the study of the life of the rat, which is presented as a cousin-germanism to the nature of leprosy, calculating on being able to secure means of investigation which could be applied in dealing with the former, of a quality and effectiveness that had not hitherto been attained in dealing with the latter. It would surely not be the first occasion, if our hopes were realised, on which the successful exploration of the mysteries of a disease of lower animals had been made to throw light on a great work of research. In the organism, the etiology of which has previously proved itself an elusive enigma of which the oEdipus seemed destined to remain evermore unborn. Thus the evolution of the tale of the preocupations of Halsted R. Ross to establish the mode of propagation of paludism, with all its attendant train of physical ills. For corresponding reasons we set ourselves to demand every day from tuberculous animals some further enlighten-
ment which may subsequently prove applicable in the treatment of corresponding disease in the human species. It has seemed to us a logical inference which leads to the belief that a disease such as the leprosy of the rat, which is caused by the presence of a germ belonging to the same family that underlies the bacillus leprosus, and the bacillus leprosus would naturally furnish us with interesting revelations in this special domain of comparative pathology.

Our expectations in this direction have not been disappointed. It will be seen that the leprosy of the rat is outlined on the clinical model of that of man: in its symptoms, its pathology, its course and its termination. Accordingly, we have to press the question: Did not this disease transgress the limits of the gland. The parasitic bacilli now penetrate into the neighbouring meshes of connective tissue, and there proceed to determine the formation of little tubercles which thus develop all around them. In the neighbouring mammary gland, which is rapidly inflamed, the compressed secreting tubules rapidly undergo atrophy and disapper, so that the phenomenon develops in connection with the cutaneous tissue spaces, and the superficial muscular strata, in which the fasciuli are found to become separated, and undergo degeneration with excessive development of their connective tissue spaces, with the inf, and invaded by the parasites, encumber the connective tissue spaces and the mesh-work of the skin, notably in the more copiously irrigated regions which surround the hair follicles and the sebaceous glands. Thus it is that they produce asphyxiation of the follicles thus circumscribed, and thereby provoke the appearance of the characteristic patches of alopecia which are associated with the disease: they infiltrate the interstitial connective tissue of the skin, and thence lead to the segmentation of the nerves, and thus become the indirect cause of the trophic lesions which are found to develop characteristically in the skin of the affected animal, as well as of the motor troubles that present themselves in the muscles of the limbs.

The bacillus of the disease which is of more frequent occurrence than any other in its presence externally, by no specific physical sign of any kind, and its existence is, accordingly, discovered only at the autopsy. The glands are then found to be increased in volume and of abnormally hard consistence; they are also marked by pale in colour, and may sometimes attain considerable dimensions. Such physical conditions are not, however, absolutely characteristic of the existence of the disease in question, for they sometimes meet with infected rats in which lymphatic glands of comparatively small size; while, on the other hand, glands of very considerable volume may remain in the infected specimens. Then, again, all the glandular tissues throughout the body may remain within certain limited number.

The muscle-cutaneous form of the disease is more rarely met with. The animals therewith affected are extremely cachectic, and even move about only with difficulty, so much so that they may sometimes be caught with the hand. On examination, the skin is found to be thickened, nodulated, and very firmly adherent to the subjacent tissues. We find distinct nodules, which may attain the diameter of an almond or somewhat even of the size of a pigeon's egg. These tubercles are more especially prone to be localised in the skin of the head, of the external aspect of the limbs, and that of the flanks. They display no tendency to superficiality. In addition to the presence of these connective tissue formations, the skin is found to be studded with patches of alopecia of variable extent. Ulceration of the integument is also frequently met with. In no variety of the disease is there found in the deep-seated organs: at the utmost, we may occasionally meet with small nodosities of paleish tints scattered over the periosteum and throughout the substance of the liver and spleen. Some of the affected rats, however, if binds the liver and spleen. The bacilli of the leprosy of the rat, like that of the leprosy of man, is a special parasite of the mesodermic cells—the muscular and phagocytes of Metchnikoff—in which they form variable colonies. Its presence seems to prove injuries to its cellular host by the incurrence caused thereby, but not by any alteration produced by a toxic secretion. This tubercle increases in volume in order to be able to contain the increasing germs of bacilli which is protected by its waxy shell. Then it becomes destined to the utmost point tolerated by its structure, and ends by bursting, when the emancipated bacilli rapidly spread and become imbedded in the surrounding cells, which in turn come to serve as new culture media for the microbes, and contribute to the formation of a new generation of giant cells. The primitive tubercle is formed by the union of the giant cells and the invaded cells which surround them. From the point of inoculation, the virus proceeds to travel by the lymphatic route, and rapidly reaches the glands, in which the bacilli then develop; and before having transgressed the limits of the gland, the parasitic bacillus now penetrate into the surrounding meshes of connective tissue, and there proceed to determine the formation of little tubercles which thus develop all around them. In the neighbouring mammary gland, which is rapidly inflamed, the compressed secreting tubules rapidly undergo atrophy and disapper, so that the phenomenon develops in connection with the cutaneous tissue spaces, and the superficial muscular strata, in which the fasciuli are found to become separated, and undergo degeneration with excessive development of their connective tissue spaces, with the inf, and invaded by the parasites, encumber the connective tissue spaces and the mesh-work of the skin, notably in the more copiously irrigated regions which surround the hair follicles and the sebaceous glands. The result is that they produce asphyxiation of the follicles thus circumscribed, and thereby provoke the appearance of the characteristic patches of alopecia which are associated with the disease: they infiltrate the interstitial connective tissue of the skin, and thence lead to the segmentation of the nerves, and thus become the indirect cause of the trophic lesions which are found to develop characteristically in the skin of the affected animal, as well as of the motor troubles that present themselves in the muscles of the limbs.

Thus, in a word, the bacillus of Stefansky leads, by its multiplication in the tissues, to the consecutive development of a train of symptoms and of anatomico-pathological formations which are actually identical with those produced by the presence of Hansen's bacillus.

Experimental Inoculation.—The first successful inoculation of the disease on a healthy rat with the bacillus taken from the affected rats in the plague of the city of Friedland in the year 1897 was made by Dr. G. Dean. After the introduction of a large quantity of the infected material into the peritoneal cavity, he found that development of considerable lesions resulted. We now feel assured that the employment of in copious quantities of material from the infected rats. Quite as successful a result is found to follow the introduction of a particle of the contaminated connective tissue beneath the skin, or of a small portion of the infected material, such as a strip of infected skin, that the gate of entrance must have, however narrow, for the healthy skin presents an impenetrable barrier to the germs—even the extremely delicate integument of the rats which have not yet grown their hairless covering.

The white domestic rat is as vulnerable in presence of the infection of this disease as is the sewer rat, and this is, of course, not to be wondered at, unseen as he is to the attention of man. The disease may be infected in the same way as the rat; but, in the former, the disease process does not become so rapidly diffused throughout the whole organism, it remains, indeed, rather localised on the point of inoculation. Although certain investigators have succeeded in experimental infection of the guineapig, we are able to affirm that such success is of exceptional occurrence. The rabbit,
monkey, and other animals used in the laboratory for experimental purposes are found to prove equally refractory. Thus murine leprosy is a disease specially characteristic of rats, as human leprosy is limited to man.

The Pathogenic Agent.—The bacillus discovered by Stefansky is, as we have already seen, extremely abundant in the diseased tissues. We have already divested it of its mucous envelope, and exposed it to the light, and microscopically it appears. It produces Ziehl fixation more rapidly than does the bacillus of Koch, and it resists decoloration better than the Hansen bacillus when digested of its glairy covering. It also takes the Gram stain, and is protected in its concretion by the surrounding shield of wax, it successfully resists the digestive powers of the macrophages of which it becomes the parasite. Here, as everywhere else, the phagocytes fuse and isolate the germ, and isolate it from the surrounding tissues and fluids of the organism. But, as we know, nothing in the world is perfect. However well regulated organic functions may be, they are sure to prove themselves sometimes at fault. Here the qualities of the phagocytic cells render the microbe good service. The power of resistance to the action of the digestive juices depends in the service of the bacillus thus endowed by Nature, and the theoretical study of decoloration which thus favours its further reduction; and their mobility, which thus proves the means of securing its general diffusion.

The same phenomena develop in the course of the infection of human lepra, with all the variations of time and place. They are, however, less easily perceptible than in the case of the disease of the rat, in which they can always be reproduced experimentally in the animals used in the laboratory, in the vast majority of the cases which become amausted in the invaded tissues, the action of the bacillus of Stefansky approximates to that of Hansen's bacillus. But it is distinguished therefrom by the characters of the growing. Like the latter, it is in-capable of multiplying in absence of a food-germ contained in the protoplasm are found to be isolated, one from the other, and not grouped in spheroidal clumps in a mucous mass. This distinctive characteristic has been demonstrated by all investigators, and is very great. It is impossible to decide whether the glairy secretion which invests the bacilli of Hansen is actually of microbial origin, or merely emanates from the cells which may limit in this way the progress of the pathogenic invasion.

The bacillary structures usually measure 35–50 μ, in length by 0.5 μ in width. But these dimensions are not constant. We meet with some germs having a slight curve of curvature, with a terminal button at one extremity. All those qualities differentiate but slightly the bacillus of Stefansky from that of Hansen. On the other hand, the degree of germs, which is so very great, can according to state with confidence that the leprosy of the rat is as closely related to the leprosy of man as is axine tuberculosis to human tuberculosis. The bacillus is either bacillus remains still at the same stage. A multiplication of microbic stage. A multiplication of microbic elements take place readily enough in leprous tissues when placed on certain solid media, but the progress of the culture is always arrested at the limits of fragment of deposited germ. The leprosy bacillus has been found not infrequently—even if we use a piece of the corresponding tissue taken from a fresh rat.

When placed in a liquid medium, in which the microbes of decomposition abound, the bacillus becomes granular in structure, and comes to present the coccocithrix form that has been described as a modification of outline which is peculiar to Hansen bacillus. It is further seen that the coccocithrix is far from being really specimens produced by multiplication, are no other than products of degeneration, as can readily be demonstrated by experimental inoculation. Granular bacilli are dead bacilli.

Desiccation kills the bacilli of rats, which also resists heat better. It is a fragile germ. Exposure to a temperature of 60° (140 F.) for a period of fifteen minutes is absolutely fatal.

Pathology.—The characteristic course of the progress of the disease, the localisation of the germs in the skin and subcutaneous connective tissues, and the comparative insignificance of the incidence of the bacillus in organs seem to indicate that the germs penetrate the system through the integument. Indeed, an intraperitoneal inoculation produces an affection of grade character, which can be produced in the inoculation of the abdominal cavity or observed in the disease when naturally produced. But, where on the skin is the ordinary port of entrance? This is a question to which it still remains difficult to give a final answer. It could be traced to the point of original infection by following the lines traced by the infection subcutaneously.

Inoculation has demonstrated the fact that the bacillus of Hansen is non-virulent, and without leaving any trace in some cases at the post of which they had gained entrance. It is from those superficial glands that the disease extends. But the constancy with which the specific microbes are always found, and reach the gland which is situated at the point of confluence of the lymphatics of the infected locality has enabled us to negative the hypothesis of contagion through the nipple—which we had been disposed to favour from the fact of the constancy of the appearance of mammary lesions—or through the umbilical cicatrix. Experiment has also proved to us that we need no longer entertain the idea of genital contamination.

Inoculation with the bacillus of Hansen reproduces the disease now remains to be dealt with, which has been so much discussed in connection with the subject of human leprosy. It is capable of conveyance by the intermediate agency of a parasite, we may say at present to be communicated by those, on which it is widely disseminated than it now is. In fact, we know but too well the facility with which those maladies are transmitted which are conveyed by such invertebrate punctures. But even in presence of such knowledge it was desirable to support this notion by obtaining experimental results.

The parasite which has to be promoted to the position of a causative agent must inevitably be sought in such invertebrate punctures. Now there are three arthropods which live at the expense of the sewer-rat, and all three combine the conditions in question, and are as widely distributed as the rodent itself; the loise (Pelorogynus primordius), the flea (Anceophilus sarcoptes), and the acaria (Leiaps echidus). We found no acid-proof bacilli in any of the numerous fleas that we examined. But, on crushing on a slide the lice which were taken from the sewer-rat, we were able to detect acid-proof bacilli which resisted the process of decoloration by acids. This power of resistance was, however, found to be but feeble; side by side with bacilli stained red by the Ziehl-Neelsen process others are stained green blue, and still others which retain a violet coloration. But in those specimens none were found to be alcohol-proof. In form as well they differ greatly from Stefansky's bacilli. They are short, amylop and non-reproducing cocco-bacilli rather than a true bacillus.

In the Leiaps three varieties of acid-proof bacilli were met with. One of those is analogous to that found in the house; another is long, filamentous, extra-ordinary, and the alcohol-sensitive, but not the alcohol-resistant. It has curious resemblance to the bacillus of the leprosy of the rat. It is both acid-proof and alcohol-proof. It lives inside the cells, which are sometimes filled with masses of the bacilli. We are able to interpret the facts that we were able to determine the fact that it is a variety which must be differentiated. Inasmuch as they do not function as intermediate hosts to specific germs, those invertebrate punctures can not be considered as carriers. As a necessary consequence they play no part in the direct transmission of leprosy. Thus our experiments have been confirmed by the observation which had led to attributing all leprosy to inoculation, to their presence in this connection.

But, again, it is not those invertebrate punctures alone that have been incriminated. The sarcopeds has also been accused of transporting the germs of leprosy. Sarcopeds is a disease of leprous rabbits which is also found broadcast in the murine race. It was accordingly desirable that its influence
in the diffusion of leprosy should be carefully investigated. Experimental results have proved to us the fact that a rat in a cage, in which a leper had been enclosed, in ten days was found to have been infected with it no noxious germs. It should be remembered, too, that the migrants are then in the state of larva or nymph, and that in this stage of their development they are capable of passing on to the bacilli, as they are during the period of their adult existence in the tunnels in which they are lodged.

Our experience has failed to verify the hypothesis of Burro, that demodex do not disappear by disintegration the bacillus of leprosy. Not that the demodex fails to appear in the rat, but the mode of development of the parasite is so little known that it is peculiarly difficult to organise a series of demonstrative experiments.

But with regard to the flies, which have in turn been accused of being the agents of connection in the transport of the bacilli of leprosy, we have been able to prove for ourselves that they carry the fear of their presence that has been inspired by W. Wherry, by D. Currie, and by Lebauf. When permitted to promenade on the surface of a septic ulcer they become very active agents in the transport of germs. After having nourished flies for some time on the pulp of infected glands we have seen leprosy develop in all the wounded rats on whose raw surfaces they were allowed to promenade with their soiled feet, even when but a very short distance.

Thus this second category of arthropods, sarcoptes, demodex and flies are able to play an important part in the transmission of leprosy. The sarcoptes, by opening ports of entrance in the substance of the skin, may be considered as an auxiliary agent in preparation of a way for introduction of the virus. The demodex also, when conveying from one host to another its carapace contaminated by the presence of bacilli may be the means of introducing the noxious germs in a fertile soil. The flies also, by furnishing the microbes with the auxiliary aid of their own wings, may prove efficient agents in conveying the contagion to a distance.

The Specific Bacillus Membrane.—We must also face the hypothesis of a possible contamination by inoculation of mucous surfaces. Rats prey upon one another, and, accordingly, whenever they attack a leprous animal they necessarily absorb great quantities of the specific bacilli. In such cases we have noticed that there is always indeed but a small number of rats which contract the disease; but the latter is then found to present a particular form, that of a possible ultimate recovery. In the exceptional cases, which are also easily distinguished from the cutaneous or glandular leprosy that presents itself with all the other characteristic symptoms.

As in the case of man, the specific bacilli are found in the nasal mucus of the rats which are gravely attacked. A curious fact must here be mentioned: we have not succeeded ourselves in infecting any animal by rubbing, even forcibly, the pituitary mucous membrane with tampons or brushes charged with the germs of the disease. The copious secretion which supervenes on such artificial traumatism has the effect of washing the mucous membrane, and thus protecting it.

And we have had no greater success in carrying out the procedure with greater delicacy of manipulation. We have determined the fact that the preputial membrane of the rat is the organ on which the bacilli pass which are placed in the preputial fornix of the male. Thus there are, in case of the rat, many ways of contracting leprosy accidentally; but none of those that we have yet indicated have enlightened us regarding the Sabouraud-Micheel phenomenon.

Contact.—Up to the present we have seen that septic contact is often dangerous. It is always so when a lesion of the integument places it in relation with specific germs. Now rats that have been kept with leprosy near always bear marks of teeth on the skin. It is the bite which provides the port of entrance for the virus. The slightest noise frightens the rodents, which immediately crowd themselves into a heap in some obscure place of refuge. When rats happen to be leprous, the animal quickly infects many others of the number. An experiment has demonstrated to us the fact that a wound, when made by a sick rat, may be infected on the spot.

Rats in a cage, in which a leper had been enclosed in a jar with three young white rats, during the night he killed two of them and wounded the third. On the next day the latter was enclosed in a cage, some feet from our experimental rat. Two days later we succeeded in getting the leprosy rat to recover the company of three young rats, and he lived on good terms with these guests of his up to his death, which took place eight days after.

It is of the four rats by experiment only one had contracted the disease; this was the one that had been bitten and isolated.

Abortive Leprosy and Grave Leprosy.—All the experiments in which we have communicated our results have being referred have produced in our rats examples of benign leprosy only, that is to say, of the glandular leprosy recognisable only at the autopsy; but they have also given rise to the development of the tubercles and ulcers sometimes met with in captured rats. They were carried out with materials almost pure.

In order to obtain a rapid and monstrous development of the disease of leprosy it is necessary to inoculate with microbes of suppression, especially staphylococci, simultaneously with the specific germs. Two causes intervene to aid the multiplication of the virus; immediately, the increased leucocytic afflux which furnishes the disease with aliment; afterwards, the diminished resistance of the animal to which has become the prey of a secondary infection.

In determining the influence of superadded affections we did not limit ourselves to mere laboratory observation, but have used a subject of our own, of musculo-cutaneous and enroaching leprosy, we always found along with the specific germs the microbes of secondary infection, of which the rôle has just been explained. Thus we have, in the rat as in man, abortive forms of leprosy. These are met with in greater numbers than are the cases of leprosy which lend themselves to clinical diagnosis.

Thus when 5 per cent. of Parisian rats were affected with abortive leprosy for fourteen months, no rat could be designated as clinically leprous; while in America, the latter proportion falls below 0.01 per cent. (McCoy).

Those abortive forms of the disease should undergo spontaneous cure. We have observed two examples of which this were absolutely clear. Captured rats, in which puncture of the glands had enabled us to determine the presence of specific bacilli, have completely recovered, and the animals, when liberally fed, had notably fattened. At the autopsy we found it impossible to discover a single germ in the locality in which we had found them so numerous some months previously.

Evolution.—The process of evolution is an essentially chronic affection. It requires from four to six months to reach a stage in which the glandular form of leprosy can be recognised at the autopsy. Experimented animals become clinically leprous only after an interval of twelve to fourteen months has elapsed since the date of inoculation. And, in whatever way infected, rats do not die of leprosy; but of an intercurrent affection, either respiratory or septic.

Conclusions.—From the study of animal leprosy a number of conclusions may be drawn that can be applied to the corresponding disease which invades the human organism. The analysis of the facts hitherto collected during observation and experimentation has not merely failed to indicate any want of accord with our experimental determinations, but has, on the contrary, actually come to corroborate them in the most felicitous manner.

Thus, in summarising, we find ourselves authorised to say that:

1. The specific bacillus is one of fragile nature. It is readily inoculable on organisms sensitive to its influence.

2. Puncturing insects do not convey the disease.

3. Sarcoptes, demodex and flies may play an accessory rôle.

4. The germs are usually introduced through an erosion of the skin which is brought into contact with septic products.
CORRESPONDENCE.

SCOTLAND.

The War.

In Edinburgh the first two important happenings in the medical world which were brought about by the outbreak of war were organisation of the profession at home to meet with the difficulties caused by the mobilisation of many civil practitioners for service with the forces, and the establishment of an operation centre to the British General Hospital, which has its headquarters at Edinburgh. In the first of these fields, the Scottish Committee of the British Medical Association and the Universities and Colleges have a medical service Emergency Committee, with Dr. Norman Walker as Convener. It is understood that about 300 Scottish practitioners have been called up, and that more are liable to go at a moment's notice. The difficulty of securing that their practices be attended to in their absence has been met, the more so as locum tenentes are very scarce, and the rate of remuneration they expect tends to rise. To cope with this emergency, the Committee suggest: (1) that the fee offered to a locum tenens for practitioners' professional service should not exceed £5 5s. per week; (2) that retired practitioners should give their names to the Emergency Committee for registration and ultimate allocation to temporary vacant practices; (3) that School Medical Officers should be allowed to give part of their time to general work; (4) that the visiting staffs of hospitals and similar institutions should reduce the numbers of residents and clinical assistants and undertake a part of the work themselves; (5) that in large town-giving practices whose practices are not very extensive should "pair," so that alternately one may act as locum tenens in the country while the other does both practices in the town. The Committee point out that the needs of the civil population must be met, and that whoever relieves a colleague in the field is ipso facto also serving his country in time of need. Communications from practitioners offering or requiring assistance should be addressed to the Committee, Medical Emergency Committee, Royal College of Physicians, Edinburgh.

As in other towns, arrangements have been made whereby the dependents of soldiers at the front will receive medical attention without charge, and medical representatives have been appointed on the local committees which will distribute relief under the 'Prince of Wales' and other funds. Very many private houses, nursing homes, convalescent hospitals, and special
CORRESPONDENCE.

Quartermaster.

obtain Captains that D.

"It transferred the impossible the number naval mobilised D to the base divided to Langwill, in ing cases providing will Majesty's The

September 23, 1914.


Professor Greenfield, in a letter to the Scotsman a week or two ago drew attention to the necessity for providing for the after-care in hospitals of sick and wounded. He suggested that the central or base hospitals should be relieved of all (e) hospitals where only a certain amount of dressing and nursing were required, and (g) homes for lighter cases and convalescents. He suggests as suitable buildings for the above hydropathic hotels and boarding houses which cater mainly for summer visitors, or even factory and farm buildings, but not schools. It may be added that Professor Greenfield had experience of the conditions which prevailed in Paris in 1871, after the Commune.

In the face of an emergency medical service has been established since the war began; the central office is at the Royal Infirmary. The main points of the scheme are: Messages from patients of absent doctors to be delivered by local medical officers, and rota to doctors participating. Consultations are to be given at a central dispensary by rota among the doctors. Midwifery to be under the supervision of the maternity service of the Infirmary. The doctors who are away have assumed mandates for 90 per cent. of the insurance credits being paid to the Committee, leaving 10 per cent. for their households. Adjustments will be made on the return to normal conditions.

Red Cross Work.

The Scottish Branch of the Red Cross has been divided into four districts, under Lient.-Col. D. R. McEwan: Eastern, Major David Wallace, C.M.G.; Central Eastern, Colonel Gordon Thomson; North-Eastern, Col. J. Scott Riddell. There are also Committees in every branch of the Scottish Volunteer Force.

Letters to the Editor.

The Governors of Dundee Royal Infirmary recently offered 155 beds in the Infirmary to the Admiralty as a base hospital for wounded men. The wards have now been inspected by an Admiralty representative and gratefully accepted. The Infirmary contains all 400 beds, and the result of putting up 155 beds at the disposal of the Admiralty has been to reduce greatly the accommodation for ordinary cases. Urgent cases, however, are always admitted, as well as cases requiring surgical treatment to fit them for service in His Majesty's Forces. A request from the military authorities to put at their disposal as many beds as possible has also been made to the Governors.

Students Recruits.

The second contingent of recruits for the Army from Glasgow University left Glasgow on the 16th inst. for London, whence they were to proceed to Aldershot to join one of the battalions of the Cameron Highlanders which are being raised by Lochiel. The men, to the number of about 100, met at the University Union, and, preceded by a piper, marched to the station. The first contingent from this University, which left Glasgow last week for Inverness, is now at Aldershot.

Health Culture and the War.

Glasgow Health Culture Society has opened its winter session. The Committee of the Society had considered seriously the advisability of discontinuing the meetings of the Society but on hearing that the authorities upon consultation decided that they could do good work in the present crisis by pointing out how people could live cheaply and healthily. With this end in view the first part of the winter programme has been made up of lectures showing attractive ways of preparing inexpensive and nourishing foods, with cookery demonstrations, and dealing with the effect of the war on the living of the people, and other phases of the question. A pamphlet is also being prepared upon the subject.

 Roxburghshire Medical Service.

Roxburghshire medical practitioners have held a meeting, and decided that in the case of practitioners called away from their practices in order to afford assistance to the public authorities in the present emergency, neighbouring practitioners should give such assistance as may be possible to prevent their interests being prejudiced by their public-spirited action; that practitioners remaining at home should not permit the transfer of any patients to their panel lists from that of any practitioner called away on service; that the dependents of all non-commissioned officers and men called away from their employment in the service of the country should have medical attendance free of charge; and that the word "dependents! should include those actually dependent on the wages of those serving, but not necessarily other members of their families not so dependent.


The Scottish National Insurance Commissioners have issued regulations with reference to the men belonging to the Naval and Army Reserves and the Territorial Force, to have effect from August 1st. While these regulations seem to involve the insurance of any reserve, or any service, the position of members of the Naval Reserve and of the Territorial Force is different. No member of these bodies need become insured who was not immediately before the commencement of service insured. It is true, that, within such time as the Admiralty or Army Council may determine, he elects not to become insured during the period of his service.

The Effects of the War.

So far as the medical profession is concerned, the war is making its presence at home through private practices being abandoned, professorial chairs and other posts being temporarily vacated, and even hospital wards being closed, owing to the absence of the personnel of them in other parts. If it is strange to hear at this time of wards being temporarily closed in a large Glasgow hospital, no doubt they could be speedily reopened if the necessity for them were to arise.

LETTERS TO THE EDITOR.

We do not hold ourselves responsible for the opinions expressed by our Correspondents.

The Cruelty of Quackery.

To the Editor of The Medical Press and Circular.

Sir,—A great deal of ignorance still prevails even among medical men as to the amount of cruelty involved in the quack medicine trade. This ignorance
A WARNING AGAINST UNQUALIFIED ASSISTANTS.

To the Editor of The Medical Press and Circular.

Sir,—At a meeting of the Executive Committee of the General Medical Council held to-day, the President made a statement in regard to certain correspondence received by the Registrar respecting unqualified locum tenentes and kindred matters, and the steps that had been taken in regard thereto.

He read the following letter, which had been sent to the practitioners concerned, which the Committee approved and directed to be entered in the minutes:

Sir,—With reference to your letter of the 3rd, I am directed by the President of the General Medical Council to inform you that, in terms of the enclosed warning notice, any registered practitioner who enters his professional practice to an unqualified person or who permits medical attendance on such person's behalf, renders himself liable to be summoned before the Council, and after due inquiry, to be adjudged guilty of grave professional misconduct.

The circumstances of the present situation do not, in the President's opinion, afford any excuse for action which the Council has described as "fraudulent and dangerous to the public health."

Means are available whereby the services of registered practitioners can be availed of by those of those practitioners who may be called away from civil practice on military service; and it is the plain duty of the latter to make arrangements for the proper professional treatment of their ordinary patients during their absence.

"I am to add that copies of your letter, and of this reply, will be laid before the Council, should occasion arise, for a judicial inquiry into the matter."

I am, etc.,

Registrar.

I am, Sir, yours truly,
A. J. COCKCOUNTRY,
Acting Registrar, G.M.C.

September 15th, 1914.

FORCIBLE FEEDING.

To the Editor of The Medical Press and Circular.

Sir,—If Dr. Sers, instead of making baseless "inferences," would discuss the facts about forcible feeding and the repulsive actions of the prison officials for which our profession is being made responsible, and which I gave in my letters of August 26th and September 9th, this matter might be advanced.

So also if he would but read up the literature of the subject.

The facts now adduced that his only knowledge of the facts is what he has gathered from the brief abstracts published in newspapers under the severe boycott to which the Press during the last two years has subjected the whole question of national enforcement. He might have remembered that truth in politics as well as in science is only to be arrived at by reading original documents. Had he read Hansard as I suggested he should, he would not have repeated the absurdly false statement that I had endorsed. Mr. McKenna told the House of Commons that that Bill would do several things—
(1) It would put an end to forcible feeding.
(2) It would compel prisoners to serve their sentences.
(3) It would stop outrages.

It has done none of these things, and for the simple abortion was evidently the aim, whilst cases of uterine tumour or cancer of the ovaries were quite common. In the latter cases a large percentage of cases had gone to ruin under the use of universal eye cures warranted sure remedies for every ophthalmic ailment from conjunctivitis to cataract.

I may return to this question again; it might easily fill many letters.

I am, Sir, yours truly,
HENRY SEWELL.
The Old Rosery, Earlswood Common.
September 17th.

CORRESPONDENCE.

October 5th, 1914.

Registrar.

I am, Sir, yours truly.
A. J. COCKCOUNTRY,
Acting Registrar, G.M.C.

September 15th, 1914.
reason that in its provisions it violated all the principles of British law and justice. Had it succeeded, then I could understand Dr. Sers bringing it forward, for at least the reputation of our unfortunate profession would have been cleansed (for the future) from the foul stain of torture now upon it.

I earnestly wish that alter Dr. Sers has tried to meet the facts I quoted showing that forcible feeding as practised in our prisons is not a be asserted, either medical or legal, he would cease to approve of treating people who ask for national enfranchisement in the same way as his anti-suffragist prototype that. He knows that patients who only want to be let alone—namely, by first goading them into committing assaults and then by brutally torturing them.

Outrages are the inevitable symptom of the disease of non-enfranchisement, which is slavery. It is our duty to prevent such disease, and, further, history shows that when outrage has been bred by bad treatment, this disease of the community disappears directly the selfish and arrogant, who, like the Pharaoh, think they alone are fit to have the vote, recognise that liberty and justice must be conceded to their fellow sufferers.

Burton said 250 years ago: "He who cures a disease is a benefactor, but he who prevents a disease is the wisest physician."

But whether I succeed in getting Dr. Sers to agree that prevention is better than trying to cure by brutality does not matter so much as that he should recognise that there is a misapprehension of honourable profession to clear its reputation from the accusation that it is the instrument of a torture executed under the now cynically abandoned excuse that it is medical treatment. The Emperor treats patients who cannot justify his position by rebutting facts, then let him join us in our war against inhumanity.

I am, Sir, yours truly,
VICTOR HORSLEY.

OBITUARY.

SIR HENRY HOWSE.

We regret to announce the death of Sir Henry Greenway Howse, M.S., D.Sc., late President of the Royal College of Surgeons of England. The deceased, who was the second son of Mr. Edward Howse, was born at Lyncombe Hall, near Bath, in 1841. He received his education at University College School and Guy's Hospital. In 1868 he became F.R.C.S., and two years later was appointed Assistant Surgeon to the hospital, being elected full Surgeon in 1874. He was Lecturer in Anatomy and Surgery in the Medical School, and was first elected on the Council of the Royal College of Surgeons in 1882. He was in 1893 the Shaw Lecturer at the College in 1896, and Hunciterian Orator in 1903. Sir Henry was elected to the honourable position of President in 1901, and he held office for three years. He was also a member of the Senate of the University of London, Surgeon to the National Trust Society, and Consulting Surgeon to the Eveline Hospital. He was the author of numerous papers and articles on excision of the knee, tracheotomy in childhood, and other surgical work. The honour of knighthood was conferred upon him in 1902.

REVIEWS OF BOOKS.

PSYCHO-ANALYSIS. (a)

Whatever opinion may ultimately be formed as to the scientific and practical value of the teachings of Freud, it must be admitted that he is an original and highly suggestive thinker. It may be that he casts on the omen semester of all the doors of character, and that his clinical analyses as frequently reveal his own mentality than the mentality of his patients. But he who would succeed in proving all this would, nevertheless, have gone but a little way to discredit the value of Freud's teachings.

We take it that the most important element in his work is his insistence on the importance of the sub-conscious. He is, of course, not the first to insist on this, but he has given us a more complete idea of what we may call the machinery of the sub-conscious than any previous psychologist. We have, indeed, advanced a little further on the ground opened by Locke and others as to the essence of the soul being consciousness. "Whether the soul always thinks?" has for us a very different meaning from what it had for Locke. We know now that all our conscious activities must be considered as sub-conscious. Our motives are formed in the sub-conscious, and the process of their formation, prior to their emergence in consciousness, is one of highly complicated processes. Freud, with his probes into these obscure matters must make many blunders, but employ many mistaken hypotheses, before he reaches truth. We should honour the searcher for his courage and for whatever truth he brings from the well rather than blame him for the mud which his bucket necessarily hits.

We welcome warmly, therefore, any serious and honest attempt to make Freud's views more widely known. We care not how they are published, so long as he can hope to separate the grain from the chaff. Dr. Ernest Jones is a whole-hearted disciple, but an admirable interpreter. In this volume he has collected a number of papers on various subjects which he had published within the past few years. Some of them deal with purely psychological questions, others are more directly clinical. All deserve careful study. He writes clearly on the most complex problems. Like other Freudians, he is least convincing in his records of clinical analysis. In not one of those he quotes does he succeed, to our thinking, in establishing even a tithe of what he claims. Anything may be the subject of argument, else, and the most innocent speculations are given a phallic basis. Space forbids us to follow Dr. Jones in detail, but we have a high opinion of the value of his work.

A NEW VIEW OF NATURAL SELECTION. (a)

Dr. Mottram has written a suggestive little book. He has put forward an interesting hypothesis, but he frankly admits that he has not attempted to prove it. He has, however, enumerated many curious occurrences in nature which are explained by his hypothesis, and perhaps more readily by it than by any other. He himself is convinced, and he is, however, agreeing in the main with Darwin's doctrine of the origin of species. Dr. Mottram holds that in Darwin's theory of sexual selection there is a certain weakness. He endeavours to show how, in another and more ingenious way, secondary factors are a necessary part of natural selection, and that sexual choice is unnecessary as a factor in evolution.

Dr. Mottram suggests that the biological unit, in the highest grades, is not the individual, but the pair or family. Of the pair, the female is, of course, the more important. The male's duty to the race is momentary, the female's continuous. Of the family, the young are more valued than the males, and, therefore, an advantage to the female, and through her to the race, when the male is so conspicuous as to attract enemies to himself, and thereby detract them from her. Similarly, attraction of enemies may be the price paid for the advantage to the animal. Dr. Mottram shows by many ingenious examples that it is not only by his conspicuous appearance and voice, for example, that the male attracts attention and is more exposed to danger than his mate. The female in social positions in copulation, for instance, exposes the male to attack much more than the female. Dr. Mottram shows, too, that conspicuous colouring of the male most frequently occurs in birds that are more brightly painted. It certainly may be useful, in places, in night.

NEW BOOKS AND NEW EDITIONS.

The following have been received for review since the publication of our last monthly list—


CHEESE, W., AND A. (London).

CHESE, W., AND A. (London).

CHESE, W., AND A. (London).

CHESE, W., AND A. (London).

CHESE, W., AND A. (London).

CHESE, W., AND A. (London).

CHESE, W., AND A. (London).

Medical News in Brief.

The Huxley Memorial Lecture.

We are asked by Dr. William Hunter, Dean of the Charing Cross Hospital, to announce that the Huxley Memorial Lecture on "Recent Advances in Science and their Bearing on Medicine and Surgery" by Sir Ronald Ross, K.C.B., F.R.S., originally fixed for Thursday, October 1st, has been postponed to Monday, November 2nd, when it will be delivered in the Out-patients' Hall of the Hospital at 3 p.m. The lecture will be open to all members of the profession.

Royal Medical Benevolent Fund.

At the last meeting of the Committee 18 cases were considered and grants amounting to £130 voted to 8 of the applicants. The following is a summary of cases relieved:

Widow, aged 36 years, of M.R.C.S.Eng. who practised at Laindon. Left totally unprovided for with one child aged 21 months. Husband had been ill for some time before death. Friends only able to help slightly. Voted £10 in two instalments and referred to the Guild—Daughter, aged 31 years, of M.R.C.S.Eng. who practised at Poplar and Boundary. Has been in receipt of an income for a short period, but her health has completely broken down. Voted £2, with leave to apply again in October, and referred to the Guild.—M.D. of Edin., aged 58. Health very bad and unable to practice. Has endeavoured to run a nursing home, but has not been successful owing to the illness of his wife and self. Three children unable to help. Voted £12 in 12 instalments through the Bexhill Hospital and Secretarial work of M.B.Aberd., who practised at Lye. Has endeavoured to maintain herself by letting rooms, but has been unsuccessful lately. Two children, 14 and 16, both at school. Relieved seven times, £75. Voted £12 in 12 instalments.—Daughter, aged 61 years, of M.R.C.S.Eng. who practised at Ford, near Chippingham. Health will not allow her to work. Only income 5s. per week from friends, which pays for rent. Relieved seven times, £87. Voted £12 in 12 instalments.—Daughter, aged 68, of M.R.C.S.Eng. who practised at Dorking. Health very bad, and has recently been operated on in hospital. Only income from another charity 5s. per week. Relieved twice, £12. Voted £12 in 2 instalments.—Daughter, aged 64, of M.R.C.S.Eng. who practised at Liverpool. Only income about £13 per annum. Friends help a little. Quite a confirmed invalid, but has been able to keep up household arrangements. Relieved once, £12. Voted £12 in 12 instalments.—Widow, aged 57 years, of L.R.C.P. and S. Edin. who practised at Walsall. Earns a little by taking in lodgers. Brother had used to help her but for last three months unable to help. Daughter, aged 45 years, of L.R.C.P. and S. Edin. who practised at Lymington. Health very bad and unable to work: lives with the father. Joint income less than £20 per annum. Relieved once, £12. Voted £2 and deferred for further investigation.—Widow, aged 57, of L.R.C.P., and S. Glasg., who practised in Ireland and London. Endeavors to earn a living by taking in boarders, but has not been successful. Relieved three times, £10. Voted £10 in two instalments.—Daughter, aged 58, of M.R.C.S.Eng. who practised in London. Has no income and too ill to work. Lives with a delicate child who has a very small pension. Relieved nine times, £90. Voted £12 in 12 instalments.—Widow, aged 64, of M.R.C.S.Eng., who practised at Ash. Health very indifferent. Five children: none able to help. Rent paid by brother. Relieved once. £12. Voted £12 in 12 instalments.

Contributions may be sent to the Hon. Treasurer, Dr. Samuel West, 11 Chandos Street, Cavendish Square, London, W.
NOTICES TO CORRESPONDENTS.

The Gresham Lectures in Physic.

Dr. F. M. Sandwith, Gresham Professor of Physic, will give a course of Gresham Lectures on heredity, at Gresham College, E.C., on October 6th, 7th, 8th, and 9th, at 6 p.m. on each day.

A Farm Colony for Consumptives in Renfrewshire.

The plans prepared by the Joint Sanatorium Board of the County of Renfrew for the erection of the County Sanatorium and Farm Colony at West Michelle-ton and Peacockstone Lochwinnoch, have been approved by the Paisley Town Council. The estimated cost will be £3,581.

Middlesex Hospital Medical School.

The opening of the winter session, 1914-15, will take place as usual on Thursday, October 1st, at 3 p.m., when an address will be given by Sir John Bland-Sutton and the prizes for the past year will be distributed by Sir John Bland-Sutton in the museum which forms part of the new Institute of Pathology.

Owing to the war no formal invita-
tions will be issued, but all who are interested in the Hospital and Medical School are cordially invited to be present.

The annual dinner has been postponed.

Army Medical Service—Royal Army Medical Corps.


Royal Colleges of Physicians and Surgeons, England.


The Royal Institute of Public Health.

The Royal Institute of Public Health is authorised by the War Office to enrol recruits for the Royal Army Medical Corps, who should be between the ages of 18 and 35. In the case of desirable men, the minimum height may be 5 ft. 1 in., and chest measurement 36 in. Vision at least 6/64 with each eye, or 6/6 with one eye and 6/60 with the other, in each case without glasses.

Men possessing special experience, such as is evinced by certificates from medical practitioners (pharmaceutical), or advanced first aid certificates, are especially invited to offer themselves. Enlistment for three years or for the war only. Applications, stating age, qualifications, etc., to be addressed to the Secretary, 37 Russell Square, London.

The Health Committee Week.

That highly energetic organisation the Health Committee has arranged their annual observance to take place in November next, both in the United Kingdom and in other parts of the Empire. Over 100 towns and districts had promised their support, or nearly twice the number reached in any previous year. On account of the war, however, has compelled the Committee to postpone these arrangements for the time. It has been proposed to redirect the organisation so as to help in the relief of those affected by the pestilence, but the matter is still in abeyance. The Chairman of the General Committee is Sir T. Vansittart Bowater, Lord Mayor of London, the Executive Chairman Dr. A. Bostock Hill, and the Secretary Mr. E. White Wallis. All communications should be addressed to the last named at 90 Buckingham Palace Road, London, S.W.

MEDICAL WAR ITEMS.

It is reported that Russian patients under the care of German specialists in German nursing homes were ruthlessly expelled when war was declared, and in several cases this harsh treatment had fatal results. Russian doctors at a conference in Moscow this week passed a resolution protesting against the medical world against the brutality of their German brethren.

It is announced that owing to increasing pressure of work, the headquarters of the British Red Cross Society are now transferred from Devonshire House to the spacious accommodation at 83, Pall Mall, which has been placed at the Society's disposal by the generosity of the Committee of the Royal Automobile Club, the owners of the building. The offices will be found next door to the Automobile Club.

The City of London Lying-in Hospital is doing its share towards helping the Belgian refugees by taking in maternity cases.

At University College Hospital all the resident staff and 24 nurses have proceeded on active service, their places being taken by day élèves of the staff. At the London Hospital 13 of the resident staff, as well as many from the other Medical School, have left or are leaving for the front.

Provision has been made at the Alexandra Palace in North London for accommodation for female refugees, women, and children. On Monday last the number was close on 1,000. Dr. Herbert C. Cuff, of the Metropolitan Asylums Board, is the Chief Medical Superintendent, and there is a large staff of matrons, nurses, and other medical and hospital attendants necessary for the carrying out of the ordinary routine of a home and hospital. The great concert hall has been converted into a mess-room.

NOTICES TO CORRESPONDENTS, &c.

For Correspondents requiring a reply in this column are particularly requested to make use of a Distinctive Signature or Envelope, in order to avoid the possibility of our recognizing the communication as coming from a correspondent unacquainted with us.

SUBSCRIPTIONS.

Advertisements may commence at any date, but the two volumes each year begin on January 1st and July 1st respectively. Term, £6 6s. 8d.; half year at £3 3s. 4d.; subscriptions to £10, "Reader," " Subscriber," " Old Subscriber," etc. Much con-

ADVERTISEMENTS.

For One insertion—Whole Page, £2 10s.; Half Page, £1 5s.; One-sixth, 12s. 6d.

The following reductions are made for a series—Whole Page, 10s. 6d. at £2 12s. 6d. insertions at £2, and pro rata for smaller spaces.

Small advertisements of Practice, Assistances, Vacancies, Books, etc.—Seven lines or under (70 words), 4s. 6d. per insertion; 6d. per line beyond.

M.B. Berlin. Recent experiments seem to show that the average food requirement for combustion alone for infants during the first four days of life is 17 calories per hour per kilogram of body weight.

Sanitarium (New Brighton).—Slowly but surely the growth of this Sanatarium, which is now in its fourth year, and the successful results which have followed its opening, are beginning to attract public attention.

The Royal Institute of Public Health appointed a committee to consider the methods employed in the bacteriological examination of water in temperate climates, and to draw up a scheme.
of uniform procedure in such examination. The committee has now presented its report, copies of which may be obtained on application to
J. E. S. (Liverpool).—The Surrey Hills Hydro, at Catterham, would probably suit the purposes as well as the case of your patient’s "non-specific" condition. The establishment includes the personnel (see superintendence of a well-qualified physician, inclusive terms) of the hot springs, warm baths, and electric, Nautilus, baths, etc., form part of the existing equipment. Alcohol, however, is not allowed during treatment.

BUNKER—On September 16th, at Bournemouth, the wife of Edward How White, M.B., Oxon., of a son.

CAREY.—On September 16th, at Kingston, Somnith, S. Deron, to Dr. and Mrs. Bertram Cohen—a daughter.


HARLEY.—On September 16th, at Killytra, Talgaun, the wife of John Archibald Harley, -the Union, to T. H. Staff, Gold Coast, of a daughter.

HUGHES.—On September 16th, at Queen Anne Street, Caren-dish Square, the wife of E. C. Hughes, M.A., M.C., of a son.

LARWOOD.—On September 16th, at 33 Buckland Crescent, Hampstead, N.W., the wife of Dr. H. L. Leight-Cannay, of a daughter.

PEARSE.—On September 16th, at Endfield House, Barry Old Road, Manchester, the wife of Dr. P. Leslie Pearce, of a daughter.

TAYLOR.—On September 16th, at 12, Station Road, Dripton, W., the wife of C. H. S. Taylor, M.D., of a daughter.

WATERS.—On September 16th, at 10, Park Road, Westbourne, the wife of Edward How White, M.B., Oxon., of a son.

Marriages.


BOWKETT—GOODWIN.—On September 15th, at St. Anselm’s, Hatch End, Leonard Howard Bowkett, M.R.C.S., Esq., son of the late Dr. John Bowkett, to Miss Jessie, elder daughter of the late Walter Ferguson Goodwin and Mrs. Goodwin, Hatch End, Middlesex.—On September 16th, at St. Andrews’ Church, West Kensington, London, by special licence, Harold Martin McCullough, B.M., on leave, third son of the late Jeremiah McCullough, to Miss Jeanie, younger daughter of Sir William Brudenell, Bart., K.C.S.I., of 18 Gloucester Road, West Kensington.

CAMPBELL.—On September 15th, at St. Mary the Virgin, Putney, Roger Bellis Edwards, M.B., B.S., son of Dr. and Mrs. Edwards, of Tynygroes, Llancarvan, North Wales, to Mary, younger daughter of the late Henry R. G. Maughan and Mrs. Maughan, of 26 Putney Hill.


DIXON.—On September 15th, at St. Paul’s Church, Wimborne Park, Albert Edward Quince, M.B., F.R.C.S., now serving as Second Lieutenant 2nd East Yorkshire Regiment, only son of Rev. E. and Mrs. Quince, of Portland, Dorset, to Amy Burnaby, daughter of the late Henry Burnaby Davie, of Dulwich, and Mrs. Davies, of Crayford, Surrey.

WILLIAMS.—On September 15th, at the St. Saviour’s Church, St. George’s Square, S.W., Dr. Reginald Worth, fourth son of the late Harry Worth, of 173, High Street, Corwall, to Marion Catherine, youngest child of the late Godfrey Knight-Robinson, Esq., 5th Royal Irish Lancers, and of Mrs. Knight-Robinson, of Woking.

Deaths.

BARKER.—On September 17th, at St. Olave’s, New Burrow, William Barker, M.B., of 13, Eishen Street, Southwark, S.E.

BEER.—On September 17th, at St. Alphage, New Burrow, William Beer, M.B., aged 53.

BOWLES.—On September 17th, at Oakville, Ontario, after operation for appendicitis, Harry Dingle, M.R.C.S., L.R.C.P., of 57th Division, Toronto (Lincs) and of the late J. W. Dingle, of North Darley, near Callington, Cornwall.

FLETCHER.—On September 12th, at 12 Park Road, Wimble- 
don, William Fenton Fisher, L.R.C.P., in his 82nd year.


HOLMES.—On September 15th, at 229 Red Lion Street, Peterborough, Canada, Leostock Holland Reid, M.R.C.S., L.R.C.P., formerly of Southampton.

SIMPSON.—On September 26th, at Clifton Villas, Richmond Hill, Clifton, Bristol, Charles Steele, M.D., F.R.C.S., the devoted and beloved husband of Frances C. Steele, aged 76.

HULME DISPENSARY.

DALE ROAD, STRETFORD ROAD, MANCHESTER.

WANTED, a house SURGEON, daily registered and fully qualified, salary £250 per annum. Annual increase £10 to £200, with apartments, coal and gas. Applications, with testimonials, at once to Honorary Medical Secretary.
The Medical Press and Circular

"SALUS POPULI SUPREMA LEX"


Notes and Comments.

Camp Diseases in the German Army.

The question of enteric fever and its prevention by anti-typhoid inoculation is discussed in the leading columns of our present issue. In the interval between the writing and the publication of that article, unofficial news was sent by the special correspondent of Lloyd's News of the outbreak of infectious disease at the seat of war in France. The exact message ran:—"Typhus has broken out among the Germans situated in the camps around Brussels and in the valley of the Dendre, near Termonde. Typhus are forming fearful havoc, and already 700 Germans are reported to have succumbed." A report of this kind seems likely on the face of it to have some good foundation. It is not unlikely, however, that the disease in question is typhoid and not typhus, as a non-medical observer would readily confuse the German equivalent of enteric fever with typhus. In view of the vast numbers of men engaged in this titanic conflict and the fact that armies pass and repass over the same ground, the appearance of enteric fever is an event of deadly significance to both friend and foe.

The Changes wrought by the war of War. The partial extinction of the street lights in London has metamorphosed the city after dark, and both vehicles and wayfarers find themselves groping along somewhat after the fashion of men in a thick fog. The command of various public and private buildings for barracks and hospital purposes has furnished unfamiliar it not always picturesque scenes. At Epsom a large corps of former public school and university men has been formed, and recruits have been poured thither in thousands—representing the very flower of British youth. A large camp is being formed for them in a secluded park which was being converted into a golf links by a London club. The fine old mansion is to be used as officers' quarters. A more curious transformation is that of the famous grandstand and race buildings upon the Epsom Course hard by. A Red Cross flag floats over the stand, which has been converted into a war hospital for 75 wounded soldiers. Those soldiers, who are fortunate enough to be quartered here will have the benefit of the wonderfully bracing air for which the Downs are known far and wide.

Changes not less incongruous are not infrequently associated with times of peace. A striking instance is at hand in the house of the late Sir Jonathan Hutchinson in Cavendish Square, which is now converted into the head office of a firm of light and leading in the racing world. It would be difficult to imagine a greater change of occupancy for the rooms in one of the most fashionable of our pastime clubs.

Medical Men and War.

The medical profession has responded to the call of the country in a manner worthy of its traditions. Many medical men have joined the Army Medical Service, and not a few are at the front. In order to serve their country in this way, some have given up professional posts or have left their practices at considerable personal sacrifice. A strong movement has also been started in the profession with a view of carrying on the practices of those away at the war, so that they should receive them intact at the conclusion of hostilities. Another commendable scheme provides free medical service to the wives of the soldiers and sailors away on active service. Those medical men unable by reasons of age limit or from the nature of their work to help in the above-mentioned ways, have subscribed liberally to the various excellent funds organised for the relief of distress or for augmenting the comforts of our fighting men. One medical man, Dr. E. Hamilton Kenny of Pendleton, has distinguished himself in both ways, for before going to the front he sent to the Daily Sketch Cigarette Fund a cheque for £47, representing subscriptions collected from friends. The testimony of Mr. Thomas Atkins as to the comfort of a little tobacco in the trenches is emphatic. Poor fellow, he may well be glad of a change from the noisome vapours of war to the soothing aromatic fumes of nicotine.

Women Practitioners and the War.

In few departments of medical life is the shortage of medical men so keenly felt as among the resident staffs of hospitals. So great has been the number of resident house-surgeons, and house-physicians and other officers accepted for active service that in the case of several of the larger metropolitan hospitals the services of the honorary visiting staff have been requisitioned in order to carry on the ordinary routine work of
LEADING ARTICLES. 

ANTI-TYPHOID INOCULATION.

The medical care of sick and wounded British troops in the present war already shows an excellence of standard that has never been attained on any previous occasion. Since the Boer War at the opening of the century, vast strides have been made in Army medical administration, which is now being taxed to the utmost of its resources by the strain of one of the greatest wars ever known to mankind. The campaign is still in its early days: to be more accurate, it is now the thirty-seventh day of the war, and camp fevers are not likely to appear until a later stage. The interesting question now raised—namely, the possibility of preventing such epidemics—has doubtless been carefully considered from every point of view by the authorities of the Army Medical Department. One naturally thinks first of anti-typhoid inoculation, the preventive value of which is now generally admitted. A strong case, indeed, can be made out for compulsory inoculation, if only the Medical Service could find means for carrying it out amid the enormous pressure already upon their shoulders. The public press has been fully informed as to the desirability of such a step by authoritative letters from leaders of the medical profession. At the same time, other medical men have published statements that are misleading. One such correspondent in the Dundee Courier points out that in the South African War there were 57,684 cases of enteric fever amongst British troops, whereas in the Russo-Japanese War of 1904-5 there were only 200 cases. This fact he attributes to the superiority of the Japanese in sanitary equipment, and the soundness of the contention may be to a certain extent, although not wholly, admitted. In a war like that now raging on the Continent, where battles involving millions of men are waged for many days in succession over a comparatively limited field, it is obviously impossible to observe any sort of sanitation. The ground is fouled with excreta and dead bodies of men and horses, while the wells and streams and other sources of water supply are no less contaminated. Under such circumstances the protection afforded by anti-typhoid inoculation would be simply invaluable. The concluding sentence of the letter displays a colossal ignorance of the actual facts of the case. "Should our soldiers," he writes, "be asked to face the enemy on the plains of Europe and to undergo all the accompanying hardships of war, with the additional burden of fever and debility induced by inoculation?" As a rule the reaction set up by the inoculation is so slight that it is not felt by the patient, and only in rare instances is it severe enough to suspend him from duty for a few hours. As to "prolonged fever and debility" consequent upon the protective inoculation, it exists only in the perverted imagination of the faddist in whose mind all scientific inoculations are alike accursed. Another letter from a medical man, Dr. Christopher Childs, of Loos, in the Times of September 23rd, takes a broad and well informed view of the situation. He brackets the two chief preventive factors, together in the shape of preventive inoculation and purity of water supply, and points out that camp epidemics develop, as a rule, some time after an army has taken the field. He draws attention to a most important matter—namely, the possibility of similar epidemics in our Territorial camps; and of the necessity of adopting preventive measures therein against the infection likely to arise from imperfect camp sanitation, from contaminated soil or food, or tent and tent fittings, or
through direct convection from men to men and from tent to tent. The immunity from enteric fever hitherto enjoyed by Territorial camps be attributes to the fact that they have nowhere been pitched for more than a few weeks. He quotes the experience of the Spanish-American War of 1898, when some 250,000 Volunteers were assembled, for the most part in carefully selected camps in the United States. Within eight weeks enteric fever had broken out in nearly all the regiments. In all there were 20,738 cases amongst 107,973 of the Volunteers, of whom 1,580 died in the course of five months. A Commission of Enquiry at the outset were under the impression that the disease had been conveyed and spread by contaminated water. A careful and exhaustive examination of facts, however, convinced them that water was not the most important factor in the spread of the fever; (2) that only about half the cases of typhoid were recognised, the others ("abor- tive cases") being regarded and returned as cases of "diarrhoea," "simple continued fever," etc.; (3) that the epidemics were due in large measure to the pollution and infection of the soil of the camps; (4) that personal contact was a very important factor in the spread of the disease. From an elaborate study of over 1,000 cases the Commissioners felt convinced that nearly two-thirds of the cases were due to infection conveyed from tent to tent, of which more than half were due to infection from man to man. Whether the findings of the American Commission be fully accepted or otherwise, the investigation is of the highest significance with regard to our own Territorial camps, and Dr. Childs has rendered a public service by calling attention to the matter. While the conditions of active service are conclusive neither to accurate observation nor to scientific prevention the widely differing conditions of environment in home camps bring both those desirerata within comparatively easy reach. In short, the Army Medical Department has here an unrivalled opportunity of testing on a large scale the value of protective inoculations, which might be in the first place administered only in certain campaigns and extended later to include the remainder, if considered desirable. The sanitary conditions of the Territorial camps, it may be assumed, will be far behind those of the fixed camps, such as those of the Curragh and Aldershot, and it is in the temporary camps that the problems will arise.

INSANITY IN IRELAND.

The last annual report of the Inspectors of Lunatics in Ireland gives us more ground for hope than most of its predecessors for many years past. The marked increase of insanity, or, at any rate, of insane persons under control, in Ireland in the life-time of the present generation has been one of the most disquieting features in the national life of that country. In 1880 the proportion of insane persons to the total population was as 250 to 100,000. The proportion rapidly increased. In 1887 it was over 300, in 1895 over 400, in 1902 it was 500, and last year it reached 571. In no year of the thirty-four was there either a decrease in the number of insane or a decrease in the proportion of insane to the total population. Of late years, however, the increment has been much less than formerly, and we may hope soon to reach a stage when the number of insane may become stationary if not retrogressive. This hope, based primarily on a study of the figures recorded for the past thirty-four years, gains strong support from the careful analysis of the age-distribution of insanity, which the inspectors have undertaken in this year's report. They have found that the tendency to mental abnormality is becoming less among the young, and that the number of insane in the first twenty-five years of adult life forms a steadily diminishing percentage of the insane. On the other hand, the number of insane in the later twenty years of adult life shows a marked relative increase, and the number of senile insane shows a comparative growth above the average. All this suggests the influence of the former large population, and gives us hope that as the preponderance of aged people in the general population diminishes, so the aged insane may also grow less. The proportion of aged people is very much greater than is generally supposed. In 1861 the proportion of those over 65 to the total population was only 4.7 per cent., whereas at present it is 10 per cent. From this it is concluded that a "maximum of senility" has been reached. The inspectors do not in their present report discuss the question of the causes of insanity. In the annual report of the Down Asylum, which has since appeared, Dr. Nolan furnishes an interesting note on this subject. He remarks on the influence exerted by passing events on the manner in which insanity manifests itself. During the past year insanity has been deeply tinged by the stirring political feeling in the district of which Dr. Nolan writes. Instead of unknown "noises," and "vague fears," and "unknown enemies," patients now listen to the commands of opposing factions in political and sectarian strife, they suffer from fear of imminent civil war, and the enemies are those of the opposing faction. Dr. Nolan thinks that the political ferment has not only in many cases shaped the form of the attack, but that in some it has been the cause of the break-down.

CURRENT TOPICS.

Atrocities.

In the days when less news than usual has filtered through the Suppress Bureau the generality of the daily papers turn their readers' thoughts to survivors' stories and the inevitable atrocities of the enemy. The best that can be said for these tales is that they are highly partisan—and we should not like to say the worst. In the first place, evidence is the most untrustworthy thing in the world. We,
CURRENT TOPICS.

The Desiccation Treatment of Certain New Growths.

During the past few years a good deal has been heard of the destruction of morbid tissue by means of the high tension electric current. Fulguration may be regarded as high-frequency cauterisation, while dairthermy consists essentially of the penetration of the tissues by heat. Dr. William L. Clark, of Philadelphia (4) has been experimenting for some time with the action of high tension electric currents upon the body tissues. He has succeeded in producing a thermic action of just sufficient intensity to devitalise tissue by dehydration. The desiccation current is produced by a powerful static machine, and the size and depth of the area treated by one application depends upon the strength and upon whether the operator, whether monopolar or bipolar, the frequency of the oscillations, the distance of the electrode from the body, the time of exposure, and the density of the tissues. Desiccation is stated to be applicable for the cure of moles, warts, keloid growths, lentigo, chloasma, X-ray and senile keratosis, too marks, etc., as well as for pre- or perineal piles of the bladder, urethra, rectum, larynx, throat and pharynx, nose and eye. In experienced hands there is no need for extensive destruction of tissue as the operator has complete control, even to the smallest discernible point. Localised malignant growths of the skin and mucous membrane are benefited by desiccation when taken in hand early, but the method is not curative in advanced cases of cancer. The cosmetic results of the treatment are said to be excellent, and there are no disadvantages except the expense of the electric plant.

Junketing and National Stress.

There is, we think, a general and a healthy feeling that in this time of national stress, there should be but little unnecessary festivity and junketing. We do not suggest that people should go about in sombre attire, forewarn of all friendly, social intercourse, and give the general impression that all is lost. Far from it. We believe it to be the duty of all worthy citizens to go about their business cheerfully and take their losses—personal and financial—with courage. But we believe that their cheerfulness will be increased rather than diminished if some of the funds which, in ordinary times of prosperity, are devoted to hospitality, are devoted to the relief of those whose living is seriously interfered with by the war. We are glad to see that an example in this respect has been set by one of the small medical dining clubs in Dubon. There are, in that city as in many other centres, a number of small private dining clubs, the members of which dine in each other’s houses in rotation at the regular intervals of the club of which we speak, “The Phagocytes,” consisting of ten members, has decided to give up its dinners for the coming winter, and has forwarded to the National Relief Fund a cheque for fifty pounds. We hope that other clubs will follow this excellent example. Their good-fellowship will not suffer and they will keep want out of many homes.

Safe and Sane.

It is a great thing to be easily pleased, especially if the object of the attempt is oneself. The United States of America, whose social condition has been tersely described as “a barbarism lit by electricity,” is apparently in this happy position. The subject matter for its autogenous panegyric is its national festival—the Fourth of July. On this day of freedom and fireworks, liberty and lock-jaw, the American hoakdepends upon the right to kill, main and destroy his fellow-man for the sacred name of freedom. In 1908, his casualty list was 5,623 killed and injured, and in 1909 the returns included 130 cases of tetanus and 215 deaths. Even the true-blooded American citizen thought this was too much and set about putting his yearly holocaust on a sounder actuarial basis. And this year the Journal of the American Medical Association congratulates itself on the results. Apparently there are only 1,506 casualties this year, 40 deaths and three cases of tetanus—a mere trifle. The Fourth of July is supposed to celebrate the true origin of personal liberty to the happy dwellers under the free sky, and upon this liberty, her toll. Forty deaths is nothing compared with the right of a fool with a six-shooter to do as he pleases, and only an efficient and old-world race would carp and cavil at so small a matter. Still, we on this side have other uses for our men at present. Perhaps the Fourth has a really beneficial influence. People whose only pleasure is noise and clean-up are better off the earth. Still, at first sight, the figures do not seem to call for any great quantity of self-praise. It may be that we have a different outlook or we may have been tainted with the grandmootherly views of Governments whose tendency is more and more towards extending the responsibility of the State. Still, steaming hecatombs of slaughtered children seem a poor way of celebrating American freedom.

The Treatment of the Sick and Wounded.

A statement has recently been issued by the Press Bureau explaining the manner in which the sick and wounded of the Expeditionary Force are being dealt with after their arrival in this country. Every hospital ship proceeds to Southampton, where there are in readiness twelve specially constructed ambulance trains waiting to be despatched to various
CENTRES. The exact mode of distribution is in the hands of a Surgeon-General, who is apprised by bi-weekly telegrams from all the larger military and Territorial Force General Hospitals as to the number of beds vacant in each. At the railway stations near the principal hospitals special means of motor transit is available, so that the sick or wounded soldier can be taken in comfort to the bed awaiting him. So far, it is stated that at present the opportunity of utilising private hospitals to any great extent has not arisen, as there are several thousand beds still vacant in the military and Territorial Force hospitals. The needs of the convalescent soldier are being well looked after by a Central Registry of Convalescent Homes, which has been formed by a joint committee of the British Red Cross Society and the Soldiers' and Sailors' Help Society. The general public are having ample opportunity to express their sense of gratitude to and admiration of the sick and wounded by presenting to the civil hospitals receiving them gifts of clothing, literature, tobacco, and other comforts. When their sick furlough has expired the men are required to rejoin the depots of their regiment for retraining until they are able to rejoin their units, either in this country or abroad. Thus it will be seen that all is being done to mitigate the sufferings of those who return hors de combat from the arena of war.

Coca Leaves in Warfare.

Among the various suggestions put forward from time to time by well-meaning individuals for benefiting the physique of troops upon active service was the startling one made the other day by a Times correspondent that coca leaves should be served out to our men in the field. The anaesthetic effect of cocaine upon the mucous membranes is well known to all medical men, but the medically untrained mind cannot appreciate the consequences of a prolonged use of the stimulant. Certain of the South American natives are accustomed to chewing the coca leaves for the double purpose of staving off the feelings of hunger and of obtaining the sense of well-being produced by the stimulating effect of the drug upon the respiratory system. That cocaine, even in small amounts, possesses the power of removing fatigue and so spurring the individual on to perform some great physical feat is not denied. The question is rather, knowing the risk of the formation of the deadly and demoralising cocaine habit, whether the use of such means are justified. After all, the best stimulant the soldier can have is hope, while a firm confidence in his leaders combined with a plentiful supply of good food and pure water may, in the long run, be safely backed against any artificial methods for producing valour. The suggestion regarding the use of coca leaves may, therefore, be wisely ignored by those who have the British soldier's welfare at heart.

PERSONAL.

T.M. THE KING AND QUEEN visited the Connaught Hospital, Aldershot, on Sunday last, where they were received by Sir Thomas Galloway, Colonel Thurston, R.A.M.C., and Miss Robertson, Matron of the Hospital.

COL. G. F. A. HARRIS, C.S.I., M.D., F.R.C.P., has been appointed an Honorary Surgeon to the King, vice Surgeon-General A. M. Crofts, C.I.E.

DR. WALTER J. DILLING, at present Lecturer in Pharmacology in the University of Aberdeen, has been appointed to the Dr. Robert Pollok Lectureship in Materia Medica and Pharmacology in the University of Glasgow.

MR. JOHN AUGUSTUS HOGG, M.R.C.S., L.R.C.P., of The Villa, Shardlow, Derbyshire, Medical Officer of Health for the Shardlow and Castle Donington Rural Districts, died intestate, and left estate of the value of £1,758.

LIEUT.-COL. WILLIAM BULLEN DAY (retired), M.B., B.Ch., of 52 Burton Court, Chelsea, S.W., and late of the R.A.M.C., who saw service in India and throughout the South African War, left estate of the gross value of £4,751.

DR. GRACE GIFFEN DUNDAS, wife of the Medical Officer of Health of Ramagale, has been appointed to act as Medical Officer of Health and School Medical Officer during her husband's absence on active service with the Territorials.

SIR JOHN COLLIE, M.D., will deliver the opening address before the North-East London Clinical Society at the Prince of Wales' Hospital, Tottenham, N., on Thursday, October 1st, at 4.15 p.m., on "The Doctor as a Business Man."

DR. C. W. SALEEBY, F.R.S.E., will deliver a lecture on "Patriotism at Home" on Thursday, October 1st, at 1.15 p.m., at St. Margaret's Church, Lothbury, under the auspices of the War Lectures Committee of the Prince of Wales' National Relief Fund.

MR. ASLETT BALDWIN, F.R.C.S., will deliver the Presidential Address before the West London Medical-Chirurgical Society at the West London Hospital, Hammersmith, on Friday evening, October 2nd, 1914, on "The Prevention of Post-Operative Discomforts."

We regret to learn that Dr. Pennys Evans, one of the honorary medical staff of the Kidderminster Infirmary, is lying in a grave condition, suffering from general sepsis, consequent upon pricking his finger at an operation performed at the Infirmary a few days ago. Our readers will join with us in wishing him a speedy recovery.

Much sympathy has been expressed for Dr. Hamilton Williams, of Colwall, on the death of his brother, Captain A. J. Williams, R.A.M.C., at the seat of war. Later particulars show that the deceased was attending to a wounded soldier at Cambrai when he was deliberately shot at close quarters by a German. Dr. Mary Williams, School Medical Officer for Worcestershire, is his sister-in-law.

DR. GERALD NOEL MARTIN, Surgeon to the Sussex County Hospital, recently appointed Temporary Surgeon to the Crozat, after the sinking of that cruiser was happily rescued after being in the water two hours and a half. His father was a well-known practitioner in Sheffield and for many years a valued contributor to THE MEDICAL PRESS and CIRCULAR.
CLINICAL LECTURE.

ON THE MEDICO-LEGAL POSITION OF THE ANAESTHETIST. (a)

By J. D. MORTIMER, M.B., F.R.C.S.,

Anaesthetist to the Royal Waterloo Hospital, Central London Throat Hospital, St. Peter's Hospital, etc.

[Specially Reported for this Journal.]

I propose in this lecture to consider solely the medico-legal position of the holder of a medical diploma, who gives an anaesthetic for some legitimate purpose such as the performance of an operation or the relief of pain. There are, no doubt, many important questions, for instance, the possibility of forcibly anaesthetising someone in order that a crime may be committed, the use of anaesthetics by unqualified persons, and so forth, but these questions seem to me to be rather beyond the scope of the present lecture, and, besides, our time is too limited to consider them.

An anaesthetist is, of course, bound by certain rules that govern the conduct of all registered practitioners, but as regards his special duties his position is ill-defined and subject to circumstances. This is to a great extent due to the fact that it is only within the last quarter of a century or so that anaesthesia has been acquiring some independence, and consequently there are no decisions available for exact guidance. Formerly, comparatively few operations were done, and those were usually of a simple nature. The surgeon took entire responsibility, and he supervised the administration of the anaesthetic besides performing the operation, and the anaesthetist was, in fact, almost administered by an assistant or by some unqualified person. Even nowadays such conditions may be unavoidable in emergencies, but the responsibilities of the anaesthetist have been so increased that the majority of surgeons prefer to work, when possible, with one to whom they can give a free hand, and, indeed, it is often quite impracticable for them to do otherwise, because their own work requires unlimited attention. Now it is possible that some irreconcilable difference of opinion may arise between the surgeon and the anaesthetist as regards the method to be employed. Dr. Dudley Buxton referred to this in The Lancet of January 19th, 1908, and he suggested that under such conditions the anaesthetist should retire unless he had been specially called in by the patient or the practitioner, in which case he is on the same footing as the surgeon. It may also happen that some difference of opinion may arise as to the course to be pursued in some emergency, for instance, the entry of fluid into the air passages, or the completion of an operation when the patient is in a desperate condition. One cannot lay down any general rule about such cases, because the respective professional standing of the anaesthetist and the operator and their previous relations to the patient may differ very much in one case from another.

Now as regards consent—as a general rule, no person can be legally anaesthetised without consent. In the case of a child this should have been obtained from the parent or guardian, and in the case of an insane person, from someone who has authority to give it. Anaesthetisation, without consent, would be as much an assault as the performance of an operation without consent. If there are peculiar risks in taking an anaesthetic, one should give some warning to the patient, but people ought not to be alarmed by discussing remote possibilities. Difficulty may arise when a person is not in a condition to give consent on account of shock of accident or intoxication, and in the case of a child if the parent cannot be immediately communicated with and the operation is urgent—well, in such circumstances the anaesthetist can only do as the surgeon generally does, and be guided by circumstances that may make the performance of an operation under an anaesthetic justifiable, although possibly illegal. It is advisable that consent should be given, if possible, in the presence of a witness, more particularly if the patient is able to talk and understands what is said, but still is not in quite a normal condition. For instance, one under the influence of a narcotic may give consent, apparently in quite a rational way, and make a decision, when the effect of the narcotic has passed off, have no recollection of having done so.

Until quite lately it was considered that the power of a parent to withhold consent in case of children was absolute. However, not long ago a man was prosecuted by the National Society for the Prevention of Cruelty to Children, and was fined for refusing to allow his child to be operated upon for cleft palate, and that being so, one may perhaps assume that an operation to save life, for instance, in a case of strangulated hernia, may be legally performed, even if the parents object. One must not forget that many young people, such as those of 20 years of age or so, though practically independent of their parents, are still legally infants. There was a case in Canada some few years ago that turned on this point. A patient agreed to an operation not absolutely necessary, but his parents had not consented, and brought an action against those who were concerned. The case was decided against the parents, the patient being held to have his own merits than for any definite reason. Then consent may have been given in the case of a grown-up person, and the patient may possibly change his mind immediately one starts to give the anaesthetic. Then the anaesthetist must desist. If the anaesthetic has been taken for a few minutes, or even for a few seconds, and one may reasonably suppose that the power of judgment has been lost, then one is justified in going on in spite of protests and striplings. Sometimes a surgeon finds it impossible to keep within the limits of the operation intended, or he may find that he has to give up that operation and do a different one, perhaps a more serious one. He may, for example, have to do lithotomy instead of litholapaxy. The anaesthetist is probably entitled to assume, unless anything has been said to the contrary, that consent has been obtained to a possible variation, that the surgeon has been given a free hand to do his best, but if he is aware that the consent, as regards the operation he has been strictly limited, he may possibly get into trouble if he goes on giving an anaesthetic for aiding the surgeon to do something which the patient or the patient's relatives may afterwards disapprove, or which may even result in a fatality.

(a) Delivered at the Medical Graduates' College and Polytechnic.
An anaesthetic should never be given except in the presence of a third person. There are, at least, three good reasons for that rule. In the first place, actions have been brought for alleged administration without consent—the patient and the anaesthetist who was also the operator being alone together—and in both those places, damage has been done, and the grounds that the anaesthetic could not have been fully given by force, and that there was collateral evidence of consent, it is quite obvious that the anaesthetist-operator may be unable to prove this, and he would, at any rate, be exposed to considerable trouble and expense and have to go up a defence—and in those places, difficulties and dangers may, of course, arise during any administration, even when it is expected to be quite simple. If struggling occurs the anaesthetist or patient may be injured, and in the latter event there may be an action for damages. Then, too, various mishaps, vomiting, asphyxia and so on may mar assistance quite essential at a moment when it is impossible to procure it. Supposing there is no third person present, in the event of a fatality, the anaesthetist would be severely blamed, if no more serious consequences happened to him. Thirdly, in the case of a woman, the presence of a third person is especially important, because any anaesthetic, however skillfully administered, may be liable to induce or excite certain reactions during induction or during recovery, and a charge may be made afterwards with perfect good faith, against him, and, without any such excuse, a charge may be made for the purpose of extortion.

No one may give an anaesthetic for an illegal operation, and it is also likely that the operator is himself guilty of an act of fraud or other indefensible operation. Nor may one give an anaesthetic for the purpose of "covering" such persons as unregistered dentists, and bone-setters, even when they disavow any legal qualifications. A practitioner was not long ago struck off the register for administering gas to enable a professed bone-setter to make an examination.

Then as to after-effects and fatalities, charges of malpractice, civil actions for damages and so forth—in a general sense every registered practitioner is entitled, having attained his qualification, to administer an anaesthetic, and as defence against a charge of negligence in that respect, he may now be enabled to make reasonable care and skill in his doing. But there is no exact definition as to what are reasonable care and skill. A higher standard of skill, although not a higher standard of care, would probably be expected from one who holds a hospital appointment as an anaesthetist. If anyone who may be supposed to possess only the average skill of a practitioner gives an anaesthetic where no unusual difficulty could be expected, or if he gives it even when obviously risky, but for some good reason nobody else can be engaged, he would not be liable for any disaster in a criminal sense, unless it could be shown that he displayed extreme ignorance or carelessness. On the other hand, it is quite possible in the present day that if one who has only the average skill of a practitioner undertakes this task when the benefit of special knowledge is required and could have been obtained—that is when a specialist-anaesthetist could be engaged—he may be penalised in some way in the event of any ill-effects ensuing. One must make an exception to that, because he might be acting under the orders of someone in authority, for instance, a house surgeon directed by his chief, or an assistant directed by his principal. It has been suggested that even when such is not the case, that not only the anaesthetist might find himself in difficulties from a medico-legal point of view, but also the surgeon who engaged him or even permitted him to give the anaesthetic. Therefore any practitioner who is doubtful about his own ability to give anaesthetics ought to study not only the interests of the patient and the interests of himself, but of the patients and the interests of the patient. One of the conclusions at which a Commission on Anaesthetics arrived a good many years ago was this—that in many cases an anaesthetisation of is of such importance and gravity, that it is absolutely essential it should be conducted by an administrator with large experience. If that conclusion was justified when a case was even more or less justified at the present time, because for a large proportion of the operations now performed special skill and experience are as necessary in the anaesthetist as in the surgeon. I would include amongst these, operations for removal of tonsils and adenoids, which are now so common, and all operations on internal organs. It need hardly be said that some practitioners are excellent anaesthetists, just as some of our practitioners are excellent operators, but it is not possible for the majority to deal successfully with those cases that require special training. One knows that a faulty administration is not often the direct cause of death itself, but I assume it is the cause of death in too often of cases of which it has caused considerable anxiety and materially delayed the operation and interfered with its success. The apportionment of responsibility between the surgeon and the anaesthetist in the event of disaster has not been recently determined in court. Formerly it was, as is customary to consider the operator only responsible, in addition to his own actions for the actions of those not only directly assisting him, but in any way aiding him to perform the operation. But it is unlikely that if this question were to arise at the present day, this view would still be taken. One may point out that when death occurs during anaesthesia the anaesthetist is invariably summoned if an inquest is held, but the coroner does not call as a rule on the surgeon, unless he has reason to suppose that death was due to some operating accident, rather than to the anaesthetic. He might, however, do so in the circumstances above indicated. Any disasters consequent on anaesthetisation, apart from death, may be slight and may be serious. For instance, a patient may have a tooth broken from forcibly opening the mouth; you may have some injury sustained in struggling; you may have bruising of the tongue from dragging and clamping; you may have something very serious, such as loss of an eye from movement of the head (the patient being incompletely anaesthetised) or actual inability of the surgeon to complete the operation, or you may have after effects, such as persistent vomiting, more or less due to some mistake made in the way in which the anaesthetic has been selected and given. The anaesthetist may in such circumstances find himself a defendant in an action for damages, although, supposing death to have occurred, there may have been no prosecution for manslaughter, or any probability that if there had been any prosecution there would have been a conviction. The anaesthetist may also be called as a witness in an action brought against the operator, for instance, where, as has happened in one or two cases, the operator has left a stab in the abdominal cavity, or he may be called as a witness in an action against an insurance company, or against employers under the Workmen's Compensation Act, and so forth. It has been suggested that if the anaesthetist is very much afraid of this kind of thing happening, he should get the patient to sign an indemnity.
freed him from responsibility. But that would be
of hardly any value at all from a legal point
of view, because it would not afford any protection
against the consequences of wrong doing. It
would only indicate that a patient had been
warned that risks were present, and one need
hardly say that a nervous patient would be
extremely alarmed by any request of this sort,
and altogether it is not a thing that one would
recommend.

In giving evidence the anesthetist should follow
the general advice that one gets in books on
Forensic Medicine as regards medical witnesses.
That is, to put it briefly, he ought to study the
subject of inquiry very carefully beforehand.
He ought to consider what questions are likely to
be put to him and how his evidence may be
regarded by anyone outside the medical profession.
He must remember that he may have to deal with
a coroner who has had no medical training at all,
or with a judge and counsel and jury who
certainly had none, and that an answer which
would satisfy a board of medical experts will by
no means satisfy a tribunal of that description, and
he ought to consider whether such an answer
may be seized upon to his disadvantage.

Then, if he goes before the coroner or before a
magistrate or a county court judge, he ought to
remember that the case may be carried further
and copies of the evidence given may be produced
before a higher court, and there should be no
discrepancies from carelessness or lapse of memory
between the evidence given on the second occa-
sion, as compared with the evidence on the first
occasion. He should give answers deliberately
and distinctly, carefully avoid any approach to
levity, irritation or discourtesy, and as far as
possible reply in simple language free from
technical terms and from vague and exaggerated
expressions. As far as one can, he should give
plain answers to simple questions, not stray
beyond the question asked, and confine himself
to facts, or to comments on facts disclosed in
evidence if summoned as an expert wit-
ness. Objection should be made to any
questions that are involved or suggestive, or
depend on unproved hypothesis, and if a brief
answer such as "Yes" or "No" would be mis-
leading, he should ask to be allowed to give
answer which would be more satisfactory. If in
doubt he should not evade the question, but say
he is in doubt and give his reasons for being in
doubt; also avoid expressing any decided opinion
where the data are insufficient, and particularly
not give an opinion about the cause of death in the
absence of a post mortem examination, even when
the cause of death has apparently been unmistak-
able.

Then, lastly, we come to the Coroner's Court.
Now some coroners always hold an inquest when
death occurs during anaesthesia, and some consider
they are entitled to exercise discretion. Some
coroners are extremely good and impartial,
and know, as far as they can in the absence of prac-
tical experience, a good deal about the subject.
Some, unfortunately, are just the reverse. A
coroners' jury is obviously unfit to decide in
what ought to be a scientific investigation. The
consequence of all this is that an anaesthetist, who
has really been very much to blame may get off
scot-free, whereas one who has done his best in
difficulties, and who is perfectly competent and
careful, may find his reputation considerably
damaged. That is perfectly evident from the
reports that one reads in the newspapers from
time to time of inquests on people who have died
under anaesthetic. Some few years ago, the
Coroners' Society drew up a series of questions
to be used in inquiries of this sort. Dr. F. J.
Smith, in his "Medical Jurisprudence," last
edition, has dubbed it with vigorous criticism "The
Coroner's Catechism." I make it a point to read
those questions that may be asked in the
Coroner's Court, but also questions that may be
asked at other investigations, such as I have
already mentioned.

The first question is: "What anaesthetic or
anaesthetics were employed, and what influence
and any other, and what is his opinion as to that?
I would urge the anesthetist to say that the free
and troubles of short fatalities are very often due to a faulty
selection of the anaesthetic. Something may be
given which is unsuitable, either to the particular
patient or the particular operation, or to the pos-
tion in which the patient is to be placed, or some
other condition. For instance, nitrous oxide may be
given to an elderly full-blooded person for the
opening of a tonsillic abcess. Chloroform may be
given to an anaemic girl for the extraction of a
tooth. Fatalities have occurred in such cases.

2. Where and when was the anaesthetic admin-
istered? State if in an operating theatre, casualty
room, out-patient department, or private house.

3. What was the temperature of the operating
room? Had the room, previous to the operation,
been well- aired?

4. Was the anaesthetic given by artificial light?
State what kind. If gas, was the flame exposed?

5. For what purpose was the anaesthetic admin-
istered? State the nature of the operation, with
name and address of the surgeon operating.

6. How many patients were placed under
anaesthesia by you that day, and how much time
was occupied in producing complete anaesthesia in
each case?

7. Was there any, and if so, what reason for
administering the anaesthetic quickly?

8. How was the anaesthetic administered? If
by means of an inhaler, state what kind and make.

9. How was the mixture of air with the vapour
of the anaesthetic secured, and in what proportion?

10. What quantity of the anaesthetic was used
(a) from the beginning of the administration?
(b) from then;
(c) after the administration was stopped?

11. What was the anaesthetic supplied by drops or
measurement? That question about quantity is constantly asked.
If a small quantity, say, of chloroform has been
used, the coroner and jury seem to think it quite
satisfactory. If a comparatively large quantity
has been used, they seem suspicious, not knowing how
the amount used, particularly if given by the drop
method—the so-called open method—may be
influenced. For instance, in anaesthetising a person
whose breathing is shallow, the patient takes a
long time to go under, and comparatively a large
amount is used, little of which is really absorbed, and a good anaesthetist will use
more than a bad anaesthetist, because he will not
hurry.

11. How was the deceased prepared for the
anaesthesia as regards food, clothing and so forth?
Was there mechanical or other obstruction to the
respirations?

Proper preparation of a patient for anaesthesia
is extremely important, and in emergency opera-
tions it is most essential to inquire when the last
meal was taken, and of what it consisted. There
is one recorded case in which a man had been
anaesthetised and it was necessary to give him an
anaesthetic, in order that his wound might be
examined. The anaesthetist made this inquiry, and
was told that he had his last meal many hours before. However, the man, during the giving of the anaesthetic, vomited undigested food and was choked and died. The man who had assaulted him was consequently put upon his trial for manslaughter, but when it was stated that the deceased person had received the anaesthetic he regarded it as time-worn and escaped conviction. Now, if the anaesthetist had not put the question, or if the patient had answered him correctly, there would, of course, have been a very different result.

12. What was the condition of the heart, lungs and kidneys of the deceased previous to the administration? Were you satisfied that there was in the patient a condition to be placed under the anaesthetic? Had the patient previously been anaesthetised?

13. Was the deceased at the time of the administration suffering or recovering from any acute or chronic illness, or from alcoholism?

As to suffering or recovering from any acute or chronic illness, one must, I suppose, take it that refers to some illness additional to the one that necessitated the operation.

14. Was the deceased excited or violent during the first stage?

There is very good reason for asking that question, because violent struggling at the onset may have an effect on the heart that continues after the struggle has ceased, and may result in failure later on. Alcoholic subjects, I need hardly say, are particularly bad subjects, for the reasons that they need much anaesthetic to get them under, they commonly struggle very violently, and their hearts are commonly, at any rate, during middle age, in a degenerated condition, and very apt to get over-dilated and give out. Not so, however.

15. Was the pulse and respiration watched during the administration, and if so, by whom? State the conditions observed. What was the state of the pupils and of reflex irritability generally?

16. At what period during the administration of the anaesthetic was the first symptom of impending death noticed? What was it? Did the deceased vomit at any time? If so, when and how often?

17. Did deceased die during the administration of the anaesthetic? If not, how long after it had been discontinued? Was the operation then completed?

If so, for how long?

18. What efforts were made to restore animation, and how long were they continued?

To what immediate cause do you yourself attribute the sudden death of the deceased?

This gives one a chance to explain about the part which may have been played in the fatality by surgical shock, haemorrhage, asphyxia from vomiting or blood in the air passages, and so forth. And one might say in this connection that a large proportion of deaths during anaesthesia are not due to simple overdose, but to some complication of that sort.

19. In how many cases have you given an anaesthetic previously? If any fatal cases, say how many, and often these have been pointed out that statistics concerning fatalities are of little value. A man may have been so unfortunate as to have had two deaths in 500 cases, but one may have been that of an infant in a dying state from internal obstruction, and another may have been that of a brewer's drayman with impeded breathing from cellulitis in the neck, who solemnly declared to his anaesthetist that he must say simply he had had two deaths in 500 cases. It would give a perfectly erroneous notion of his capacity as an anaesthetist.

Then, as I said just now, the question of consent may also arise, especially when the administration was for any reason risky, and there may be also inquiry as to the quality of the anaesthetic used.

Several of the questions are open to objections, such as suggesting carelessness or incompetency, or entailing explanations which would not be understood by the layman. However, any or all of them may possibly be asked of an anaesthetist, not only in the Coroner's Court, but in any court, and they show that before giving an anaesthetic you ought to be thoroughly acquainted with the subject, and realise that you are undertaking a heavy responsibility, not only as regards the patient—this is obvious—but also as regards yourself. The administration should be conducted with the utmost caution, and never in any unusual way, because you may be called upon at some future time to justify your actions. I need hardly add that membership of the Medical Defence Union or the London Counties Medical Protection Society may in this, as in any kind of practice, be a very present help in time of trouble.

Note.—A Clinical Lecture by a well-known teacher appears in each number of this Journal. The lecture for next week will be by W. EssexWynter, M.D., F.R.C.P., Physician, Middlesex Hospital. Subject: Herpes.
consisted of at least four distinct periods of maximal glaciation, with mild interglacial pauses, is seen to extend from the end of Tertiary times into the middle or later part of the pleistocene. But it must be remembered that what we call the Pleistocene period is to be looked upon as merely the introduction, and the Tertiary period as only the first chapter, of the very thick volume which contains the complete geological record. The table also indicates the different periods of prehistoric culture, as elaborated by the French and Belgian schools, as shown by the associated flint implements and products of manufacture and art.

We will now briefly recall a few of the best-known specimens of fossil man before discussing those recently found in Sussex. The most primitive and earliest find was the so-called *Pithecanthropus erectus*, discovered by Dubois in Java in 1891. The geologists would place it at the end of the Tertiary or beginning of the Pleistocene period. Its anatomical features are very unusual. The cranial capacity is only 853 c.c.—that is not very much above that of a gorilla with 600 c.c., an average modern skull having about 1450 c.c. The skull bones are very thick; the vertex is low and flat. The femur, which was found close by, and presumably belongs to the same individual, would point to a stature of 5 feet 6 inches, and to the erect position. Hence in this individual, at any rate, the erect position was evolved before any great cerebral development occurred.

Next we will take the inferior maxilla found in the Neanderthal near Heidelberg in 1867. Its position in the alluvial deposits had been by the ancient river Neckar makes its age quite certain, namely, in the very beginning of Pleistocene times. This jaw is extraordinarily massive, but the teeth, which are all preserved, are distinctly human in type, though very large in size; in fact, it was only the teeth which prevented its being taken for a simian jaw when found. The absence of the mental prominence or chin is very marked, and the breadth of the ascending rami is enormous; the insertion thus provided for the masseter muscle shows that the latter must have been of great size and power; the shallowness of the sigmoid notch is noteworthy, and helps to prove the bony surface of the masseter muscle. The incisor teeth are remarkably curved on their long axes, with the convexity forwards, and they evidently projected in front of the upper incisors, and did not lie behind them, as they do in modern man. The genial tubercles or mental prominences, for the attachment of the genio-glossus and genio-hyoid muscles, are replaced by a shallow pit. This is always found in apes, in some very primitive human races, and it is said also to occur in the Neanderthal. Dr. Longworth Long in "Annals of Natural History," Nov. 103, shows the close relation in which these genial tubercles stand to the power of articulate speech. They are present only in adult men, being absent in young children; they are Nature's method of giving an effective point of action for the genio-glossus muscle, the latter being the most important factor in articulation, by causing the various vertical movements of the surface of the tongue which produce the different consonantal sounds. In apes, lemurs, and the canine races, the tongue lays flat on the inner surface of the jaws, and a genio-glossus muscle arises from a pit in the bone, which is necessary to give it room to act; but as the chin becomes gradually vertical, and the tongue lies within rather than on the jaw, the attachment of the muscle is more forward, and deeper in the case, and is replaced by bony prominences. Thus, though the Heidelberg jaw is certainly human, yet it would seem as if its chief purpose was for mastication rather than for speech. Professor Duckworth, of Cambridge, has pointed out that this jaw would be a very fair type for the other ancient fossils we have just described, the *Pithecanthropus erectus*.

A very important series of fossil remains should now be noticed; they are classed together under the name of Neanderthal, and the first of the group to be discovered in a valley of the same name in Düsseldorf in 1856. When similar bones were found later at Spy, Krapina, Le Moustier, and Chapelle-au-Saintes, they were seen to constitute a distinct type of human beings. They are characterised by skulls of large cranial capacity, up to the modern standard, but the bones of the vault are very thick, the areas for attachment of the muscles of mastication and of the neck are greatly increased, and there is an enormous development of the supra-orbital ridges, forming a great prominence above the orbit and marking the upper limit of attachment of the cervical muscles, is 20 mm. higher on the outside than the upper limit of the cerebellum, as shown by the torcular Herophili on the outside of the skull, while in modern man these points are readily opposite each other. The long bones of these skeletons are very massive, with enlarged ends and articular surfaces, which seem to show that the knee-joints were never completely extended, so that the individuals walked with bent knees and a stooping gait. Professor Keith has made the suggestion that these features recall the pathological condition of Acromegaly and that this peculiar group, who apparently appeared in mid-Pleistocene times and were associated with the Monsterian stage of flute implements, may be accounted for by some special phase of glandular activity, just as hypertrophy of the pituiy produces acromegaly. However this may be, it is now recognised that this group was a local degeneration or backward step in the path of progress itself. This contention is borne out by the fact that the Monsterian flute implements found along with these remains show a more primitive culture than the Acheenian flutes which occur in the epoch immediately preceding them.

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<th>Geological Periods</th>
<th>Glacial Periods</th>
<th>Cultural Periods</th>
<th>Human Remains</th>
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<tr>
<td>TERTIARY</td>
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<td>Mesolithic</td>
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<td>Pleistocene</td>
<td>4th Glacial period</td>
<td>Mousterian</td>
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<td>3rd Glacial period</td>
<td>Acheleian</td>
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<td>1st Glacial period</td>
<td>Heidelberg jaw</td>
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<td>RECENT</td>
<td>Age of Metals,</td>
<td>Neolithic</td>
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Allied to these Neanderthalers is the well-known Gibraltar skull found in a limestone cave at that place in 1858; it was never properly described until many years later, when it was brought home and placed in the Hunterian Museum of the Royal College of Surgeons. Unfortunately its exact age cannot be fixed, as the geographical data were not recorded at the time of its discovery, but the mineralised condition of the bone itself and certain other evidence point to a great antiquity, probably early Pleistocene. It is the same kind of evidence as is characteristic of the Neanderthal type, but it differs from the other members of that group in having a much lower cranial capacity, namely, 1100 c.c., while, as has been mentioned before, the Neanderthalers had been equal or only up to the lowest limits of the cranial vault, which only reaches 88 mm. above the external auditory meatus, while a modern skull measures 117 mm. between these points.

The teeth are interesting; the roots of the molars are very large, and are united together, while the size of the wisdom tooth, judging from the alveolar cavity (for the tooth itself is absent), must have been as large or larger than the second molar. This is a primitive feature. Modern man is rapidly losing his wisdom tooth, and already it is smaller than his second molars, while in the anthropoid apes they are equal to or larger than them. This skull is considered to be a predecessor or progenitor of the Neanderthal race, and possibly belonged to the period when that group was branching off from the primitive human stock.

Now this series of human remains which have been discovered at many places on the Continent of Europe are all found at about the same geological horizon, namely, in the middle Pleistocene beds, situated in a mild climatic interval before the last cold phase of the Glacial epoch; but contemporaneous with them, and also slightly earlier, are found other human fossils, which do not show the same features, and are in fact not so far primitive in character. Such, for example, are the Galley Hill remains, in the Combe-Capelle from the Dordogne district, and the Galley Hill skull found in this country. The latter was discovered near Gravesend in the 100-foot terrace laid down by the River Thames towards the close of the Glacial epoch. In this gravel terrace there are remains of Elephas antiquus, the predecessor of the mammoth, of an extinct rhinoceros (Megalocerus) also flint implement which are classified as Chellean in type.

Not the Galley Hill man and those just mentioned show none of the peculiarities which are special to the Neanderthal group, and though they have some special features of their own, they approach very closely to modern man. Again, the discovery in October 1912 at Ipswich by Mr. Reid Mor of a complete skeleton just below the boulder clay, and therefore presumably of Pre-Glacial age, though this is disputed by some, points in the same direction. Professor Keith, who has described this skeleton in great detail, and is an ardent advocate for its Pre-Glacial status, says that the mechanical condition shows the possible exception of some primitive traits in the tibia, it is practically modern in type.

Thus it would appear that man existed in more or less his present form at a very early age, towards the beginning of the Pleistocene. The probability of Tertiary man has never been admitted until quite recently, but if we are to give time for his evolution up to the advanced stage shown by the Galley Hill and Combe-Capelle remains, we must put his first appearance many thousands of years higher up in the Tertiary period. The evidence of flint implements seems to support such a view, as the new schools of pre-history in France and Belgium are accumulating instances of the occurrence of the so-called celtics, which we take to be implements of true man manufacture, in the strata of late and middle Tertiary age, both in this country and on the Continent.

We now come to the interesting and important discovery of fossil man at Pitfield near Lewes in Sussex. This was made by Mr. Dawson in October 1912 in a bed of gravel along with flint implements and some mammalian remains. Dr. Smith Woodward, Keeper of Geology at the South Kensington Museum, made a study of the bones, and his report suggests that, as they differ so much from all other known human bones, they should be placed in a new genus of the Homonide, and be named, in honour of their finder, "Homo anthropus Dawsoni" (Quart. Journ. Geol. Soc. LXX. 284).

The flint implements found in the same bed are of two kinds: palaeolithic or chipped flints of the Chellean type, such as occur in the terrace of the Thames where the Galley Hill skull was found; and the other, finer, which Dr. Woodward thinks were made by Neanderthals or even earlier strata. The associated mammalian bones belonged to a primitive or piolecanent, the stegodon, mastodon, hippopotamus, deer, beaver, and horse; and later the tooth of the extinct Elephas primigenius has been dug out of the same bed.

This assemblage of fossils points undoubtedly to the piolecan period, and the condition of the human bones resembles that of the other fossils as far as colour, state of mineralisation, etc.; but because of the fact that they are not in any way like the same extent as the other bones, Dr. Smith Woodward cautiously prefers not to assign them any greater age than that of the Chellean palaeolithic flints, i.e., early Pleistocene, though he admits the possibility that they may be somewhat more ancient.

The human bones consist of the greater part of both parietals, almost the whole of one temporal, part of the frontal and occipital, thus forming the greater portion of the brain case. The right half of the lower jaw was also found with the first and second premolars and other teeth belonging to this half of the jaw turned up, and Dr. Smith Woodward informs me that by carefully putting the earth and gravel through line-meshed sieves, he has found both the nasal bones and some small fragments of the naso-lacrimal sinuses. All the 12 teeth were all found lying close together. (Mr. Dawson first found one fragment by chance, some time before the others, and this had been already dug up by workmen.) They are all of the same degree of mineralisation, which is extremely complete, probably more so than any other known human bone. They are all of the same reddish-brown colour, and ring like a stone when struck; in fact, they are stone now and not bone.

With regard to the special features of the cranial bones, the great thickness of the flat bones should be noted, twice as much as normal; it is due to a great increase of a fine dense diploë, the external and internal tables being quite thin. The temporal bone is normal; the frontal bone shows the left external angular process, with the orbital plate and the articular surface for the malar bone. These are all modern in form, and show that there was none of the huge supra-orbital ridge of the Neanderthal skulls. The occipital bone shows the upper half of the foramen magnum, with the occipital protuberance outside and the torcular herophili inside, the former being slightly below the level of the latter, as in modern man, and not above it, as in the Neanderthal's. The asymmetry of the cerebellar fossa is interesting, the left being pressed below the right. The left half of the right, showing that the left cerebral hemisphere was larger than the right, and depressed the corresponding cerebellar lobe.

Thus the cranial bones are very similar to those of modern man; but what is most different. Only the right half is preserved, and this lacks the condyle and the anterior part of the alveolar portion in front of the first molar tooth, while the lower border is preserved up to, or almost up to, the symphysis. The anterior border of the mandible is shallow, giving a large area for the attachment of a presumably powerful masseter muscle. On the inner side there is no trace of the ridge, present in nearly every human
jaw, for the attachment of the mylohyoid muscle. The position of the groove for the mylohyoid vessels and nerve is abnormal, for instead of leading downwards and forwards from the dental foramen, it runs below and behind it. The space for the insertion of the temporal muscle is extensive; the anterior margin of the ascending ramus is here much thicker than usual, and a well-marked ridge runs upwards and backwards to the condyloid process, evidently for the insertion of the temporalis. Hence, the powerful muscles of mastication are inserted. All these features are normal to the jaw of a chimpanzee and are absent in man. But the most sinister character of all is the anterior portion of the jaw. The lower border of the maxilla curves round towards the symphysis, forms a horizontal shelf or flange, ending in front in a strongly retreating chin. This flange-like process is utterly unlike anything met with in a human mandible, even when there is a retracting chin, while it is quite typical of the anthropoid apes. If the opposite half of the inferior maxilla of a young chimpanzee be joined up with this one, a perfectly symmetrical jaw results.

The first and second molar teeth are present. They are ground down quite smooth and flat, showing that some lateral grinding movements of the food were employed. They are large in size, but quite human in character. The first is smaller than the second, and the second is hardly any larger than the third or wisdom tooth, judging from the alveolar cavity of the latter, as the tooth itself is absent. These relative proportions are suggestive of the simian dentition.

Such being the character of bones which have been found, the problem to be solved is, how to restore the missing parts, and so to reconstruct the original individual as he once existed; and over this question a sharp controversy has raged.

Dr. Smith Woodward and Professor Keith, who have each attempted to solve this problem, differ considerably in their results. Woodward realised that the chin must be a retreating one on the plan of a chimpanzee, in order to account for the incurving flange on the lower border of the jaw. This meant that the alveolar process would have to be much longer than in modern man, about 60 mm, instead of about 40 mm. In order to fill up this gap he first modelled on the largest set of human teeth known—namely, those from the Heidelberg jaw—but even these were not big enough for the purpose; he then had to postulate the existence of a large projecting canine overlapping its fellow after the pithecid pattern, which would, in fact, be in harmony with the other existing features. Professor Keith, however, protested at this reconstruction and denied the possibility of such large teeth, and especially of the interlocking projecting canine. He solves the problem by putting in normal-sized teeth, and shortens the alveol process by recurruring the anterior surface of the symphysis upwards and backwards. This, his opponents say, is neither human nor simian, and has no justification. However, after the publication of these models, on August 20th, 1913, the missing canine was found in the same gravel bed as the rest of the bones had come from. The tooth is a right lower canine of much the same colour and degree of mineralisation as the others, and though not quite so large as the one postulated by Smith Woodward, is similar in character, and shows by the wearing away of its posterior and inner surface that the interlocking of the canine has proceeded in the true simian fashion; it thus seems to bear out the latter's reconstruction of the missing parts of the jaw.

Next, with regard to the cranium. Except for the thickness of the bones, it shows no very primitive characters, so that the reconstruction is on modern lines. Woodward and Keith again differ as to the actual cranial capacity, the former giving it 1100 c.c. to 1200 c.c., while Keith demands 1500 c.c., that is, quite equal to the brain of modern man. The position of the superior longitudinal sinus is the disputed point between them, Woodward affirming that a depression which is present on the inner surface of the anterior superior portion of the fronto-parietal fragment represents the position of the simian, while Keith denies this and places the sinus further to the right side, which of course makes the skull much wider and increases the cranial capacity enormously. With regard to the posterior part of the sinus, Dr. Smith Woodward admits he somewhat misinterpreted its position in his first construction, and now agrees with Professor Keith on that point, which increases his original estimate of 1070 c.c. to about 1200 c.c., which is just within the limits found in the most primitive aboriginal races. The accompanying plate, which I am enabled to reproduce from the Geological Magazine of October, 1913, by the kind permission of Dr. Smith Woodward, gives his latest reconstruction, with the newly found canine tooth in position, the missing parts of the bones being shown unshaded.

In a further note on the Piltdown skull which was read at the London Geological Society on December 17th, 1913, Professor Elliot Smith pointed out that he had identified the anterior extremity of the sagittal suture, which had hitherto escaped notice, and this...
The enormous development of the supra-orbital ridges, with the retraction of the frontal region, only develop in adult life to give sufficient strength for the powerful muscles of the jaw and neck, which are special to the full-grown ape. But shows that man, like men are descended from a common stock in which these special ape-like characters were not present. It also shows that the full-grown adult skulls of the mid-Tertiary ape must have exhibited the smooth, steep foreheads which their immature descendants now exhibit.

Professor Keith, in a suggestive article on the Pitdown skull in *Bedrock*, January, 1914, points out that just as in Neanderthal man we have a type with a big brain, a human form of brain, in the form of our own larger brains, and yet in the Pitdown man we have a type with a big brain, a human form of brow and forehead, but with the simian form of chin and teeth. In each of these the simian feature has persisted. While modern man represents a stock which has eliminated or never possessed them both, his ancestors may have been contemporaneous with both the other types, and according to Keith may be represented by the Galley Hill and Ipswich skeletons, which many authorities are desirous of proving to be recent but without getting rid of the difficult problem of their modern form.

**EXOPHTHALMIC GOITRE: ITS PATHOGENY AND TREATMENT. (a)**

BY F. GRAHAM CROOKSHANK, M.D.LOND., M.R.C.P.

Mr. President and Gentlemen.—In reading tonight, at the request of your Council, some notes on the subject of exophthalmic goitre, I do not propose to describe in any detail the signs, symptoms, and course of so familiar a malady, but rather to bring to your notice some points in its pathogenesis, and some considerations regarding its treatment.

We have for long been accustomed to speak of persons whose physical state is marked by enlargement of the thyroid, by protrusion of the eyeballs, by rapid and sensible action of the heart, and by tremors of the extremities, as suffering from exophthalmic goitre. This condition of disorder was first described by Parry, of Bath; although, since the later writings of Graves and of von Baschow have, both at home and abroad, been accorded the greater recognition, it is with their names rather than with that of Bedson that the condition is titubally associated.

But, under whatever appellation it has gone, its pathogenesis has ever been the playground of controversyists; nor can it be said that even now either its nomenclature or its pathology has been definitely settled.

Certainly, ever since first, in the early nineteenth century, attention became directed towards the striking fact that many of the symptoms thereof stand in striking antipathy to those of a person whose thyroid gland has been removed by art or rendered useless by disease, the notion has widely prevailed that it is primarily due to an affection of that organ.

And moreover, since so many of the symptoms are such as may be produced by over-dosage with thyroid substance, and since also actual examination of the gland pretty constantly reveals such hyperplasia as is thought to indicate increased functional activity, it has come to be accepted by most, if not by all, that the nature of the trouble is one of functional excess, associated with increased capacity for secretion.

The further suggestion that this excess, or increase, is primary, idiopathic, or essential, has particularly commenced itself to those thoroughly British pathologists who love to speak of disease as a morbid entity: something precipitated suddenly and completely like a baby in gooseberry-bush, "out of the everywhere into here."

Belief in the primarily thyroidal nature of exophthalmic goitre.

(a) Paper read before the West London Medico-Chirurgical Society, May 1st, 1914.
ophthalmic goitre has, moreover, this recommenda-
tion to the otiote, that it eshelves inquiry as to why or
how the thyroid should suddenly depart from the
primary path of physical functioning; it does
straightforwardly to the inconvenient clinicians
who have thought to establish casual relations, not easily
explained, between the disease and various antecedent
conditions and circumstances.

It is often physical or metaphysical, is ever primary or idiopathic, unless, indeed, we persuade
ourselves that, by the use of these words, we are
merely admitting and not seeking to conceal our
ignorance of the necessary chains of causation. It is
obvious that, were exophthalmic goitre really nothing
but the result of an idiopathic hyperplasia of special
nature, there would clearly be but one
rational method of treatment: to trim the gland to
proper proportions. But since there is reason to
believe that the activity and overgrowth are either the
result of wanton promotion by some systemic agency,
or of the nature of a purpose, albeit indirect
response to some urgent call for the fulfilment of duty—carried too far, as so often are well-intentioned
efforts—it is plainly our duty to seek out and remove the
incitement, in the hope that restoration to a state of 
quiet efficiency will ensue. Clearly, too, the actual
removal of glandular tissue is not rational unless the
hazard to hyperplasia and functional excess has
acquired such impetus that its progress cannot be sta-
ted by any other method.

We must not, then, without full conviction, assent
to investigations that are arrested at the thyroid
gland itself; or to the claim that thyroidectomy
affords the only rational and effective plan of treat-
ment, since it is therefore resorted to at the
earliest opportunity.

It is sometimes suggested that belief in an essentially
thyroidal pathology, and a settled conviction in favour of surgical intervention, are justified by a
study of those cases which, on the continent, are
spoken of as instances of primary Basedow's disease.
But, if we press for a definition of these cases, we are
told, in approved fashion, that they are those due
to primary hyperplasia, and for which surgical inter-
vention is to be recommended.

Even so, archidoms said to be high ecclesiastical
personages who perform archdiocesan functions.

Moreover, we cannot refuse to include within the
ambit of our purview those many cases of which the
signs and symptoms, if referred to the classical
standards of thyroid pathology, are anomalous, or incom-
plete, as well as sometimes transient.

It does not advance our knowledge, or clarify our
thought, to speak contemptuously of such as formas
fruits—unworthy instances of what disease should be.
Rather let us be as inquisitive as the good old quakers
are likely to afford us hints on the pathogony and treat-
ment of the more serious and progressive cases to
which alone some would attach the label of true
"exophthalmic goitre.

It cannot be said that, after all, everyone is
prepared to admit the preponderating excess of the
thyroid gland in even these latter cases. For some
believe that certain of the symptoms, if not sometimes
all the symptoms, may be of nervous origin; while others
are equally disposed to regard them as evidences of depraved rather than of excessive function—of dysthyreosis, that is, rather than of
hyperthyreosis—whilst others, again, think that the
thyroid is only one of the glandular organs principally
at fault.

It therefore becomes necessary to discuss, albeit
with the scantiest justice, what we think we know
concerning the functions of the thyroid gland, before
attempting to allot its responsibility, or to reconcile
conflicting accounts of the pathology of the various
groups of cases that come before us.

We speak of the thyroid gland as endocrine: yet of
the actual nature of its secretion little is really
known. It is generally believed, however, that a
substance of peculiar albuminous construction is
elaborated; that this is sometimes stored as colloid,
action on various tissues and mechanisms of a substance or substances, elaborated by the thyroid, and differing from those normally produced, mainly in terms of quantity.

But the question must be put: Is the thyroid in Graves's disease, when this is the case, always or ever the first organ in the body to display such aberration of function as is really a part and not merely a cause of the disease?

We must certainly agree that in certain cases of syringomyelia, and so forth, even though rarely, signs of Graves's disease—principally vasomotor and oculor—may arise as a result of central disturbance of the nervous system. But the cases are not such as are not possible as examples of the disease we are discussing.

On the other hand, exophthalmos, vasomotor disturbance, and other indica do occur in cases of direct mechanical interference with the cervical sympathetic by goitre; and we may suppose primary derangement of the thyroidal functions. Again, to strange stimuli, such results may follow the pressure on the cervical sympathetic of a goitrous enlargement of the thyroid itself.

The observation of such cases does, indeed, make it hard to deny that a primary derangement of the sympathetic, set up, as some maintain may be the case, by shock, by fright, or by long-continued emotional stress, will sometimes give us the clinical picture of true exophthalmic goitre. For the work of Victor Czon and others has made it clear that stimulation of the sympathetic fibres increases in the sympathetic and active hypoplasia of the thyroid itself.

It is at least likely that some of Kocher's cases of vascular Basodew's disease are really of this nature; and we may agree, in the circumstances, at all events, if not the ultimate causative factor in the production of the disease, at any rate an occurrence that, in the pathogenic sequence, is antecedent rather than consequent, or at any rate a concomitant to the thyroidal disorder and hyperplasia.

In another group of cases—barbarously spoken of as that of the Basodewifying goitres—the presence of what McCarty would call a retained thyroid unit of fetal type appears to induce overactivity and hyperplasia of so much of the thyroid as is supposedly normal in character; with the production of a Basodewsonian syndrome.

It is easy to suppose that, in these cases, the secretory hyperplasia stands for an attempt at adjustment, but without success, rather than a causal factor. Still, sometimes, the healthy part of the thyroid does appear to vicariously assume the duties abnegated by other portions; and there are the parallel instances in which forms frustes arise when the ovaries are in danger from the menopause; or in some cases of pituitary deficiency; and perhaps in some cases of hypoadrenalism.

Indeed, so often do symptoms of Graves's disease arise when there is disturbance of the plurihandular balance, that we have fair justification for dividing another class of case in which there is prethyroidal disturbance of function, but this time endocrine rather than nervous; and sometimes some of the symptoms are due to such disturbance.

In these instances, thyroidal derangement of nervous and endocrine structures, we have to reckon, in the pathogenic of exophthalmic goitre, with metabolic perversions, or irregularities, and with certain infections and intoxications of extrinsic origin; not so much as integral parts, but as provoking agents of the condition of the thyroid. The clinical relationship, on which Mr. Farrant has insisted, between cirrhosis of the liver and exophthalmic goitre, exemplifies the first statement; as does also the part played, according to Chalmers Watson, by certain infections of the condition of the thyroid; and some obscure, but nevertheless fairly definite, relation between irregularities in calcium metabolism and the disease. Nor is Sir Arthbuthn Lane without grounds for asserting that chronic intestinal stasis is one of the important antecedents; and the other possibilities. But, in quite a large number of cases, Graves's disease appears to follow certain forms of infection and exogenous intoxication, local or otherwise, the minimal, acute or chronic. Amongst these must be noted the case of the patient with the paralysis of tuberculosis—much insisted on by the French—and some quasi-as well as genuinely rheumatic affections. It is interesting to note that Parry's first case was of a woman who, shortly before the onset of her disorder, had suffered from what we should now recognise as acute rheumatoid arthritis; and equally so to remember that it was Kent Spender, another physician of Bath, who first drew attention to the tachycardia and pigmentation so frequently seen amongst individuals at the menopause.

Yet Spender did not recognise that he was but observing the frequent occurrence of forms frustes of Graves's disease, about the time of the menopause, in women who are the subjects of chronic infective arthritis, due to pyorrhoea, to pelvic disorder, or what not. All these facts have received added interest from the work of Farrant, who has shown that certain infections do, under certain circumstances, indeed set up hyperplasia of precisely the nature found in exophthalmic goitre.

So far, then, as the ground has been traversed, we have found that, if the normal thyroid exercises a function in respect of nervous mechanisms, the endocrine balance, metabolism and defence, and if also the signs of the disease may be due to aberration or excess in the thyroid's action on these, we have grounds for believing that nervous derangement, disturbance of endocrine balance, metabolic perversity and infection or exogenous intoxication may be, and all be clinical antecedents of the disease. To say, then, that the hyperplastic and functional perversity of the thyroid in Graves's disease is often due to definite call on the energies of the organ in respect of one or more of its accustomed activities, or at least to provocation through one of the accustomed channels, seems almost unnecessary.

But is hyperthyroidism always thus produced? And why does what should be an orderly adjustment so often pass into a progressive disorder?

The first question can hardly be definitely answered save by an appeal to the a priori improbability of all allegations of primary or idiopathic disease and the investigation of individual cases.

The second question is less difficult of resolution. Certain diseases, such as Graves's disease, are obviously relevant; the first that, as Halsted has shown, an excess of iodothyrin in the blood leads to thyroid hyperplasia; the second, that such excess stimulates the cervical sympathetic; and the third, already mentioned, that the action of the cervical sympathetic in its turn leads to increased vascularity and secretory activity of the thyroid.

It is, then, pretty obvious that in many cases of progressive nature we may have to deal with the establishment of a vicious circle: initiated in one of the ways that have been stated; continued by the excess of iodothyrin poured out, and completed by the action, on the thyroid itself, of the nervous and endocrine structures thereafter involved.

But why are only some cases progressive, or "typical" as is said?

We may well believe that sometimes provocation ceases, that at others there is a favourable re-adjustment of the endocrine balance, that the circumstances of the patient's life may be ameliorated, and that, through the action of these factors that favour the closure of the vicious circle?

Two lines of thought opened up by recent work may perhaps help us in this respect.

It will be remembered that Eppinger and his co-adjutors have shown good grounds for believing that
while in health the due balance of function, in respect of the mechanisms controlled by the vegetative nervous system. The coordination between its autonomous and sympathetic components, yet, in states of ill-health, there may prevail either what is called vagotonia, or sympathicotonia.

Moreover, when vagotonia, or when sympathicotonia obtains, there is increased susceptibility to the action of vagotonic, or of sympathicotonic drugs.

Thyroid substance contains sympathicotonic ingredients, and, when sympathicotonia is pronounced the effect of its administration is heightened. It is also recorded that these opposed types of nervous balance represent, not merely states set up in disease, but kinds of constitution or of diathesis.

At any rate it is obvious that if experiment is to be trusted, a state of hyperthyroidism is more easily to be induced, and will sooner become vicious and progressive, in one who is markedly sympathicotonic than in one who is not. (As a matter of fact, the case is perhaps less simple, for Eppinger believes that some of the signs of Graves's disease are due to autonomic irritation. But the point remains that "hyperthyroidism" is more readily produced and continued in those who are the subject of a certain type of nervous balance than in others.)

The second line of thought to which I have referred leads from the little appreciated fact that in most, if not all, cases of exophthalmic goitre submitted to examination the thymus is found to be persistent or of greater size than usual. It may be that this is normally some physiological antagonism between the thymus and the thyroid, at any rate, at certain times of life; and that at other times and in other respects they may be complementary. It is, therefore, difficult to fully elucidate the connection between a persistent thymus and Graves's disease; but of the fact and its importance there is no question. It is true that in it some see the functional resurrection of a defunct organ to balance the vagaries of another. But others, since so many persons dying of exophthalmic goitre present signs of status thyrmico-lymphaticus, think that exophthalmic goitre is more prone to arise, given adequate occasion, in persons who are the subjects of persistent thymus, than in those who are not; perhaps because the vicious circle may close with greater readiness when there is a certain type of endocrine balance of developmental origin.

Indeed, the subjects of exophthalmic goitre are often those who display unusual physiological and morphological features, and some of the peculiarities so often associated with thyroid disease, and some of the symptoms of the disease are really indications of underlying imperfections in orthogenesis; and it is possible that there is a special correlation between types of nervous and endocrine balance.

If the summary which has been said, let me suggest that the thyroid functions are complex, and the secretion polyvalent; that the hyperthyroidism of Graves's disease may be provoked by agencies as various as are the functions of the organ; and that greater reliance may be put to aspects readily to those who by constitution, or by acquisition, possess a particular type of nervous or of endocrine balance.

If anyone is still determined to maintain the primary or essential thyroid origin of the disease, he should at least be prepared to say in what sense he uses the term. I believe that the secret of those cases that cannot fairly be ascribed to the operation of everyday factors, will be separately to be found hidden in those intricate processes of development that are responsible for so much that is misunderstood in the pathology of disease.

How far do these considerations assist us in developing our knowledge of the nature of the infection? It is, in the first place, surely obvious that the arbitrary division of treatment we find consecrated in the text-books, into medical and surgical categories, is both irrational and unsatisfactory, since the necessity for close cooperation between the surgeon and the physician is indeed imperative. It is true that some surgeons, knowing the definite and often successful results that attend their intervention, seem sometimes inclined to suggest that there is no medical treatment. But I would point out that they are not without justification in ridiculing the jejune and often fatuous recommendations that are sometimes made in medical writings.

But, though the art of medicine may be, as compared with surgery, little less than an imitative art, it seems to me that the surgeon who would make himself useful will not without justification in ridiculing the jejune and often fatuous recommendations that are sometimes made in medical writings. Furthermore, it would be, as compared with what is to be found in the medical journals of the day, a marked advance in the study of the disease. Experience shows us that unless a vicious circle has been established, good results follow the discovery and removal of continuing causes for excessive activity of the gland, and reason tells us that whether or no any such continuing cause—nervous, metabolic, endocrine, or infective—can be found, we must seek to oppose the ill-effects in the system of an excess of iodine, and, at the same time to check its further secretion.

Here is work enough for the physician, although often indeed these indications cannot be fulfilled without surgical aid. Two special cases may be mentioned: the first when the goitre sets up irritation of the sympathetic; the second when a goitrous nucleus stimulates the rest of the organ.

Other opportunities for surgical assistance are not few; colonic stasis may be the pecent participant, and, in the view of some recent writers, the removal of the thymus should be early planned. But, speaking generally, the modification of nervous balances, of metabolic and of endocrine irregularities fall to the lot of the physician, who cannot be denied some share, too, in the treatment by vaccines or otherwise of infections and intoxications.

It has long been attempted to oppose the effects, or some of the effects, of thyroid secretion in the blood by giving digitalis, a drug which in this connection has little save custom and prejudice to commend it. The giving of belladonna is hardly rational, and such good as it may do perhaps results from its inhibition of secretion. But in phystigmia we have a drug that in my experience controls tachycardia better than any other, and that appears generally helpful in the patient, and, so far as I have been able to judge, of benefit likewise, and so is iodide of potassium. It is true that the administration of iodine has been adversely canvassed, but Kocher gives the potassium salt, and we may have some respect for his experience.

Sir John Barr lands the calcium salts with that robustness that characterises all his speech, and perhaps they are not without their uses, and helpful in some degree.

But sodium phosphate is certainly of distinct, even if of inexplicable benefit; and both salicylates and urotropin often prove of service for obvious reasons.

The various sets, rodagen, and the like, are generally unsatisfactory, though the serum of Möbius is said to sometimes give good results.

If the glandular therapy is concerned, the administration of thyroid substance, on the plea of giving a tired organ a rest, is not to be commended; but mixed cases or cases in which myxedema is imminent may perhaps be in measure advantaged. Pheosin is, at any rate, of service, and the success that was hoped would be the case, and ovarian substance is unreliable. Occasionally, as at the menopause, I have known it help.

There are not wanting, too, symptomatic indications in certain and more rare cases. I admit that thyroid extract is far less useful than once was hoped would be the case, and ovarian substance is unreliable. Occasionally, as at the menopause, I have known it help.

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which attends the remarkable results of the administration of thymus substance, especially in slighter cases of the nervous type. That this substance sometimes brings about amelioration was first made known ten or twelve years ago, I think, by Mr. Owen, who found that a certain patient to whom a happy accident thymus substance had been given was promptly relieved. Reports are constantly occurring in various Continental papers of its value, but it seems to be little used in England. Personally I have given it in almost every case that I have seen during the last three years and always found the results of it to have been very promising. In fact, a patient, whose case I have already touched upon the occasion of his removal from Bedford.

ST. THOMAS'S HOSPITAL.

A CASE OF ARTHRECTOMY OF ANKLE.—Mr. EDWIN M. CORNER said that the patient was a young man with tuberculous disease of the ankle-joint. The radiographer reported that there was extensive disease in the astragalus, and advised operation. Dr. Owen, however, informed him that in addition there was disease of the sheaths of the tendons passing over the joint. The wrist-joints and the ankle-joints, Mr. Corner pointed out, were peculiar in that dissection of them affected the tendon-sheaths in the joints. The nature of the disease of the joints did not seem to matter. If it was gonorrhoeal or tuberculous the result was the same. Perhaps this was due to some communication between the joint and tendon-sheaths. The tendon-sheaths of the ankle-joint in adults was a serious condition, only too frequently resulting in amputation of the foot. In consequence of this serious prognosis, it was intended in this patient to do a very thorough arthrosection in the hope of staying off the need for an amputation. To do this he had devised a method of exposure of the ankle-joint which allowed the surgeon to do his work fully, as was about to be demonstrated on the patient.

A curved skin incision was then made with its concavity upward, reaching an inch and a half above the tip of the external malleolus. The incision, as could be seen is wholly on the outer side of the foot, and is, moreover, a very satisfactory one, as it allows a good blood supply to the flap, which comes off from the external calcaneal branches of the internal planter artery. This was the old catch in operative surgery for the blood supply of the external part of the heel flap in a Syme's amputation of the foot. The flap is dissected up and turned down. The two periosteal tendons, the longus and the brevis, are identified, manipulated from their groove on the back of the fibula. In case of failure of such precautions and perhaps with a piece of sterilised gauge placed over the front of the ankle-joint, the joint level is estimated and marked on the fibula, which is then divided with a saw or osteome into the ankle-joint. Then, with forceps and knife, the fascial structures in front of the ankle-joint are divided, exposing the outermost tendon, the extensor mimini digitii. Having done this, the foot can be levered and fully inverted so that it pivots on the internal malleolus and the sole looks towards the trunk. By this manoeuvre full and perfect exposure of the lower end of the tibia and of the astragalus is obtained. So far there is no other operation which gives such good exposure and allows the surgeon to do his work so thoroughly. For the purpose of division across the posterior part of the wound, it is here that they are actually divided. It is usually desirable to remove the astragalus in these cases, and it is best done behind. First, the periosteum has to be skeletonised from the pointed end of the bone upwards, till the line of junction between the astragalus and the calcaneum, into which slip the end of an elevator. With this instrument the joint surfaces are levered open so that a knife can enter the joint and divide the interosseous ligaments between the astragalus and the calcaneum. The joint can now be opened and the astragalus quickly prised from its anterior attachments. When the astragalus has been taken away all disease is now exposed to view in the calcaneum. So far that before the foot is reduced to good position again, the surgeon has had full opportunities to remove all traces of the disease. This displacement of the foot is now reduced, and it is seen that there are twenty fragments of the fibula are united with catgut. Owing to the anastomosis produced by the inverted foot having some analogies to that produced by Eschmacher's bandage, it is desirable to leave it for about twenty days. For closing the wound Mr. Corner advised interrupted mattress sutures of catgut aborting in ten days.

Mr. Corner then performed the operation he had described on wounds healed wonderfully well, and in a fortnight or so an asthmatic was given and the foot placed in plasters-of-Paris splints, which had or
had not a window over the wound as required. By these means the foot is retained in good position until that position can be retained by a light splint. Mr. Corner said that this method of exploring the ankle-joint required no division of the tendons, was comparatively simple, and gave the surgeon such good exposure that no excuse could remain on that score for the surgeon failing to make a “good job” of his work. The operation was also good for deformities, as the dislocation was worked to a primary diminution or peplusus. It allowed of removal of the astagias and as much of the calcaneum as was necessary to reduce the deformity.

CORRESPONDENCE.

FROM OUR SPECIAL CORRESPONDENTS AT HOME.

SCOTLAND.

EDINBURGH Rectoral Election.

As we have nowadays no party politics, the two party associations of Edinburgh students have decided to avoid a contest this year, and have been fortunate enough to secure the nomination of Lord Kitchener of the post of Lord Rector. Sir Edward Carson had been chosen as the Unionist, Sir John Simon as the Liberal Candidate, but both these gentlemen have written endorsing the action of their supporters. In his letter Sir John Simon says that it is “essential that someone should be selected whose name will be acceptable to both parties,” and the Attorney-General that “this is a time when controversy on such questions should as far as possible be avoided.” In his reply to the invitation to become Lord Rector, sent by the President of the Representative Council, the University Union, and the two political associations, Lord Kitchener wrote:—"I have been advised by the Medical Faculty that I will be so acceptable as to accept yourself, and convey to the other co-signatories of your letter of the 11th inst., my grateful acknowledgment of the high honour which the University of Edinburgh proposes to confer on me by inviting me to become its Lord Rector. I accept the invitation with great pleasure, and shall be proud thus to be associated with an university of which I am already an LL.D., and of whose students many have joined the profession to which I am privileged to belong.”

A SPECIALIST UPON THE KAISER.

Sir James Crichton-Browne has been addressing a public meeting at Kirkint, near Dumfries, in connection with recruiting. He said the causes of the war were to be found in the chauvinism of a Kaiser, in an arrogant and brutal military caste, and in a generation of Germans who had grown up since the Franco-German War of 1870 with an overweening conceit of their own superiority, and perhaps the Kaiser was crazy and wicked too. As a London paper said the other day, his bragart character might be inferred from his moustache. The Kaiser was a cripple and diseased, and he spoke with his German medical authority when he said so. He was so diseased that no Army Medical Officer would pass him for service as a common soldier in the ranks, and yet he was allowed to direct huge armies in the field and to control the destinies of millions of innocent women.

WE WANTED IN GLASGOW.

The first considerable arrival of wounded soldiers in Glasgow took place on the 21st inst., when 200 arrived to undergo treatment at Stobhill Military Hospital, Springburn. Early in the morning two trains arrived from Southern military camps, and the work of conveying them from the station to the hospital was carried out expeditiously, the ambulance officials having wagons and stretchers in readiness. A number of the soldiers appeared to be suffering severely, but the long journey was not yet displayed in their demeanour. The wounded were conveyed to the various wards, where they were attended by a large staff of doctors and nurses. The military authorities are preserving strict secrecy regarding the men. Although it is not publicly known, it is believed that several of the soldiers were attached to the Highland regiments.

THE NURSING AT STOBHILL.

The nursing at this hospital is under the auspices of the Territorial Nursing Association. Of four military hospitals under the auspices of the Association in Scotland, Stobhill is the only one in Edinburgh. There are eleven ladies connected with the branch in Glasgow, of which Lady Chisholm is Convener. The hospitals have been thoroughly equipped by the Government, and are in full working order. The two hospitals at Stobhill are quite separate and each has a staff of 120 nurses. Ten nurses in each hospital have volunteered for the front. One of the hospitals is under the direction of Miss Melrose, Rector of the Royal Infirmary, the Matron in Charge being Miss Thomson; while the other is under the direction of Miss Gregory Smith, Matron of the Western Infirmary, the Matron in Charge being Miss Miller.

RED CROSS HOSPITAL AT ROUEN.

The Executive of the Scottish Branch of the Red Cross Society having been informed that the Red Cross Hospital of which they had been asked to supply a section is to be formed at Rouen instead of Paris, arrangements have been made for the despatch of the Scottish section in the course of this week. The Central Executive of the Society in London has authorised the appointment of a sub-delegate to represent the Scottish Branch and to work under the direction of Sir John Simon, Rector of the Royal Infirmary. Dr. Charles Walker has been despatched by the Scottish Executive to make preliminary arrangements, and he is now at Rouen, where his time is occupied in discussing quarter for the beds of the Scottish section. It is anticipated that before the end of the week the Scottish flag, which went through the Balkan War with the Scottish Red Cross Hospital, will be flying over the roofs of Rouen.

RED CROSS ORDERLES.

Five orderlies from Glasgow on the 13th inst. for the seat of war. They were busily engaged last week in the rear of the battle line on the Aisne. Under the direction of Dr. Stewart they scour the country in motor cars with the object of tracing and bringing in wounded and stragglers, many of whom are isolated in villages and farms. Before leaving London the party was inspected by Sir Frederick Treves.

LETTERS TO THE EDITOR.

[We do not hold ourselves responsible for the opinions expressed by our Correspondents.]

FORCIBLE FEEDING.

To the Editor of The Medical Press and Circular.

Sir,—If it is true that Sir Victor Horsley makes the unwarrantable and, to employ his own word, “baseless” statement as follows: "Had he [i.e., myself] read Hansard, as I suggested he should, he would not have repeated the absurdly false statement that the Cat and Mouse Act had succeeded so far, as a matter of fact, I have not hitherto presumed to express any opinion on the merits of this Act; how therefore can he say I have repeated a statement I never made? I am at a loss to understand. It is true that I refered to the Home Secretary's speech, respecting which I said the Home Secretary "attempted to demonstrate certain figures, . . . there had been a considerable reduction of crime," etc., etc., and I hinted that that might well be, meaning that before the passing of the Act criminals were let off free; but this is totally different from admitting the success of the Act. On the other hand, the Home Secretary's statistics confirmed me that whatever effect they had on others, the Act had proved incompairably a greater failure than success; so Sir Victor and I
CORRESPONDENCE.

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FRADULENT QUACKERY AND THE ETHICS OF JOURNALISM.

To the Editor of THE MEDICAL PRESS and Circular.

SIR,—In my last letter under the above heading I quoted the Report of the Select Committee where it deals with newspapers. The Report suggests that "the extent to which criticism is excluded from the pages of medical papers, because of the fear thereby take the trouble to see how much attention is bestowed by the newspapers upon your Committee's Report." I have taken the trouble the Report asks for, and the observations of my friends and myself lead us, after perusing the whole, to the conclusion that the quack papers, to the conclusion that the Report has been virtually ignored by the vast majority of them from the leaders downwards. The Times printed a clear, 5 Minute, article, written, of course, at the public's expense. There can be no doubt that the case against fraudulent quackery has been established irrefutably; the extent and the cruelty of it have been demonstrated beyond dispute, whilst it has been made plain that the greater part of the evil can be got away with by extremely simple legislation. Any injury upon legitimate proprietary preparations can be guarded against, but the sale of fraudulent concoctions can be entirely prevented. We have nothing to fear from quacks in a fight to a finish; they cannot, they dare not, speak in their own defence; not many out of the crowd would dare to go into the witness box. The only possible opposition is that which might come from the papers that had been too long in the same game. We are now dividing among them more than £2,000,000 from quack nostrum advertisements alone. This, as the Report, p. 10 states, "does not include the advertisements of swindlers, like Macaura, the eye leaf quack, the lead quacks, the cures, consumption curers, electric belt makers, the curers of rupture without operation, and fakers generally." Besides these, there exist vast numbers of bogus institutions, of schools, of many varieties. All these rogues advertise, so that £2,000,000 falls short of the total receipts of newspapers from fraudulent advertisements. The high-class papers take the bulk of this vast sum, from £5,000 to not much less than £6,000 a year, and they, or their representatives, allow the quacks to conduct that forms the unanswerable excuse for all papers of a lower rank. These, when challenged, invariably reply, "We are business undertakings; we feel we have no right to deprive our shareholders of profits derived from advertisements such as are to be found in the majority of leading papers, including most of those that set themselves up as especially the enemies of every species of humbug and fraud." And our papers really not only assume the role just named, but they all proclaim themselves the guardians of the national honour and protectors of the people, especially of the poor and ignorant. Some papers base themselves also on piety and religion, and the columns of these are the most crowded with advertisements of fraudulently quack medicines. The question how to put an end to this—one of the greatest scandals of the day—to compel or persuade a great body of men who, jealous of their honour, are making their living or amassing wealth by participating in the gains of the most cynical, cruel and callous band of the army of malefactors that still hangs on to the back of modern society. We must persuade them or compel them to accept the trust that persuasion may suffice, otherwise we have left a powerful instrument of coercion in the evidence given before the Committee. To me was given the chief share in describing the paper with the most reports to the Committee, and the evidence given in various directions on the same subject in the course of testimony by various witnesses. This would form a document which might be, or may say certainly would be, distributed to the public so as to bring the shame of those who assumed a defiant attitude. Our powers of attacking such papers would not be to any degree exhausted by the measures I suggest. I may discuss this matter further in future letters.

I am, Sir, yours truly,

Clement H. S.

September 20th, 1914.

5, Chancetown Road, Hove.

FRAUDULENT QUACKERY AND THE ETHICS OF JOURNALISM.

To the Editor of THE MEDICAL PRESS and Circular.

SIR,—In my last letter under the above heading I agree on this point, although for different reasons. But these considerations afford no reason whatever why the Government, after having passed the Act—one which to all intents and purposes has become definitively inoperative in granting free pardons, and which empowers them to overrule any criminal conviction they think meet—a power too great to invest in any Government or individual, and the danger of which is so great that it is inadvisable, and, as I am told has happened; I say all this affords no reason whatever why the Government should not endeavour to render their Act a success as far as possible, which they might do by resorting more frequently to prison feeding, to enable a prisoner, by escape from prison through "attempts at suicide," whereas now the Act is all but a dead letter, leaving in the state of inertia as concerns suffragists' crimes, and as the Home Secretary refuses to regard these crimes as political, why does he not consistently treat these prisoners as ordinary prisoners?

With regard to the "torture" of forcible feeding, evidently a favourable expression of Sir Victor's and one which he harps so much upon, I might mention that an article appeared in the Daily Mail so long back as March 27th, 1913, under the heartrending headline "Torture That Must Be Stopped," and thinking that the writer of this article must be the same as that of the general public would also be misled, I addressed a letter to the editor of that paper, which paper, he kindly inserted, suggesting that the expression "forcible feeding was a misnomer, and that as the medical staff of prisons would, if desired, be legally adequate, because, as I pointed out, no force was necessary except to resist counter force, and that if prisoners suffered on that account they had themselves only to blame.

This, it reminds me of the absurd nickname "Cat and Mouse Act," as though everybody doesn't recognize that in nature the mouse which is exposed to real physical torture is not a free agent, whereas the patient suffering from a disease of the brain or suffering from exclusion of another than the physical torture other than self-indicte, and even then there is no analogy as they would have us believe. I note in a lexicon I consulted, "torture," amongst other definitions, is described as "anguish of body or mind," and no doubt there is some mental torture which is inseparable from prison life.

As to Sir Victor Horsley's comparison between the non-enfranchisement of women and ordinary disease which he still maintains, as I understand him, he regards the non-enfranchisement of women as the disease and the violence of militants as merely the outcome or symptoms, and he suggests curing the disease by granting the vote, any opposition to which he thinks a resistance to "political evolution." This, I presume, is the political phase of the question, and not a medico-legal one. However, taking him on his own ground, does he really and seriously locate the disease in the disenfranchisement of women or in their nervous organisation or brain, because I venture to think, if I may presume, that granting the vote and the political excitement in the exercise thereof was a far more prolific cause of mental disturbance than patients of women, and possibly this accounts for the great misfortunes of women not wanting it. On the other hand, for aught we know, the cure not having taken place in accordance with Sir Victor's theory, "nerve storms," or other conditions of their own are to lead more to their being driven to the campaign for seats in Parliament. Would Sir Victor still hold that opposing this was opposing "political evolution"? If not, why not then as now, and in the event that, whatever be his views, he would like to experiment the abominations and "torture" of forcible feeding, and if not, why not, as hitherto?

I am, Sir, yours truly,

Clement H. S.

September 25th, 1914.

The Old Rosery,

Earlswood Common. September 26th, 1914.
OBITUARY.

DR. L. C. PEEI-RITCHIE, EDINBURGH.

The death on September 24th, in tragic circumstances, of Dr. L. C. Peel-Ritchie has caused great regret. He was the son of the late Dr. Robert Peel-Ritchie, who at one time was President of the Royal College of Physicians, and was the author of the History of the College. Dr. Ritchie was an Assistant Surgeon to the Royal Infirmary, and had specialised on the lines of surgical pathology and bacteriology. He had been trained at Edinburgh, Berlin, Berne, Freiberg, Lausanne and Vienna, and had contributed a number of papers on the use of tuberculin, vaccines, and more purely surgical subjects. He was a Surgeon to the Western Dispensary, and an Examiner in Pathology to the Royal College of Surgeons. His motor launch was one of his chief hobbies, but it is reliably sad that his untimely death should have been brought about in connection with his principal recreation.

DR. CHARLES STEELE, OF CLIFTON.

We regret to record the death of Dr. Charles Steele, M.D., F.R.C.S., which took place on the 20th inst., at his residence, Clifton Villa, Richmond Hill, Clifton, at the age of 70. The deceased, who qualified as M.R.C.S. in 1860, became M.D. in 1868. He had retired from active practice about six years ago. Dr. Steele was a native of Macclesfield, Derbyshire, and was the son of the Rev. John Steele, incumbent of St. John's Church in that town. After holding several appointments away from Bristol, Dr. Steele commenced practice at Meridian Place, Clifton, but soon removed to Richmond Hill, where he built up a very extensive practice. He was a Consulting Surgeon to the Children's Hospital, St. Michael's Hill, and of the Bristol Royal Infirmary, and a Brother of the Guild of St. Luke. For some years Dr. Steele was a director of Holders and Company, and Medical Officer to the Law, Union, and Rock Insurance Company. He was an inventor of flexible probes, chair supports for spinal curvature, and steel spring splints, and the author of numerous scientific papers in the medical journals. He leaves a widow and five children—four daughters and one son—to mourn his loss.

LITERARY NOTES.

Mr. G. Bernard Shaw’s "The Doctor’s Dilemma" has reached us in a sixpenny edition (Constable and Co.). We confess that a re-usage of the work, including the preface, is disappointing. Mr. Shaw’s inexorable logic of inference loses its force when one recognises how deficient in accuracy are his premises. Like so many Socialists, he places self-interest dominantly among human motives. Nevertheless, even if one thinks little of Mr. Shaw’s convincing power as a controversialist discussing matters he knows little about, no one can read his play without enjoying his satirical gifts. He hits off with marvellous skill the foibles and mannerisms of the various types of doctors. His shafts are keen, but they are delivered with a not unkindly laugh.

M. Bouclerle, Director of the Anti-Tuberculous Preventorium of the Boulevard Garibaldi, Paris, has been so good as to send us a pamphlet he has written dealing with the use of Vallée’s anti-tuberculous serum. Dr. Bouclerle has also been so good as to forward us a review of this pamphlet, with a request that we should insert it in our columns. We have to refuse for two reasons—first, our reviews are intended to express the opinion of competent critics on works submitted to us, and not the opinion of the author on his own work, and, secondly, the review is written neither in French nor in English, but in an unhappy blend of both. As we are not invited ourselves to review the pamphlet, our task is ended in acknowledging its receipt.

MEDICAL NEWS AND PASS LISTS.

National Maternity Hospital, Dublin.

The following information reached us too late for insertion in our Educational Number:

The hospital, which is situated in a densely populated district, consists of lying-in wards, wards for gynaecological cases, an antenatal ward for expectant mothers, facilities for the treatment of diseases peculiar to women, which is open daily. The number of patients attending the hospital is rapidly increasing. Facilities are given to students for obtaining a practical knowledge of this branch of the profession, and they are admitted to the practice of all the departments. Resident Pupils and a Clinical Clerk are elected from the students attending. The Certificates of attendance upon the Hospital are recognised by the Licensing Bodies.

Terms of attendance—Pupils: Board, 18s. per week; six months, 6 guineas; three months, 4 guineas; shorter courses and post-graduate courses by special arrangement.

For further particulars apply to the Masters—Dr. A. J. Horne, 94 Merrion Square; Dr. R. J. White, 39 Lower Baggot Street, c/o at the Hospital.

Dublin Skin, Cancer and Urinary Hospital, Hume Street, Dublin.

The hospital was opened in July, 1911 (in succession to the late City Hospital for Diseases of the Skin and Cancer). It offers treatment for the removal and cure of diseases of the skin and cancer and of the kidney and associated organs.

In connection with the skin and cancer department there is an electro-therapeutic department, comprising the following apparatus:—Finsen and lupus lamps, X-rays, high-frequency, electrolysis (for ionic medication, etc.), galvanism, radium, and quartz lamp.

There are twelve wards, with accommodation for about 140 patients, and an external department, where over 2,000 patients were registered for the year (1913-1914). Clinical instruction in the wards and the out-patient department is given every morning from 11 a.m., when the attendances of practitioners and senior students is invited.

Post-graduate courses have been arranged for medical practitioners and senior students, full particulars of which can be obtained from Andrew Charles, F.R.C.S., 64 Harcourt Street, Dublin.

"Canada’s Gift": A Suggestion for the Prince’s Fund.

Canada is making a splendid gift of flour to the Mother Country. It has been decided that the sacks, when empty, should be sold as souvenirs at 5s. each. Two-thirds of this sum will be devoted to the Prince of Wales’s National Relief Fund, and one-third to the Irish Church Missions Fund. This does not include "Canada’s Gift." Applications for the sacks as souvenirs, accompanied by a remittance of 5s., should be sent to the Hon. Secretaries, National Relief Fund, York House, St. James’s Palace, London, S.W. Applications will be dealt with in strict rotation.

The British Pharmacopoeia.

The Executive Committee of the General Medical Council has received a report by the Registrar on the postponement of publication of the British Pharmacopoeia, 1914. It was resolved, on behalf of the Council, that advance copies should be made available to the Council for inspection, for insertion in the Report of the Council in London, Edinburgh, and Dublin on Thursday, October 1st, at 10 a.m., and thereafter from 10 a.m. to 4 p.m. daily. The official publication of the
work will be made by notices in the Gazette on December 31st.

The Final Examination of the Conjoint Board of England.

At a special meeting of the Council of the Royal College of Surgeons held last week the following candidates who have passed the special war examination were admitted members of the College, and at a meeting of the Royal College of Physicians of London on the following week had licences to practise physic granted to them:


St. Mary’s Hospital Medical School (University of London)—Entrance Scholarships for 1914.

At the examination held on September 21st and 22nd, the following awards were made:


University Exhibition.—R. A. Woodhouse.

Examination College Scholarship by nomination.—R. W. Walker.

Army Medical Service.


WAR REFUGEES.

The following Memorandum of Information has been issued by the Local Government Board for the guidance of local committees formed to arrange for hospitality to Belgian refugees, some 6,000 of whom have already been provided with accommodation in various parts of the country.

(1) All towns or districts which are included in the list of "prohibited areas" in the Second Schedule of the Order in Council of September 6th, are unsuitable for the reception of refugees in large numbers. It is therefore, undesirable that local committees should be formed in these areas without the approval of the local police.

(2) As soon as a committee is formed offers of hospitality should be obtained from residents within the district, and the War Refugees Committee, General Buildings, Aldwych, W.C., should be informed of the number of families which can be accommodated.

(3) The refuge committee in any town should be the local committee in the town, and should be formed by the local committee, and each group is almost invariably accompanied by at least one man. There have been hardly any boys or girls unaccompanied by elderly relations. Offers of hospitality, therefore, cannot be accepted, and each group should include accommodation for men.

(4) Families should be housed as far as possible in the same house, and where this cannot be arranged, they should at least be housed in the same street or village.

(5) The refugees are mostly of the peasant and tradesman class, and very few can speak anything but French or Flemish. A committee should be responsible for selecting a representative of the Local Committee.

(6) The railway fares of the refugees from London to the local centres will be paid by the Government, and the Local Committee will be advised by telegram of the train by which the refugees will arrive, and of the number of men, women and children in each party. They must be met on arrival at the station by a representative of the Local Committee.

(7) The guard of the train by which the refugees travel will be British, and each individual will bear a label on which is written his name and the name of the station to which he is travelling.

(8) If the number arriving by any particular train is small, they can probably be allocated at once to the homes destined for them, in which case conveyances should be waiting for them at the station.

(9) If the number is large, or the distance from the station to the homes is great, arrangements should be made to house and feed them temporarily at a local depot pending allocation. It is important that all the families should be kept together at the depot.

(10) Local committees will be responsible for the refugees after they have arrived at the station. In their reception, therefore, must be previously inspected by some member of the Committee, and satisfactory evidence obtained that they are of a desirable character.

(11) The refugees have been medically examined before leaving Belgium, and have also been passed by the Medical Officer at the port of landing. Provision should be made by the Local Committee for medical attention at the place of reception.

(12) A local register must be kept of all refugees received so that each family or member of a family can be traced at any moment, and the War Refugees Committee in London should be informed of the arrival of a family and of their subsequent changes of address. The register should be available locally for the Medical Officer of Health.

(13) Arrangements should be made for the refugees to be visited at frequent intervals by persons who can speak French or Flemish.
Artificial Pneumothorax.—Lyon (Boston Med. and Surg. Jour., August 27th, 1914) records his experience with the therapeutic value of artificial pneumothorax in the treatment of pulmonary tuberculosis. He concludes that it gives the best results in cases of unilateral pulmonary tuberculosis in which palpable adhesions have not formed. Its application should not, however, be confined to these patients, for if it were its usefulness would be extremely limited. Patients with bilateral disease, in whom the active disease in the untreated side is limited to the apex, will, in many instances, show satisfactory improvement after being subjected to this treatment. When the treatment is resorted to in patients in whom the active disease has extended beyond this point in the untreated side, the results are frequently unsatisfactory. The replacing of a tuberculous pleural effusion by sterile nitrogen gas will prevent the formation of pleural adhesions and will prevent the re-accumulation of the fluid. Dr. Lyon believes that artificial pneumothorax therapy is applicable to a very limited number of patients with advanced pulmonary tuberculosis, and that the best results will follow its careful administration to those patients in whom moderately advanced disease alone has failed after a real blood must be restored to respond to the older and better known forms of treatment.

K.

Transfusion in the Treatment of Haemorrhages of the New Born.—Lespinasse (Journ. Amer. Med. Assoc., June 13th, 1914) points out that there are three main indications for this form of treatment in the hemorrhages of the young children: (1) The bleeding must be stopped; (2) the form of the blood must be restored; (3) the infection, which is often the cause of the bleeding, must be overcome. He believes that the direct transfusion of live non-clotted blood best fulfills these indications. In support of his contention he reports fifteen cases in which this treatment was adopted and was followed by satisfactory results. The children treated varied in age from ten hours to seven days, and all recovered except two, both of whom had severe congenital syphilis. In ten of the cases the donor of the blood was the child's father, in one the mother's half-sister, and in the others a non-relative. The duration of the transfusion varied from five to fifteen minutes. In the case that took fifteen minutes the donor of the blood, the father, fainted, thus reducing his blood-pressure so low that it took longer to fill the baby with blood. Dr. Lespinasse concludes that "direct transfusion of blood stops the bleeding, restores the lost blood, and aids in overcoming the infection. Direct transfusion has cured where all other methods have failed. Transfusion should be used early, but so long as there is a spark of life it is never too late to transfuse." K.

Syphilis of the Liver.—Cheney (Amer. Jour. of the Med. Sciences, August, 1914) records several cases of syphilis of the liver that closely resembled cirrhosis and from this experience draws the following conclusions:—(1) In any case that appears to be cirrhosis of the liver, judging from clinical history and physical signs, the blood should always be examined for syphilis, whether a serologically negative. Any vigorous specific treatment will often produce marvelous improvement not to be expected in any other way; but even when the reaction is positive the liver disease may not be far away, and so specific therapy may prove of no avail; yet at the same time the therapeutic test will have given valuable information and have done no harm. (2) There is no certain way to tell which case of hepatic cirrhosis is luetic and which is not, except by the blood test, for previous history of infection or other manifestations of syphilis, as well as stigma produced elsewhere in the body by the disease, may all be lacking absolutely, while there may be nothing about the condition of the liver on physical examination, or the symptoms it produces to determine the aetiology or to distinguish ordinary portal cirrhosis from luetic. (3) Syphilitic cirrhosis of the liver is a common disease, which has been forgotten in the differential diagnosis of any cases where symptoms and signs point to the liver as the organ involved.

Displacements of the Genital Canal.—Bonney (Jour. Obst. and Gyn. Brit. Emp., xxv. 6), considers the aetiology of the condition and divides the supports of the uterus into three groups, any one of which may cause complete or partial failure in one group may be combined with failure of one of the others, or all three be at fault. Thus seven different causes or combinations may be found, and each produces its own particular variety of displacement. Each class of displacement requires to be treated in the manner which will rectify the groups of supports at fault, either by restoration of the parts or their functions, or by substituting some other substance for them. The whole matter is often complicated by the fact that the puerperal patient cannot be allowed to remain free from infection. The usual seat of formation of purulent discharges is the lower genital tract,—i.e., cervix, vagina, vulva. Indications for treatment are improvement of general health; avoidance of treatment which is not indicated, such as doucheing and plunging; arrest of excessive mucus from the cervix, and curative by vaccine and powders applied to the vagina after careful drying.

Placenta Pravda and its Treatment.—Nogel (Surg., Obst. and Gyn., xix. 1) reports fifty cases treated personally at home in connection with the Royal Charité at Berlin. He strongly advocates Baxton Hicks' method as being the best at the moment of the practitioner and meeting the requirements in most cases. He claims that asepsis can be carried out in spite of primitive conditions, and condemns the advice that in urgent cases disinfection should be disregarded and the operation gone on with. In urgent cases there is always time for disinfection, and that can be shortened and always should be assisted by the use of rubber gloves. The paper is interesting as coming from the German side, but the evidence is powerful in support of strong advocacy for operative treatment, such as Cesarean section in placenta pravda, which is being made all over the Continent and America.

Pulmonary Extract in Labour.—Madill and Allan (Surg., Obst. and Gyn., xix. 2) record a study of 147 cases in the Rotunda Hospital, Dublin. The dose used in all cases was not less than .2 gm. of the extract. This is believed to produce better results than two
NOTICES TO CORRESPONDENTS.

MEDICAL WAR ITEMS.

It is reported that at least four Medical Inspectors of the Local Government Board—Dr. R. J. Reece, Dr. S. Monckton Copeman, F.R.S., Dr. T. Carnwath, and Dr. J. M. Hamilton—are in the colonies.

The English Convent at Bruges has been converted into a hospital for wounded soldiers. Seventy beds have been set up there, and these have been in constant use. A British surgeon, Mr. Samuel Osborn, assisted by three house surgeons (Messrs. Cook, Forrest Smith, and T. Cressy, and the Hon. Miss Colborne, Miss Baines, and Miss Judith Osborn) have attended the wounded soldiers with, says La Patric, “a zeal and a devotion beyond all praise,” and have attended to the wounded at Gembloos at the rate of 120 a day and then gave way to the German doctors, who, in acknowledgment, packed him and his staff off to Liege in a wagon drawn by oxen.

The residence of Mr. R. E. Bush, of Bishop's Knoll, Stoke-on-Trent, has been offered by him to the War Office as a hospital for wounded soldiers. The offer has been accepted, and the building is officially described as a “supplementary hospital to the Second Southern General Hospital,” which is the Royal Infirmary, Bristol. Dr. J. A. Osborn is the Medical Officer in Charge, and Mr. A. Rendle Short is the Chief Surgeon.

The British Red Cross Society has now been authorized by the War Office to send out to Paris 20 surgeons, 150 nurses, and a proportionate number of orderlies. The Society is making arrangements for their dispatch at once. Authority has also been given at the same time to the Red Cross Society to dispatch 20 motor ambulances. The Society is arranging this in conjunction with the Royal Automobile Club, and it is expected they will be delivered in Paris in less than 14 days.

STORY OF THE SURGEON OF THE LATE H.M.S. CREASY.

Dr. Gerald Noel Martin, Temporary Surgeon on the Creasy (says the Daily News), was two and a half hours in the water after the cruiser went down, and he suffered severely from exposure after he was rescued. Dr. Martin, whose father was a well-known medical practitioner in Sheffield, is Surgeon at the Sussex County Hospital at Brighton. When the war broke out he volunteered for active service, and was appointed to the Creasy.

“Captain Johnson,” he said, “was in command of the ship. When I last saw him he was in the water, and even then he was thinking of others. I heard him instructing the men to keep their mouths closed and breathe through their noses. Those who could not swim and were clinging to the wreckage he counselled to keep their legs in motion so as to avoid losing warmth. Knowing that the padre (the Rev. J. H. Collier) could not swim, he asked him to jump into the lifeboat and towards him it before he got into the water. Afterwards he shared it with Staff-Surgeon Sawdy. The two officers held on to the sides of the lifeboat and managed each a pair of legs. The sea was choppy and the waves about ten feet high. It was very favourable for the operations of submarines. Last week we were having rough weather submarines would have been quite useless. Owing to the state of the sea it was difficult for a practised eye, and impossible for an unpractised eye, to discern the periscope of a submarine. I cannot profess to have seen a submarine, but when a gunner fired at a submarine and the shell burst I saw two men come to the top of the mast and over the submarine, and another man was watching them through my glass. The general impression on the Creasy was that there was more than one submarine, that there were probably three, and that one was sunk by our fire.

“After a mile away to the right,” said Dr. Martin, “there was a fishing smack flying no flag. As she made no attempt to get near us, we was considered to be acting in concert with the submarines; we fired at her and sank her. I don’t think. A submarine was seen by our gunner, and he fired at her; but he was hampered by the fact that the men of the Alexander and the Hogue were swimming about close by. The belief that there was no more than one submarine is strengthened by the fact that through the periscopes there was a signal notifying that three submarines were coming south.”

NOTICES TO CORRESPONDENTS, &c.

Correspondents requiring a reply in this column are particularly requested to make us of a Distinctive Signature—your name and initial—when addressing themselves "Reader," "Subscriber," "Old Subscriber," &c. Much confusion will be avoided by attention to this rule.

SUBSCRIPTIONS.

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J. M. HAMILTON.

Secretary.

DR. J. A. OSBORN.—For One Insertion—Whole Page, 25s.; Half Page, 12½s.; Quarter Page, 5s.; One-eighth, 1s. 6d. The following reductions are made: Post free at home or abroad. For Ireland, half price. For India and Colonial States, 50 per cent. Add 10 per cent. for insertion in the Lancet; 15 per cent. for the British Medical Journal; 20 per cent. for the Medical Times and Gazette; 30 per cent. for British Medical News. All unrequired copies to be returned on delivery.

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in Moorgate M... lectures about, this Euniskillen Dr. Hnlme'Drsplany. Nobth-East more which to be carried out. The Royal Sanitary Institute considered several suggestions for applying the organisation to civil and military conditions arising out, but this appears to be a natural way in which this could be done.

PUBLIC SCHOOL VOLUNTEER.—From your description you appear to have the right kind of service for the front. It should be remembered, however, that the coxs are hardly less important for the comfort and efficiency of the soldier on the field. The allowance should be undreamt, for nothing causes a painful bluster more quickly than drips. The best material and methods are not absolutely up to the mark of the front, and this should be taken into account carefully. Personally the writer has never met with the men who have not been prepared for marching parties. The men who have served so long be professional voluntary workers. Another important point is to make absolutely sure, by personal examination or preferably by an observer, that there is no likely to be free from the issue. We shall be glad to answer any other questions you may care to put to us.

Mr. T.-Our correspondent might apply to the resident physician at Brooke House, Clapton, N.E., for particulars as to the admission of the case in which he is interested.

Meetings of the Societies, Lectures, &c.

TUESDAY, OCTOBER 1st.

NORTH-EAST LONDON CLINICAL SOCIETY (Prince of Wales' Hospital, Torquay, N.E.)—4:15 p.m.: Opening address by Dr. John Collie, M.D., Sec. of the Society. Dr. Baldwin, M.D., Arts, has been appointed Secretary for the year. The house is large and commodious, and the evening is to be devoted to the examination of the various appointments of the Society. There will be a meeting of the Society at 8:30 p.m.

ROYAL COUNTY OF ESSEX SURGEON.—The Chairman presided at a meeting of the Society, which was attended by a large number of members.

Vacancies.

Emmanuel Union Dispensary.—District Medical Officer. Salary £125 per annum, with £1 a year as Medical Officer of Health. Salary £100 per annum and Vegetables. Applications to Dr. Richmond, 5, Clopton Avenue, London, N.W.

Voluntary Hospitals and the War.

The question of the allotment of special beds in hospitals to the wounded in the war is important, affecting, as it does, the ultimate relations of the public to the voluntary medical charities. It is, of course, readily understandable that the hospital authorities, in the universal desire to help in the great crisis which has been thrust upon the nation with so much dramatic force and fury. It is necessary, however, to temper enthusiasm with wisdom; otherwise the community may have to foot unnecessarily heavy bills in the long run. It is in a spirit of kindly criticism, therefore, that one applies a little friendly analysis to the precise significance of the action. First of all, as regards the War Office, it may be assumed that in no previous British war has the organisation of the Army Medical Department reached so high a pitch. The lessons of the Boer War at the beginning of the present century have taken deep root, and the United Kingdom is covered with a network of military hospitals, adequately equipped and fitted for the purpose of base hospitals for the wounded who are brought across the Channel. For this organisation Government funds are practically unlimited, but so vast are the operations of the Continental war that in many instances the War Office has accepted the offer of specially allotted beds for soldiers in the largest voluntary hospitals.

Why Earmark the Beds?

It goes without saying that in our civil hospitals the wounded would have the benefit of the highest medical and surgical skill obtainable, as well as of expert nursing, but much the same remark should apply to the Army hospitals at home, founded as they are in a country which is not exposed to the harassing conditions of actual conflict, and where funds are forthcoming to any reasonable extent. Why should not the military hospitals those long established and those added to meet the emergency, be enabled to cope with the sick and wounded from the front? If the War Office is compelled to resort to the voluntary hospitals, why should a large proportion of the latter be earmarked for the soldiers? In accepting the offer the military authorities, we understand, attempted to enforce as a general condition that their men should be attended by Army orderlies instead of by the regular hospital nurses. This somewhat grotesque suggestion shows how hard tradition dies in Government administration. It was very properly rescued by one, at least, of the great London hospitals, which promptly withdrew its offer.

Is any Distinction Necessary?

The question is sure to be asked sooner or later by what right the hospital authorities allot a proportion of their beds for a privileged class of patients. If there were no proper accommodation for the sick and wounded soldiers it would be indeed a graceless act to throw any obstacle in the way of getting them into our voluntary institutions. It can hardly be gainsaid that the temporary withdrawal of a large aggregate of available beds from the hospitals must be at the expense of the civil population, for whose relief and succour they were founded. Nor is it clear why any such special allocation of beds should be made for the sick and wounded. If the military authorities find they have not sufficient accommodation it would be no difficult matter to apply to the nearest general hospital for admission of one or two patients, a request which would doubtless secure a warm and ready response. That is a very different matter from restricting a considerable proportion of beds to a specific purpose at the expense of the ordinary civil population, whose needs in the matter are not likely to be decreased by the effects of the war. Lastly, it may be assured that the more serious cases will be treated in hospitals abroad, and that only those who seem able to withstand the journey will be brought across the Channel.

Bengal Medical Men and the War.

The landing of a large contingent of Indian troops in France to serve with the Allies is a splendid illustration of the loyalty and solidarity of our great Indian Empire, in common with all our Colonies, at the present crisis. The medical profession of India have shown the same spirit of self-sacrifice and devotion that has characterised their brethren in the West, for at a representative meeting held not long since under the chairmanship of Dr. S. K. Mullick, says the Indian Daily News, the following resolutions were adopted:—(1) That the Bengal medical profession in public meeting assembled beg to tender His Excellency the Governor and through him to the Viceroy and the King Emperor, the expression of their heartfelt loyalty at this critical juncture; (2) that it be resolved to enlist names for the formation of an unofficial medical corps and to place the same at the disposal of Government for service at home or abroad; (3) that it be recommended to the medical profession to attend at reduced fees such people as have been thrown out of employment as the result of the war; and (4) that an appeal be made to the nation for equipping a hospital ship and the same be placed at the disposal of the authorities.” Patriotism, like science, knows no distinction of race or clime.

The Medical Roll of Honour.

Since our last issue the following names figure in the lists of casualties published by the War Office:—

Officers KILLED: Lieut. W. O. W. Ball, R.A.M.C.; Lieut. J. Crocket, R.A.M.C.; Officer wounded: Lieut. R. A. Flood, R.A.M.C. Officer previously reported missing,
now reported wounded: Capt. C. T. Edmunds, R.A.M.C. The following three officers previously reported missing have now rejoined: Lieut. J. H. Bell, R.A.M.C., Capt. H. C. Hildreth, R.A.M.C., and Lieut. F. L. Tulloch, R.A.M.C.

LEADING ARTICLES.

THE TREATMENT OF CANCER BY UNQUALIFIED PERSONS.

That the treatment of disease by persons who are medically unqualified constitutes a grave public danger must be apparent to all candid observers who have paid any attention to the matter. To impose stringent regulations as to training and legal qualification upon the legitimate practice of the medical art, and, at the same time, to permit all and sundry to treat any and every malady under the sun without State guarantee is to adopt a grotesquely illogical attitude. The British law as regards medical practice has been slowly built up during the past four hundred years. Its present administration is a monument of inconsistency, feebleness and inefficiency, lacking authority to press for test cases and machinery for prosecution. The result is that any person of ordinary intelligence need not fear the law if he determines to set up as an unqualified curer of this, that or the other disease. Of all the long list of those who avail themselves of weak laws and of public credulity, none is more to be reprehended than the so-called "cancer curer"—a gross misnomer, for the only "cures" known to medical science are represented by the small percentage of cases that do not recur after surgical operation or after their disappearance under some form or other of radiotherapy—means that are certainly not in the hands of the ordinary cancer curer. There have been revelations in the medical journals extending over many years of the evils arising from that spacial form of irregular practice. On the 24th of September an inquest held at Reddish by the Lancashire County Coroner furnishes an illustration in point. The inquiry was held on the body of a Bolton insurance agent, aged 53, who died from cancer. The Coroner explained that deceased had come from Bolton to Reddish for treatment by Mr. Rawlings, who was not a "registered practitioner." The matter for the jury to decide was whether death was due to the criminal negligence of anyone. The law, he said, did not prevent anyone carrying on a business for treating these cases, and Mr. Rawlings was quite entitled to do it, but he must use a reasonable amount of skill and care in the treatment. It appeared from the evidence that deceased had come to Reddish for the purpose of being under Mr. Rawlings, and had been there ten weeks, when he was advised by the latter to return home and place himself under a medical man. Mr. Rawlings, who is an alderman of the Stockport Town Council, was present at the inquest, but declined to give evidence. The medical man called in at Reddish refused to grant a certificate of death, as he did not know what treatment was given, and so could not say if it accelerated death. At this the Coroner interposed (according to the report of the proceedings in the Manchester Evening News of September 25th) with the remark that it was only just to Mr. Rawlings to say that it probably did not hasten death. The latitude of a Coroner's Court seems to have been somewhat strained if it be correct that he thus advanced a vital conclusion which had not been supported by the medical evidence. To cap this, Mr. Rawlings, who had declined to appear as a witness, was permitted to interrogate the statement that the treatment was harmless. From first to last no one seems to have found out the elementary facts as to the nature of the treatment, the representations made by Mr. Rawlings to deceased, the amount paid for treatment, and other pertinent facts bearing upon the reasonableness of skill and care adopted by an admittedly unqualified person in the treatment of a deadly disease. In these circumstances we submit the verdict is practically worthless, and the inquiry should be reopened. The Coroner expressed his surprise that Mr. Rawlings had not advised the calling in of a medical man some weeks earlier, as the serious condition of the deceased must have been evident to him. Mr. Rawlings was again permitted to interrupt the proceedings by saying that "it was a fight against death," and by admitting it was moral cowardice his not telling the friends of deceased that he was dying. It would be interesting to learn what were his views as to the money which presumably was paid for his unqualified services. The jury returned a verdict of death from natural causes, a finding that the Coroner hastened to observe absolved Mr. Rawlings from all blame. Does that mean that he is to be upheld in treating cancer and in keeping persons in the dark as to their condition, and in exhibiting "moral cowardice" with regard to unqualified services for which he is receiving payment? In this particular inquiry there have been no sensational "revelations," just as there appears to have been no really searching and satisfactory inquiry. It is to be hoped that the principle involved—that of the treatment of disease by medically untrained persons—will be thoroughly sifted and exposed by the Government inquiry that has been promised to deal with the matter.

THE ATTEMPTED GERMANISATION OF LONDON UNIVERSITY.

When Lord Haldane paid his last abortive visit to Berlin to ingerminate peace, it was ostensibly given out that the real object of his visit was to study German models for the purposes of the Royal Commission on University Education in London, over which he was at that time presiding. The pacific mission failed, and although the report of the Commission, since issued, is instinct with academic
culture, made in Germany, and the ideals of Berlin and München are held up for imitation, it is unlikely that his attempt to Germanise London University will be any more successful. The report clearly shows that the fons et origo of this whole "reconstitution" movement was an "association for promoting a professorial University" largely upon the lines of a German university (par. 21). In discussing the essentials of an ideal University, the Commissioners hold up to admiration the secondary education system of Germany, together with its "large number of universities with a settled scope and policy." They describe the work of the "Kaiser-Wilhelms-Gesellschaft," founded for the "encouragement of research" by an "association of rich men and societies to prevent the exploitation of research in the interests of individual capitalists." (par. 73). The "German seminar" is commended for imitation by undergraduates of London (par. 68), while concentration of the University buildings on a central site on the Bedford estate, discovered by a gentleman of German extraction, is regarded as essential for the purposes of higher education. The Imperial College of Technology, which was originally set up largely on the model of Charlottenburg, is pronounced to be very good; but it is in the case of the medical faculty that the Germanisation of the University is to be most completely effected if the graduate of Göttingen and his colleagues are to get their way. Here "the system of organisation proposed is, speaking generally, the German system" (p. xviii.), as described by Prof. von Müller, of München, and by Mr. Abraham Flexner, while Sir William Osler supports the view that a complete reorganisation is necessary, and describes his plan of a 'hospital unit' which corresponds generally to the German clinic. The present successful system of medical education in London is condemned as too utilitarian and as failing to exert "any seminal influence in the way of ideas upon those that come under its influence." With truly Prussian arrogance we are informed that it is doubtful if there could be found one person in London fit to be a University Professor of Surgery, though possibly there may be "one or two young men fit to be University Professors in Medicine"! Sir Henry Morris, in the Times, has already voiced the same views of the profession on these Teutonic proposals. He asks why should the independent medical schools be sacrificed in favour of grafting on to "our British methods a system which has been as pernicious in its origin as it is impractical in character and results." He compares the new fail, in Hegel's words, to "a conception without existence in fact" to be built on "German foundations with a Maryland crest and flying the Banner of the Great Ideal." He condemns as "a most undesirable and defective method" the proposal to allow students to be examined for degrees by their own teachers; the new graduates, he asserts, would go into practice "absolutely unfit for the responsibilities of their profession." Moreover, Sir Henry Morris foresees that "there would be an outcry against any assistance being given to a hospital largely used for research, and in the laboratories of which vivisection would be freely resorted to," and he justly fears that there would be "too much interference with patients under University control and research." The Hospital, in its issue of August 23rd, 1913, truly stated that thus to "Germanise our medical schools cannot fail to provoke an embittered and quite unnecessary controversy. No system on the Continent nor in the United States can show more thorough grounding in the subsidiary sciences, more painstaking and practical clinical instruction, or more genuine regard for the welfare of the patients. In sanity of judgment, just application of science to practice, and high ethical ideals, our London teaching is unsurpassed. It is no mere regard for 'the wisdom of our ancestors,' nor in the spirit of the laudator temporis acti that we refuse to join in Lord Haldane's demand for the surrender of such substance with a view to replace it by the shadowy substitute recommended by Mr. Abraham Flexner." These opinions were placed on record long before the lamentable exhibition of the results of German "culture" which Europe has been invited to witness since the war began. As the Prime Minister observed, "that which is specifically German in the movement of the world in the last thirty years has been, on the intellectual side, the doctrine of the supreme and ultimate prerogative in human affairs of material forces, and on the practical side the taking of the foremost place in the fabrication and the multiplication of destructive machines of destruction." "Louvain, Malines, Ternonde—these are the names which will henceforward be branded on the brow of German culture," Corruptio optimi pessima; and the insidious infection of the German seats of learning with this spirit of materialism and militarism has taught us, not what we should imitate, but what we should avoid, as we would the devil, in the evolution of our great Universities throughout the Empire.

**CURRENT TOPICS.**

"The British Pharmacopoeia, 1914."

Sixteen years ago, considerable advances have taken place in medicine and pharmacology. The new edition of this standard work of reference was available for inspection last week, and for the benefit of our readers we may indicate a few of the more important changes. It is inevitable, of course, that the "B.P. 1914," should present several omissions, but we must confess to a certain amount of surprise and even of regret that the compilers have seen fit to delete such well-known drugs as Pepino, Mustard, Gamboge, Hops, Scammony, Musk, Eclaterium, and Pierotoxin, as well as such household preparations and chemicals as Emplast, Ammon. c. Hydrarg., Liq. Sodii Ethylatis, Spt. Etheris Co., Cerii Oxalas, Acid. Gallic and Zinci Sulphocarb. On the other hand the following are among the more important new drugs, chemicals and preparations that have been introduced: — Adrenalin, Polyetherina, Tannas, Arnica Flor., (replacing the Rhizome), Liq. Creso et Sapon., Liq. Formaldehyd, Sapon., Tinct. Fort., Acetone, Calci Lactas, Cresol, Guaiacol, Strofii Bromid., Resorcin, Acid. Acetylsalicylic (Aspirin), Barbizone (Veralon), Hexamin (Uro-
Drugs and Panel Patients.

As the result of an inquiry undertaken by Mr. J. F. Tocher, D.Sc., F.I.C., of Aberdeen University, at the request of the Scottish National Insurance Commission into the expenditure upon medicine and appliances, an important memorandum upon the subject has just been issued. After a review of the whole of the prescriptions for the years 1913 and 1914, it was found that the practitioners throughout Scotland had, as a rule, selected the most modern drugs and those of best repute, denying to their insured patients no medicines usually available in private practice. Prescription frequency was one of the respects in which the methods of prescribing revealed variety. It is suggested that high prescription frequency, where it was known to exist, might usefully form the subject of a conference between the insurance and panel committees. A similar difference was found to obtain as regards the price of prescriptions. In several areas an investigation was made with a view of discovering whether high charges against the drug fund, and so far as due to prescribing customs, were followed in the area by the practitioners as a whole, or were due to the procedure of a section of the profession, or of individual practitioners. In the view of the Commission's reporter, it was a minority of the profession in any area who run up a drug bill beyond the expected limits. A few instances are given of extravagant prescribing, but it is pointed out that expense by itself should never be a bar to the supply of a drug under national insurance, but, in order that the insured person might receive proper and sufficient medicines, restrictions must be imposed on improper or excessive prescribing. Here again such insurance and panel committees might confer in the matters. Unscheduled appliances had been ordered, but it is pointed out that expense by itself should never be a bar to the supply of a drug under national insurance.

Consideration of the prescriptions investigated indicated a certain amount of overlapping between medical and sanatorium benefits. The result was that the drug fund would be called upon to bear a burden from which it should be immune, and the general tendency to shortage would be accentuated. With regard to the present shortage of drugs, it is stated that it is impossible to foresee its duration at the present juncture. It is essential, therefore, that all existing stocks of remedies for disease should, as far as possible, be husbanded by reserving drugs in which there was a shortage for cases to whose treatment they were indispensable, and endeavouring to secure the use of other remedies by other means. The Commission are confident that the medical profession in the country will in this, as in other matters, prove equal to the exigencies of the time, and they suggest that insurance committees for their part should, as far as possible, co-operate with panel committees in the adoption of any recommendations or other measures which might seem likely to prove of service.

The War and the Race.

Speculation has been rife about the geographical, political and economic results of the war. Its effects upon the personnel of the race has not yet been seriously touched on. The main view is a simple and a seemingly obvious one. Many vigorous men in the prime of life, the pick of the nation, will die on the battlefield of Europe. England will thus be more than ever faced by a shortage of men because her army is composed of volunteers. Her best men are going, whereas in other countries all sorts and conditions of men are on active service. The rest of the world loses a certain proportion of its average manhood. England loses the flower of her folk. The shortage of potential fathers will tell on the birth-rate, and eventually and probably its quality and perhaps its quantity. We are not at all sure that this reasoning is right. Of course, the rule of the survival of the fittest hardly applies. In a modern battle carried out largely at long range the shells of the enemy exert no specially eugenical selection. And, anyway, the doctrine applied to battle would only show that those fittest for battle survived, and constant warfare is not the normal state of the average European even in these times. We can give no accurate solution to these speculations. If we make the attempt we are uttering statements without a standard. There is no evidence that the best fighting man is necessarily the best citizen in the time of peace, nor the most likely to be the father of men. Any evidence we have is rather in the other direction. Many of the highest military qualities are incompatible with the hum-drum tollings of our office-bound cities. So we need not yet despair of the next generation. It will be able to look after itself. One thing we must do. Infant life, which should always be held precious, has now considerably appreciated in value as an asset of the State. No effort nor expense must be spared to save the lives of the little ones. We depend on posterity, and we must do our best to help it.

The Smoke of the Sacrifice.

Kino David once remarked that Zion was a fair place and the joy of the whole earth. There is another Zion—in the State of Illinois, where Chicago comes from—whose fairness or otherwise we are happily not competent to discuss, but which is doing very well in its efforts to fulfil the latter part of the Psalmist's statement. The municipality of this City with the Hopeful Name one fine day passed a neat and comprehensive law. It decreed that "no person was to smoke tobacco in any form, or to have in his possession any lighted pipe, cigarette or cigar," in or on any street, alley, avenue, boulevard, park, parkway, public passageway, depot, depot platform, depot grounds, hospice, hotel, store, post-office, or other public building or public place within the city." To enjoy the weed
troubled to find out if the game was really worth the candle. We thought, with a considerable degree of satisfaction, of how useful it would be for a boy who lost his right hand to be able to write with his left, and never realised that it is not the habit of the majority of people to lose any hand at all. To inculcate left-handedness as a prophylactic is comparable to going through a course of hopping to provide for possible injury to a leg. The only other use for a left hand is as an assistant for the right, and the left hand is quite an efficient helper as it is. It is found, moreover, that if the left hand tries to do too much the efficiency of the right hand is impaired. It half the time set apart for writing lessons has been found to the time that writing is much inferior to what its right hand alone would have produced. No preference for the left hand can ever be developed; and, further, the children dislike the left-handed work and become worried and nervous over it, with the result that they are hindered rather than helped by the interference with their natural tendencies. The old rule, "Let not your right hand know what your left hand doeth," has a physical application. The child should be taught to do things and should not be bothered about which hand he uses. If he is to draw, it does not matter whether he holds the pencil in his right hand, his left hand, or his foot.

Ambidextrous attempts are unsuccessful as far as results go, and those who have tried them consider that their disadvantage stand in no relation to the expenditure of time, pains, or patience.

The Sick and Wounded.

The Order of St. John of Jerusalem is rendering considerable assistance in the matter of supplying surgeons to help in the care of the sick and wounded on the Continent of Europe. The Chief Surgeon of the Brigade, Mr. Edmund Owen, and Mr. H. T. Watson, have particular charge of this branch of the work of the Order, and they are anxious to receive further applications from medical men willing to help. The address of the Order is St. John's Gate, Clerkenwell, London, E.C.

PERSONAL.

Dr. Kenrick S. Wise, Government Medical Officer, British Guiana, has been appointed a member of the Executive Council of British Guiana.

Sir Dyce Duckworth, M.D., F.R.C.P., will deliver the first Hunterian Society's Lecture on October 14th, at 9 p.m., on "The Patient and the Disease."

Mr. Arthur E. Barker, F.R.C.S., will deliver the Lettsomian Lectures for the Medical Society of London on February 1st and 15th, and March 15th, 1915.

Mr. Owen Richards, F.R.C.S., a well-known Surgeon of Cairo, has left for the front, accompanied by his wife, who previously to her marriage was head of the nursing staff of the Anglo-American Hospital.

Sir John Bland-Sutton, F.R.C.S., President of the Medical Society of London, will deliver the introductory address at the Society's Rooms, 11 Chandos Street, Cavendish Square, W., on October 12, at 8.30 p.m.

Dr. G. G. Nasmyth, Director of Laboratories for Toronto, will accompany the Canadian troops to the front, and is at present training a class of 150 men, chiefly medical officers, in water analysis, with a view to the prevention of typhoid fever.

Sinistry.

Some of our most progressive schools have long tried to make their unfortunate pupils ambidextrous. The poor little children have been made to perpetrate attempts at bimanual symmetry on blackboards and similarly to write, paint, weave and do gymnastics with one hand as with the other. We are now told that all this left-handed labour is lost. So far most of us have assumed that a trained left hand must be better than an untrained one and have never


PERSONAL.
CLINICAL LECTURE
ON
HERPES. (a)

By W. ESSEX WYNTER, M.D., F.R.C.P.,
Physician, Middlesex Hospital.

GENTLEMEN.—I thought we might consider to-day a well-distributed disease with which you are all familiar, and yet one which is not actually common; what we call herpes, or, more popularly, shingles. It is worth some little consideration, because the cases vary so very widely in character and I think there is a certain amount of confusion due to the term covering so many different conditions.

I want to put aside one condition clearly from the rest, and that is catarhal herpes; I do so because I do not consider it to be herpes at all in the sense in which we consider neural herpes. The reasons for this separation will be, I think, perfectly obvious to all of you. First of all, it is similar in being a vesicular eruption; and that is the only similarity that exists. It is peculiar in occurring around the various orifices of the body; there are instances of these groups of vesicles appearing round all the orifices, not, of course, at one time in one patient. Recently I had a patient with a most pronounced vesicular eruption over both ears; they were very fine vesicles, almost like milia, and in a day or two they contained a buffy exudate, so that the whole of the pinna on both sides was covered with these minute vesicles. The patient told me that on more than one occasion he had had a similar eruption, unaccompanied by any serious symptoms—pain, or fever, or anything of that sort. And this attack cleared up, as previous ones had done.

I would first mention, as an argument against it being regarded as herpes in the ordinary sense, that it is specially recurrent; patients having had it once may have it again many times, whereas it is a peculiarity of true neural herps that it very rarely occurs more than once in the same person. Again, the vesicles do not correspond truly to the course of any particular nerve. In the patients who have pneumonia, it is said that this occurs more often on the affected side; if the pneumonia is right-sided, the herpes is more likely to be on the right side of the face. But I do not know that this is a constant feature.

Another important point which separates it from neural herpes is, that there is no antecedent pain of smarting or neuralgia, neither is there any subsequent neuralgia. Nerve pain, both before and after the attack, is a constant feature in neural herpes. Another very distinctive feature is that this facial herpes—and it most commonly occurs on the face—is not followed by scarring, whereas neural herpes leaves a deep scar which is permanent throughout life.

There is one point of interest which I would like to bring before you, and which I have only realised recently, namely, that in at least two cases of pneumonia accompanied by catarhal herpes, in which I got the cases early enough to obtain recent fluid from the vesicles, I was able to recognise the diplococcus pneumatic in the vesicles of catarhal herpes. That may be a matter of more than mere interest; it may be of real value in other conditions, because we find that this catarhal herpes is associated commonly with various forms of catarrh, and it may be possible to identify that particular organism by examining the vesicles. Again, it is sometimes a feature of cerebro-spinal meningitis, and I think that, that being a somewhat unusual disease, and obscure at the commencement, the discovery of a meningococcus, if that were possible, in these vesicles would be a great aid to diagnosis.

Of the neural form of herps, we have, I think, two distinct groups, and this is the point I want to insist upon most. There is, first of all, an ordinary light form of zona, a herpes affecting the trunk, and 75 per cent. of these cases occur in children under 14, so that it is really an infantile complaint, similar to measles or varicella. And these ordinary attacks of zona become very much rarer in adult life, although they occur then, and are sometimes severe. In children, generally, the effects are very slight. I think we must conclude that the person does feel ill, because I know one instance of a little girl who appeared in her mother’s room one morning with the announcement that she had come there to die, and that it was an outbreak of herpes, and probably her feelings were influenced by the manifestation which she could see. But usually in children the number of vesicles is comparatively small. The distribution of them is of considerable interest, as regards the pathology of the disease, because, in the first place, it is practically always unilateral. If more than one nerve is involved, the other involved nerve is either above or below, on the same side, or at a different level on the other side. So that the old-fashioned popular notion that in a case of shingles if the eruption meets in the middle line the patient will die, is somewhat akin to the problem propounded to Sir Bourdon Sanderson by a lady, as to why, if you hold a guinea-pig up by its tail its eyes drop out. The truth is that it never does happen, and there is, therefore, nothing in the malignant prophecy.

The complaint generally attracts little attention until the vesicles appear; they are usually preceded by some erythema. I have noticed in adults, where there has been a severe attack, that the erythema, instead of being a bright pink colour, as is common in other cases, reminds one more of the colour of raw meat; there is a bluish tint about it, and it has a darker colour than that of ordinary pink erythema. Under these circumstances the rash is generally very profuse.

Statistics show that 75 per cent. of cases of intercostal herpes are in young people below the age of puberty; and I have never seen, in my own

(a) Delivered at the Medical Graduates’ College and Polyclinic, on Thursday, July 23rd, 1914.
experience, any other distribution of herpes in young children. There is a point in pathology which I will mention presently, which has an important bearing on this in relation to the severity of the attacks.

In adults the ordinary zona is comparatively rare; but the attacks which do occur involve the large ganglia. Those which I have been speaking of occur in the small ganglia, of the posterior nerve root. In adults the large ganglia affected involve the nerves to the arm and the leg, the neck, and the branches of the fifth nerve with the Gasserian ganglion. Undoubtedly one of the most serious types of adult herpes and—only occurring in the adult—is herpes ophthalmicus, an attack which involves the superior division of the fifth. That is serious partly on account of the suffering it causes, before and for a long time after the outbreak of the vesicles, the serious scarring which ensues, causing in many cases disfigurement, but, above all, on account of the involvement of the eye in the subsequent changes. And there are two points which I want to refer to in connection with that. I think it is an accepted statement in medicine that the eye is only involved when the nasal branch of the ophtalmic division is affected, as shown by the cases of vesicles on the side of the nose. But that, I feel sure, is not the complete truth. I have seen cases in which there has been no evidence whatever on the side of the nose, yet in which the eye has been quite seriously affected. That is one of the misstatements which it is advisable to correct.

There is another thing which is not familiar to everyone, and that is that the eye is always affected considerably later than the skin. The eruption is always earlier, initiated from the first; it is out in the course of one or two days, but vesication is limited to the area originally marked out by the neuralgia: it does not come out indefinitely; it comes out for one or two days, and then ceases, and the patient begins to mend. Anyone seeing such a case might be inclined to congratulate the patient and himself that the eye will not be involved. But that would be a little too previous, because the affection of the eye occurs a fortnight after the appearance of the rashes on the skin. The explanation of that is that, I think, is somehow found. Of course, it is conceivable—and I think the probable explanation is—that the original lesion is in the Gasserian ganglion, and that a second lesion involves, by degeneration, the ciliary ganglion, which takes some days; degenerative processes take ten days before they appear. So the delay in the affection of the eye is probably due to the lapse of these ten days for the degenerative process to spread along the nerves distributed to the eyeball itself. There is also the consideration that the parts which are affected in this complaint are avascular, and are supplied by infiltration, and that may supply a further cause. I think the main cause, however, is due to the ten days which are required for the degenerative process to become established.

The other parts which are liable to be affected in adults, of which I have seen examples, are, first of all, the upper cervical ganglia; and it is an exceptional circumstance with regard to herpes that usually two or three—the second and third—cervical ganglia may be affected, whereas in the ordinary zona it is very rare for more than one to be involved. These, apparently, are linked together more intimately. I am familiar, also, with one instance in which a lady, as a girl, had an ordinary attack of zona, and towards the end of middle life she had a serious attack of ciliary herpes. One knows that in specific fevers a patient may have scarlet fever or measles, and, long after, another attack, the protective power seeming to cease after a while. Or it may possibly be that these later attacks of severe herpes affecting the large nerves are different in some respects to those occurring in children and affecting the small nerves. Occasionally the eruption extends below the elbow or below the knee: I have seen instances of both, apparently independent of any primary disease of the spine. They constitute very serious illnesses indeed; the patients are incapacitated for quite six months; there is loss of power in the limb, due, apparently, to inhibition resulting from pain, because there is no definite evidence of interference with motor tracts. But the pain and weakness are sufficient to render the arm or leg useless for months.

When one considers the pathology of this disease—and there have been very useful investigations made in connection with the explanation of the variabilty of its severity, and some of the peculiarities of its distribution. The changes have been very carefully traced. I have here Head and Campbell's book on herpes: they made post-mortems on a number of cases in which death occurred from other causes at varying dates after the attacks. And they found that this epidemic herpes, the neural form, is associated with an acute inflammatory exudation, with small round cells in the corresponding root ganglia, with very definite extravasations of blood, and a corresponding destruction of ganglion cells and fibres, this being associated with inflammation and thickening of the sheath, both of the ganglion and of the involved nerves. After a period of ten days, it is possible to trace degeneration both in the posterior root towards the spine and in the ascending posterior column, and further degeneration forward along the corresponding nerves, right up to their termination. Those changes have been constantly found in the cases investigated. With damaging lesions of that sort, of course, it seems hopeless to contend; but if we were fortunate to catch the herpes in the early stage, when the neuralgia along a particular nerve indicated what was coming, by giving drugs such as aspirin, it struck me we might control the severity of the attack. I think that has not hitherto been done at all. During the eruptive period you can do nothing but keep the parts dry by dusting with some drying powder containing a little anaesthetic, and protect it from irritation. But in the after period you might get much pain that morphine has to be resorted to in most cases for a long time. There is one drug from which I have found great relief in these painful periods, and that is chloroform. I have also used it extensively in other complaints, and am much impressed by its powerful sedative nerve effect. I give 5 grains. And although it seems contrary to what one would expect in an organic lesion of this kind, benefit is derived from applying local anaesthetics to the affected area; and either peppermint oil or menthol is effective in relieving the burning and tingling which persist for so many weeks after attacks of herpes.

I will now turn to consider some points in pathology. Head and Campbell, in their investigation,
say "Now if any posterior root ganglion is care-
fully examined, it will be found to contain two
main groups of cells: large, coarsely granular
nerve cells, and smaller or pear-shaped cells which
stain with methylene blue in a more uniform
manner. But the proportion of these two types of
cell in any one ganglion varies according to
its position. Thus, the sixth, seventh, and eighth
cervical contain a much larger proportion of large
cells than of small ones, while from the third
dorsal to the first lumbar—that is the range of
the ordinary light form of zona—the small cells
preponderate; and in the second, third and fourth
cervical there is a great preponderance of small
cells over large." They add that in the 392 cases
analysed the third and fourth cervical, the second
discal to the second lumbar included all except
30. So you see there is a decided preference
shown by herpes to attack the trunk and the
ganglion corresponding which have a preponderat-
ing number of small cells. The ganglia which
receive fibres from the limbs show a preponder-
ance of the cells of the large coarsely granular
type. These give rise to the long fibres in the
posterior columns in the cervical region, the
postero-internal column being formed from fibres
from the leg area; the postero-external by those
fibres from the arm area. It was W. Bruce who
was the first to call attention to the toxic agent which causes herpetic zoster not only
affects the posterior root ganglia, but more par-
ticularly those which contain a preponder-
ance of the smaller type of ganglion cells, and give
rise to the shorter fibres in the posterior columns,
though all the cells in the ganglion are involved.
The small cells probably subserve the function of
pain connected with the sympathetic chain and
the viscera. I think that anatomical discovery
helps us to understand the difference, or shows the
apparent association in the lighter forms of
zona which are so common in children and the
severe kinds which affect adults; for you will
see from what I have read that it is the large
ganglion cells which preponderate in the lower
cervical, affecting the arm and lower limb, and in
the Gasserian ganglion, affecting the forehead and
eye. It is where those are affected that the
results are so severe.

Thus you see there are three distinct types of
herpes, if we are going to include the catarrhal.
The catarrhal is the lightest of all, without any
constitutional effects; the zona with trifling
effects, occurring in children; and the herpes of the
larger ganglia, involving the limbs and forehead,
which occur mostly in adults, and sometimes in
the aged. The severe type is associated with
fulminating lesions of the corresponding ganglia,
associated with haemorrhages and vascular
changes, all developing in the course of two or
three days.

There are other types of herpes which are
occasionally met with as secondary to other
diseases. One meets with herpes as a normal
complication, though not very common, both in
ataxia, and in general paralysis of the insane.
Again, it occurs in the course of myelitis, and in
cerebro-spinal meningitis, not only the catarrhal
form of the condition, but the neural. It also
occurs in association with the degeneration of
vessels met with in arterio-sclerosis, in connection
with spinal caries, and occasionally in necrosis of
rubes. It has been met with in connection with
injuries of superficial nerves and injuries to the
spinal column.

The curious points in connection with this
secondary herpetic are, first, that they are not ful-
midating, in the same sense that the others are,
and that the vesicles come out over an extended
period of time, two or three weeks at least; and
that on examination of the affected ganglion one
finds evidence rather of degeneration than of any
acute lesion; i.e., there are no haemorrhages,
there is no vascular dilatation, and there is very
little cell diffusion. The changes found are what
are known as chromolysis; changes in the appear-
ance of the ganglia, and there are evidences of slow
degeneration. So that secondary herpes is
different in its pathology, and is apparently due
to interference with the blood supply in the direc-
tion of reduction, and not to any acute specific
infection.

In addition to the secondary forms, there are
certain toxic forms, which are different, in being
more nearly symmetrical, such as those associated
with arsenic, with carbonic oxide poisoning, and
sometimes with extreme mental emotions.

As to the actual aetiology of herpes, we have
no absolute proof, but from a consideration of its
epidemic occurrence—it occurs in groups in par-
ticular districts and at certain times, especially in
the spring—from the fact that patients rarely
recover from an attack of herpetic zoster; that
in the cases examined no ordinary bacteria have been
found, we are led to the belief that it is an acute
specific disease. And Head and Campbell have—
and I think very appropriately—compared it
with infantile paralysis, which also has an epidemic
distribution and a periodic one and is limited to
one attack, and both the diseases are far more
prevalent in children than in adults. That,
perhaps, is not particularly comforting, because
we have no means of warding off the epidemic
diseases. The fact that the disease is not com-
municable from one to another is not a serious
objection to this view, because this is recognised
also in many others.

I think I have mentioned what are the particular
points in treatment: the use of local anaesthesia,
the employment of chlorotone, in the more painful
period, for that is preferable to morphia.

Only one thing remains, and that is to warn you
against possible confusion of herpetic ophthalmicus
with cryispelas. That warning is by no means
unnecessary, it seems to me. There are scattered
references and your experience show you how com-
pletely one-sided herpes is as compared with
cryispelas, but it is severe enough to produce
considerable swelling, so that it may raise the skin
\frac{1}{2} inch, with edema sufficient to produce a com-
plete closure of the eye by effusion into the lid.
Whether the nerve influence extends beyond the
middle line or not, certainly edema does. I have
recently seen a case in which, in the course of a
couple of days, both eyes were completely closed
by swelling of the lids and edema of the forehead,
which had commenced on one side, and had
extended to the outer limit of the other eye-brow.
The vesicles are smaller, as a rule, in herpes than
in cryispelas, but it is not unusual for them to
ran together in places, and they are very unequal
in size; some may be large enough to resemble
cryispelas. If the lesions become haemorrhagic, as
sometimes happens, there is a close resemblance
to cryispelas, and there is a degree of fever indi-
ating the herpes. But I admit that the general
symptoms are not severe enough for true cryispelas.
There is no vomiting, the temperature is rarely
should this be absent there are two means of ascertaining the reality and the degree of chloride retention—viz., the alimentary salt test and daily weighing.

The alimentary chloride test consists in drawing up the balance-sheet of the salt ingested and that excreted. This test is only trustworthy when followed up for several consecutive days, and I cannot too strongly insist upon the fact that the estimate of chlorides in the urine is of value only so far as it is considered in contrast with the amount taken into the body.

To know the amount of chlorides ingested we must distinguish between cases on strict milk diet, those on a saltless diet and persons on ordinary salt-containing diet. With milk diet it suffices for us to ascertain how much milk is being taken to calculate the amount of salt taken. On a saltless diet we know that the maintenance ration comprises about one and a half grammes of salt daily, so this may be taken as an average. Lastly, if the patient is on ordinary diet it is indispensable for him to weigh the exact amount of salt that he adds to his food in cooking and otherwise. He should employ chemically pure salt, because ordinary salt contains ten or fifteen per cent. of water and various impurities. Sometimes he uses five grammes of salt for cooking. If we add the 1.50 grammes contained in the food substances this gives us a total of 6.50 grammes of ingested salt.

It is indispensable to collect the total urine for the 24 hours or we may fall into grave error. The proportion of salt per litre is of no value whatever. The collection should always start at a fixed hour, preferably in the evening. The urine is collected until the last drops fall into the interval that has elapsed since the last meal. A quantitative daily analysis of the chlorides, carried out under these conditions, will reveal exactly the degree of chloride retention. This is the only quantitative test that is required, the phosphates, sulphates and uric acid not presenting any particular interest in renal cases and the same remark applies to the estimate of urea in the urine and its relationship to the total nitrogen.

These calculations are easier to work out in hospital than in private practice, but there is a much simpler plan, based on the daily weight of the patient, a method which should always be employed in every case of Bright’s disease. All we have to do is to see that the patient is always weighed at exactly the same hour, in the same clothes, at a time as far removed as possible from a meal, on waking, for instance, and after emptying the bladder and rectum.

With a patient who is on a diet the chloride content of which we know the weight curve will show sufficient accuracy whether the salt ingested is, or is not, excreted, and it enables us to determine the hydration consequent upon chloride retention. It is well to bear in mind that an increase of weight of one kilogramme corresponds approximately to the retention of between five and six grammes of salt. The weight of the machine is, therefore, an indispensable clinical accessory and is practically sufficient for us to be able to determine the proper diet for persons who are edematous or threaten to become so.

Azotemia.—This ought to be ascertained in every renal case, and none should accept the responsibility of control until it has been obtained. The existence of chloruresmia is plainly indicated by the presence of edema, and

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**ORIGINAL PAPERS.**

**THE MEANS OF TESTING THE RENAL FUNCTION.**

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**THE MEANS OF TESTING THE RENAL FUNCTION.**

By PROFESSO
be adequate, and a regulating mechanism ensures the excretion of an amount of ura roughly corresponding to the amount of albumenoids ingested.

For this purpose we require from 20 to 30 c.c. of blood, which can easily be obtained by means of wet cupping, a method of treatment which we are always at liberty to employ, and it is easy enough to ascertain the proportion of ura contained in the serum. This is how we estimate the ura in the serum in my wards:---10 c.c. of serum is mixed with 115 c.c. of alcohol at 90°, when a white precipitate of albumenoids is thrown down. The mixture is shaken for some minutes, then thrown on a filter. The first 100 c.c. is collected and this corresponds to 8 c.c. of serum. This is warmed, and then poured into all the apparatus which has been evaporated, but short of complete desiccation. The residue is treated with a small quantity of distilled water, in such amount that the whole does not exceed from six to eight cubic centimetres, and this is treated with hypobromite in Youn's apparatus over a mercury bath. Then we read off the results. Various types of apparatus and procedures have been suggested for this selfsame purpose. Dr. Moog suggests precipitating the albumenoids with trichloracetic acid. Drs. Ombard and Hallion have devised an ingenious arrangement which enables us to read off the result without passing by the mercury bath, an advantage in sparsely occupied rooms. My pupils, Andie, Were, and Laudat, find that the results by these two processes closely approximate, so that in practice any one of them can be employed.

I only estimate the ura in the blood serum. In my daily practice I find that this is sufficient to inform me of the existence and the degree of the azotaemia, and I am not able to formulate, at any rate, an approximate prognosis.

When the ratio oscillates between 50 c.g. and a grammie the prognosis is not immediately fatal, but when between one and two grammies it is rare for the subject to survive more than a year. The course is still more rapid when the ratio is between two and three grammies, and it is then merely a question of months or weeks. When these grammies are only met with in the ultimate stages of the disease and when met with indicate a fatal termination in the immediate future.

Thus, as you see, by very simple means: the splygmonometer, the alimentary chlorid test or the weight test, and the estimate of the proportion of ura in the blood serum, one and the same physical phenomenon enables us to compile as a balance-sheet of the renal function as it is possible to obtain in the present state of our knowledge. It will enable him to label each case with a correct diagnosis and prognosis. In future it will not be sufficient in a case of Bright's disease to diagnose acute or chronic nephritis, the same may be diagnosed as a pyelitis or pyelonephritis, as a toxic or infective origin. The diagnosis requires to be completed by specifying, whether the form is monosymmetric or poly symmetric, stating also whether the symptoms of chloruremia, azotaemia or hypertension exist separately or, on the contrary, are associated. In this way, by dissociating from the multiple symptoms that may appear in a pyelonephritis, the part due to disturbance of this or that renal function we can establish the rational bases of prognosis and treatment in a given case of Bright's disease.

THE PREPARATION OF A SUBJECT FOR OPERATION.

By D. CANNONNE, M.D.,
Assistant Surgeon at the St. Martin's-Haut Clinic.
[Specially reported for this Journal.]

A MAN comes to us suffering from an affection amenable to surgical measures. Under what conditions shall we be justified in intervening and what precautions ought we to take in view of such intervention? These are the questions which I propose to discuss with you to-day.

Thanks to the progress that has been accomplished in the sterilisation of instruments, operator's hands and operative field, no patient should ever succumb nowadays to the operation as such. Most operations have now been thoroughly worked out and the technique so far simplified that the modern surgeon can proceed more rapidly and do better than his predecessors.

Then, too, the inersection and alladred the operations for the induction of general anaesthesia goes far to limit the risks under this head.

Seeing then, that the subject is no longer exposed to death from sepsis, secondary hemorrhage or other grave accident due to defective technique, nor from the anaesthetic, what are the causes of death when, in spite of these advantages, the subject succumbs?

Almost invariably death is due to complications dependent upon the patient's general health, that is to say, consequences of the insufficiency of one or more of the vital organs. It follows that it behoves us to ascertain the patient's resistance as exactly as we can, in order to make sure that he is in a state to support the shock of the intervention. The latter varies, of course, with the nature of the operation, but it usually comprises the following elements: (1) nervous disturbances, especially likely to supervene in emotional persons as the result of apprehension, partly on account of the anaesthetic, especially it should be said, but also on account of the operation, organic depression from pain; (2) intoxication by the anaesthetic; (3) suppression of the functions of assimilation and dissimulation during the first few hours after the operation consequent upon immobility, deprivation of food, slowing down of the intestinal and urinary functions. This stage is especially dangerous for the cachectic.

In order to estimate the resistance of the patient in respect of these various factors of disorganisation we must enquire into the influence of temperament, habits of life and previous illnesses. Each apparatus and organ must be investigated from the point of view of function. A systematic examination enables us to arrive at a practical conclusion and may even reveal possible errors in the surgical diagnosis.

A patient suffering from obstinate vomiting is sent to us with the diagnosis of pyloric stenosis whereas close examination of the relieves shows that the gastric crises are due to a lesion of the intestinal canal. Sometimes comes into view for an umbilical hernia, the rapid development of which has greatly surprised the friends, and on examination we find that there is copious ascites of hepatic origin. The hernia becomes of secondary importance, being in fact an accident in the course of a purely medical affection.

To begin with, we shall note the general aspect of the patient, his lacies, his emaciation or corpulence. Mere cachexia is not per se a contra-
an affection amenable to surgical measures. A patient suffering from old-standing fibroid, profoundly anaemic from repeated haemorrhages, will soon rally once the fibroid has been removed. Some subjects suffering from a benign gastric affection, especially pyloric stenosis, consequent upon chronic ulcers, come to us in a lamentable state of cachexia which at first sight seems to forbid any intervention, yet gastro-enterostomy effects quasi-resurrections. It is true that in these cases general anaesthesia, as a rule, is unavailing, and in all probability is a condition of success, seeing that of 45 gastro-enterostomies performed by Dr. Monrop without anaesthesia on cachetic subjects not a single one proved fatal.

Excessive copulence, on the other hand, may constitute an absolute contra-indication except it be a case of surgical emergency. As far as possible it is well to abstain from any abdominal operation, even of the least severe kind, in the obese. Not only is the operation rendered far more difficult in consequence of the thickness of the walls, but these subjects are very likely to have fatty degeneration of the myocardium, so that they would ill support prolonged immobility on the back and chloroform intoxication.

The chest will, of course, be carefully overhauled before any kind of operation. As a rule, it is sufficient to make sure that the patient is not suffering from an acute or chronic affection such as emphysema, pulmonary oedema or tuberculosis. Chronic bronchitis is no doubt a great drawback in abdominal operations, especially in gastro-enterostomy, and its existence renders certain precautions necessary. The surgeon will dispense with general anaesthesia if possible, and in any case will use chloroform in preference to ether and the patient will be allowed to sit up on the second or third day in order to facilitate expectoration.

A much more delicate matter is to ascertain the functional activity of the liver and kidneys, especially when we reflect that among the delayed accidents of chloroform are hepatic and renal complications. It has been shown that chloroform is a powerful poison for the liver cell, and cases of “chloroform jaundice” are by no means infrequent. Then, too, in four out of five cases, patients long under chloroform are found to have albuminuria, sometimes even acetonuria and oliguria or anuria, testifying to the existence of toxic nephritis. It follows that the administration of chloroform to a patient whose liver or kidneys are insufficient may lead to fatal complications.

A complete examination of the urine will provide exact information as to the state of the hepatic cell. A reduction in the proportion of urea, alimentary glycosuria, urobilinuria and urinary hyper-toxicity all point to hepatic insufficiency. Urinary analysis will also enlighten us as to renal permeability.

The presence of albumen in the urine is not necessarily indicative of a renal lesion which would contra-indicate surgical intervention. Apart from so-called physiological albuminuria, and the forms of albuminuria dependent upon nervous or circulatory disturbances or blood changes, there are varieties which are directly caused by the tumour and disappear when this is renewed.

I have collected notes of cases in Dr. Monrop's clinic in which patients with abdominal tumours ceased to be albuminuric after intervention. One of them was that of a girl with an ovarian cyst, two others were women with fibroids of moderate dimensions. The history of one of them is especially characteristic. Although her fibroid was of no great size, for three years she had had edema of the lower limbs and hands, dyspnoea and palpitation. Analysis showed one gramme of albumen per litre of urine. She was thought to have nephritis and after some hesitation Dr. Monrop decided to intervene and was not a little surprised to find that the albumen had disappeared on the morrow of the operation. The patient recovered without difficulty.

Our examination of the patient is completed by investigation of the circulatory apparatus and in particular of the heart. Experience shows that we need not attach too much importance to vafular lesions when fully compensated. The important point is to ascertain the state of the myocardium. We must make careful search for symptoms of myocarditis and fatty degeneration, and with this object in view any abnormalities of the pulse and the degree of blood pressure will be of great assistance. A pressure below 100 mm. is usually a contra-indication to the administration of chloroform.

In spite of all these precautions it is unfortunately impossible to lay down any hard and fast rules which would enable us to distinguish the good from the bad cases, so that we must still be prepared for an occasional disappointment. Having decided in favour of an operation the question arises as to the preparation of the patient. If the operation in view is of some gravity, more particularly if it be an abdominal operation, it is well to let the patient pass a few days in the nursing home where the operation is to be performed. This plan presents many advantages. To begin with, it means that the patient is kept under close observation so that we shall be in a better position to form a trustworthy opinion. Then too, the patient has time to become familiar with her surroundings and her mind gets accustomed to the idea of an operation. Lastly it is much easier to prepare the patient for the operation by baths and the disinfection of the operative field.

Of all the preparatory measures, however, unquestionably the most important are diet and purgation. The diet must be such as to disinfect the alimentary canal and favour the elimination of toxins. This is usually effected by milk diet and the administration of aperients. This has for effect to lessen the risk of chloroform poisoning and to reduce the shock to the patient. It has been remarked that the peristaltic movements which cause abdominal patients so much pain after operation are reduced to a minimum when the intestine is empty.

These, then, are the main lines upon which we must prepare patients for operation. When satisfactorily followed the patient will be in a much more favourable position to resist the shock of the operation and the margin of risk inseparable from any and every surgical intervention will be proportionally diminished.

Col. J. R. Dodd, R.A.M.C., has been selected for appointment as Medical Officer in charge of ankylostomiasis work in Trinidad.
THE SPOROTRICHOSIS: WHAT EVERY PRACTITIONER OUGHT TO KNOW.

By H. GOUGEROT, M.D.
Professor at the Faculty of Medicine of Paris.

[Specially reported for this Journal.]

The sporotrichoses are mycoses (i.e., diseases due to fungi), caused by parasites called Sporotrichum. These are a species of Mucedina or hyphomycetes to be recognised by rather delicate threads, bearing conidia or external spores. The ovoid, round or pear-shaped spores are either sessile or pedunculated, and may be numerous or scanty. When numerous they may form a sort of sheath round the thread or may be collected at one end in a bunch. These various species of sporotrichum, at least a hundred have been identified, but of this number, as far as we know, only eight are pathogenic to man and animals. The one most frequently met with is the Sporotrichum Beurmanni.

Inoculation takes place through scratches with thorns or with knives used for peeling potatoes, for example, and the ingestion of uncooked vegetables. Contaminated animals may also convey the infection to human beings. Fortunately every inoculation of sporotrichum does not entail sporotrichosis, in fact there must be diminished resistance or other predisposition to enable the parasite to gain a footing.

Nowadays we are entitled to expect every practitioner to be acquainted with the sporotrichoses. Commenting on the frequency of the disease, Professor Landouzy points out that formerly sporotrichosis was mistaken for tuberculosis or syphilis to the detriment of the unhappy victim who, in the absence of proper treatment, went from bad to worse. The moment we recognise the nature of the disease recovery is ensured, since it is readily amenable to iodine, which is a quasi-specific in this class of diseases. Medical literature contains records of numerous cases of erroneous diagnosis in which useless mutilating operations have been performed, simply because the patients were wrongly supposed to be suffering from cancerous or tuberculous affections.

Sporotrichosis may present every possible clinical aspect, for it may attack practically all the tissues: epidermis, dermis, muscles, bones, joints, testicles, kidney, lung, trachea, eye, larynx, pharynx, glands, etc. It may determine all sorts of lesions in these tissues, acute, subacute, or chronic, though the gumma is far and away the commonest form. The practitioner need not be acquainted with all the clinical varieties of sporotrichosis, provided he bear in mind that these mycoses may simulate any affection of skin, bone, muscle, etc. I will briefly enumerate the more frequently met with clinical types:

(1) Subcutaneous gummat returns disseminated all over the body varying in number from six to a hundred or more; these may be small and hard, medium and soft, or breaking down with abscess formation. They may be deeply seated, ultimately involving the skin with ulceration.

(2) We may get infiltrating gummat of the skin simulating cancer, warty patches simulating lupus, epidermitis simulating ringworm, blepharitis, ostitis, laryngitis, etc.

(3) A chance at the site of inoculation, ulcerous, vegetative or warty, or, it may be, in the form of gummatus lymphangitis, involving or not the glands. In some cases the adenitis dominates the scene.

(4) Deep isolated lesions: osteitis, arthritis, synovitis, pylonephritis, etc.

(5) Isolated lesions of the mucous, ulceration of the pharynx simulating tuberculosis, linguale ulceration simulating cancer, laryngitis, conjunctivitis, ophthalmia, keratitis, etc.

In short the sporotrichum may attack any part of the body and any tissue, so that in all cases suggesting syphilis, tuberculosis or some chronic pyogenious infection it behoves us to bear in mind the possibility of the affection being due to the sporotrichum.

Nothing is easier to diagnose than sporotrichosis, so that it would be inexcusable not to make a practice of eliminating this cause as a routine measure. All we have to do is to cultivate it on glucose-gelose or have recourse to the sero-diagnosis. It is often possible to diagnose the affection clinically on the strength of the following signs, the importance of which I have established in many instances: viz., a large number of the lesions and the extreme severity of any one lesion contrasting with the excellent state of the general health. Onset of the lesions in the form of an indurated nodule slowly degenerating into an abscess. Partial, cupuliform softening ulcers, usually narrow, enlarging secondarily. Irregular livid edges almost always undermined, with pockets in which pus accumulates. Contrast between the small area of the ulcer and the extent of breaking-down gumma. The co-existence of several apertures or two contiguous ulcers adjacent to the same gumma and the persistence between the two ulcers of a slender bridge of bluish skin. The pustulosis viscidor the serous exudation cition yellow. In spite of the persistence of the abscess cicatrization takes place beneath the thinned skin. The cicatrices are flat, either narrow or wide, supple, with uneven edges often dentated with imperfectly adherent papets of skin with a brownish halo. Then, too, there is rarely any glandular enlargement. The lesions regress under the influence of the iodine treatment, but recur if this treatment be too soon suspended. Lastly, the extraordinary mixture of different lesions: tuberculoid, syphiloid, ecthymatos, etc.

The foregoing features apply especially to cutaneous lesions. In osteitis, synovitis, arthritis, etc., the clinical diagnosis of sporotrichosis is not always practicable; we can only suspect its nature, in which case we have recourse to bacteriological examination by culture or to sero-diagnosis.

Bacteriological Diagnosis.—The simplicity and rapidity of Beurmann and Gougerot's procedure, viz., cultivation in the cold on peptonised glucose-gelose is such that every student and practitioner ought to be familiar with it. No laboratory is required, since no warm chamber or microscope is employed. The tubes are inoculated at the bedside, and the tubes are left at the ambient temperature. The macroscopical aspect of the culture is sufficient; all that is required is that the observer shall have familiarised himself with the appearance of sporotrichum cultures. The test is as simple as for the detection of sugar and albumin in the urine.

When a microscope is available—no need for
the costly immersion lens—the diagnosis can be made earlier by allowing the pus to run down the dry wall of the tube. If familiar with the technique of the agglutination test the practitioner can make the diagnosis at once.

The Culture Test. Paint the secret with a tincture of iodin, puncture closed lesions with an ordinary hypodermic needle of fairly large calibre, taking care that it contains (like the syringe) no trace of antiseptic solution. The pus is aspirated into a sterile pipette. Having washed out the abscess cavity with boiled water suck up some of the serum that exudes into another pipette, to be separately inoculated. The culture tube (which can be obtained ready for inoculation) is then carefully inoculated with the pus or serum, by pouring some on to the surface of the preparation, glucose-gelose, flaming the mouth of the culture tube and blocking it with a plug of sterilised cotton. There should be from half to one cubic centimetre of pus in each tube and three tubes should be inoculated in the same way.

The tubes are placed upright so that the pus shall not come into contact with the cotton plug. The rubber cap of the tube should not be replaced in position. They are left at the temperature of the room (which should be reasonably warm) protected against the action of any antiseptic vapour.

Colonies of sporotrichum make their appearance between the fourth and the twelfth day, while at first they soon become brown, and then chocolate colour. They can be recognised by the colour and the wrinkling, like mountains on a relief map or the cerebral convolutions, and by the brownish halo that surrounds them. No one who has once seen a typical sporotrichum culture will have any difficulty in identifying it. No technical knowledge is required beyond this.

In order to arrive at an earlier diagnosis it is open to us to adopt the plan of pouring the pus down the dry walls of the tube, because the colonies are visible under the microscope long before they can be seen by the naked eye, making use of a microscope with a No. 4 objective and a No. 6 eye-piece. On the day when the inoculation is done a big drop of pus is run into the grooves formed by the plane surface of the gelose and the concave surface of the tube and on the glass opposite the gelose. At the close of the second day, without further preparation, the colonies forming in these drops of pus can be seen under the microscope through the wall of the tube. The oblong sporotrichum becomes swollen and germinates towards the walls of the tube; they throw out thread-like prolongations, and after the forty-eighth hour a more or less ramified corolliform star forms. If we can detect these thread-like formations the diagnosis is certain, and this as a rule is easy enough. The tube is placed under the microscope, the platform being inclined at an angle of about 15 degrees so that the condensation of vapour may remain at the bottom of the tube and not moisten the cultures. The tube is fixed in position with putty.

In the midst of the leucocytes of the pus we can make out one, two or three straight filaments. This appearance is more characteristic than any smear preparation could be.

As a result of the special war examination at the Royal College of Surgeons of England 122 new members have been admitted.

RECENT RESEARCH ON THE ETIOLOGY OF SPRUE.

By P. H. BAHIR, M.A., M.D., D.T.M. AND H., CANTAR,
London School of Tropical Medicine.

Sprue is an intestinal disease, limited, as far as is at present known, mainly to the tropics and sub-tropics. It has a peculiar appearance in certain peculiar and remarkable features: they are very pale in colour, frothy, and of a large size. Concurrently with the diarrhoea, there is a flattulent dyspepsia, characterised by a characteristic meteorism, especially of the small intestine.

Simultaneously, or consequent to, the onset of the diarrhoea, a peculiar raw and denuded condition of the tongue is noted, which, commencing at the tip and edges, extends slowly inward to the back, in which the terminal symptoms—the raw tongue and frothy diarrhoea—some-what resemble those of sprue. The records from tropical Africa require confirmation.

It has been assumed that sprue is a disease confined to Europeans, and is really the expression of the effect of the tropical climate on a digestive tract unused to these conditions. I am inclined to think that the result of the researches on which this paper is based, and which were commenced in India, will go far to combat this idea, and that the disease will be eventually found to obey the law common to other tropical diseases of known specific origin—that is to say, the native races of those countries in which the disease is endemic constitute the main source of infection.

I succeeded in finding eleven cases of sprue, about the diagnosis of which there could be little doubt, in natives of Ceylon, though in many cases the difficulty of arriving at a definite opinion was extremely great; ankylostomiasis, malaria, dysentery and diarrhoea are all of such frequent occurrence in natives that the exact rôle played by each must be first excluded. It appears to be a certain fact that in Ceylon, at least by the European cases, that at least 10 per cent. of the population are by far the most numerous, and that the immigrant race is especially liable to contract the infection.

Though the disease, as seen in Europeans, is especially liable to attack those of middle age, this factor in itself is not a bar to infection. I saw one case in a Eurasian boy of thirteen years of age, and I am assured that occasionally it does attack children as well.

Neither temperature, housing, water supply, food, nor the insect fauna, all of which were made the subject of a separate investigation, appear to influence in any way the distribution of the disease in Ceylon, except in so far that an unhealthy environment may predispose to its development by reducing the normal vital resistance to disease. On the other hand, the occurrence of the disease in Ceylon in all classes of the community irrespective of age, sex, or immediate environment, certainly suggests the exposure to the same specific cause, or its direct communication from man to man.

The symptoms of sprue and its manifestations vary so considerably that I concluded that the only satisfactory classification on a clinical basis was the one based upon a hypothesis that the disease process affects the various regions of the alimentary canal to an unequal degree, and thus gives rise to symptoms according as one or other region is specially affected.

As typical or complete sprue I included all cases exhibiting two cardinal symptoms—the characteristic
tongue and stumps; as atypical or incomplete spore, a number of cases with typical morphology, but with the tongue or mouth ulcerative, and a large series of bilious diarrhoea, accompanied by anaemia, emaciation and flatulence, which I regarded as early sprue especially affecting the intestinal tract, and to which I gave the name of the Indian. Finally, I included as a further sub-division a number of cases, occurring in all races in whom the typical tongue and mouth symptoms are present, though the disease process does not appear to have spread into the body. I have provisionally named this localised disease "tongue spore.

The typical colour, or lack of colour, of spore stools is to be ascribed partly to the fat, intravenously or intragastrically ingested, and partly to the abnormal percentage of fat (95 per cent). In addition to this peculiarity, the stools are invariably acid, and contain no traces of any of the pancreatic ferments which are present in the normal stool. The fat absorption—that is to say, the proportion between the amount ingested and the amount excreted in the faces—varied in my cases from 20 to 90 per cent, and the milk-fed normal subject it stands at about 90 per cent.

All these various characteristics of the spore stool, their acid reaction, large size, high proportion of ingested fats and carbohydrates, absence of pancreatic ferments, and the presence of those of ascertainment pancreatic disease, all indicate either an insufficiency or absence of the pancreatic ferments in spore.

The urine and the urine excreted per diem is normal in sprue, as is the feces, which, and the fluid ingested per diem indicate that the urine is of exogenous origin.

Seeing that there are many discrepancies in the descriptions of the morbid anatomy, it is necessary to consider briefly the lesions I found in the two subjects: one obtained. The bodies presented all the external appearances of chronic starvation, there was a complete absence of subcutaneous and body fat, all the organs weighed less than half their normal amount. The white matters of intestinal ulceration, the mucous surface was covered with a layer of viscid andropy mucus containing great numbers of yeast cells. The esophagus was encrusted throughout its whole extent by a yellowish, friable, diphtheritic membrane composed entirely of yeasts, which organisms were also cultivated from the liver and from all parts of the intestinal tube.

In the microscopic pathology the most interesting part of the epithelium of the oesophagus, throughout the intestinal canal and the chronic inflammatory changes in the mucous and submucous layers. In sections of the spleen I found small bodies of an uncertain nature in the endothelial cells of the veins. Their appearance resembles that of microorganisms. They most probably represent some hyaline degenerative change of these cells, which I believe to be characteristic of sprue, as I have failed to find them in other tropical diseases such as jaundice, anemia, lymphatic and splenomegaly, leucocytosis, kala-azar, trypanosomiasis, amoebic and bacillary dysentery, etc.

These bodies must be distinguished from other Graul's bodies, or from the bodies which are also found in spore tissues; these latter are probably identical with Russell's fuchsin bodies, and also represent some form of hyaline degeneration.

With the exception of yeast cells, I have failed to find any specific organism in spore tissues. I have, therefore, summed up shortly the evidence in favour of regarding sprue as a blastomycotic infection, as follows:

(i) Yeast cells and mycelial elements are found intracellularly in scrapings of the tongue lesions at an early stage of the disease, but not at a later stage when acute symptoms have subsided.

(ii) Yeasts are the only organisms found in the spleen and in the tongue and in microscopic sections, that the infection is not one of recent date receive support from the chronic inflammatory changes in the cornium of the papillae.

(iii) The desquamation of the surface epithelial cells, accompanied by a subacute inflammation of the tongue and of the esophagus, are lesions such as a study of the disease in its mode of action or of its low order of virulence would lead one to expect.

(iv) A general infection of the intestinal mucus with yeasts was found in spore post mortem, but not in twenty-six other cases of chronic diarrhoea accompanied by the absence of the tongue and anemia.

(v) The stools of sprue, their frothy and gaseous character, are such as would result in a blastomycotic infection of the intestinal canal.

(vi) The chronicity and latency of the disease, are compatible with the life history of the blastomyces, their periods of attenuated growth and recrudescence.

(vii) There is no evidence in favour of regarding the spore yeasts as being otherwise than identical with the thrush fungus (Mollisia albicans), an organism possessing a very low pathogenic power, but it is possible that under certain conditions—as, for instance, the skin diseases—it may prove of importance. In support of this view, I may say that there are numerous varieties of yeasts employed in brewing beer and in making wine, and the predominance of one variety in certain districts imparts to the wine its characteristic flavour, and which, though differing widely from each other in their powers of fermentation, yet resemble each other minutely in their morphological as well as in their cultural characters. By it may be that, under certain conditions, these yeasts, and other properties, are capable of being influenced by the external local conditions.

(viii) Wasting and anaemia, both symptoms of sprue, can be produced by continuous ingestion into the alimentary canal of broth cultures of a pathogenic yeast; moreover, a degeneration of the hepatic capillary endothelium, apparently similar to that I have described in the spore spleen, may be induced by these means.

(ix) Diarrhoea, atrophy of the lingual papillae as in sprue, digestive disturbances, and an aphthous ulceration of the mouth are commonly found in infants, the subjects of thrush infection in temperate zones.

(x) It is possible to produce by intravenous feeding of the alimentary canal in children in temperate zones, as Goe's celiac diathesis, are of the same nature as sprue in adults in the tropics. A hypothesis of this sort would explain the occurrence of sporadic cases of sprue in temperate zones.

(xi) The local infection of different portions of the digestive tract with this fungus would best explain the varying clinical manifestations of sprue.
CORRESPONDENCE.

ROYAL FREE HOSPITAL.

HYDATIDS OF THE LIVER.—Mr. WILLMOTT EVANS operated on a man, aged 56, who had been admitted for a swelling in the neighbourhood of the liver. For about three months he had had dull aching pain in the right hypochondrium, but had not noticed any perceptible swelling there until about a month before admission to the hospital. The patient's general health was excellent, but the pain was sufficient to induce him to seek treatment. On examination, a swelling was felt and seen at the lower margin of the liver, corresponding to the tenth rib. The swelling was rounded, but not tender; it was dull on percussion, and its contours corresponded with its shape. There was a sense of obscure fluctuation, but no hydatid thrill could be obtained. The diagnosis made was that it was probably a hydatid cyst, and not connected with the gall-bladder, for the swelling was too far anterior to be the latter. The patient was anesthetised, and an incision made over the swelling; the incision was vertical and about three inches in length. The structures of the abdominal wall were cut through and the peritoneal cavity opened. The swelling in the liver was then seen; it was hemispherical in shape, whitish in appearance, and projected somewhat from the free margin of the liver. Strips of gauge were packed tightly on either side of the swelling, so that the latter should not escape into the general peritoneal cavity. A fine trocar was then inserted into the swelling and two or three ounces of characteristic hydatid fluid were drawn off. An air-tight bag was placed over the cavity and its cavity opened. By means of a stream of saline solution the "proper coat" of the hydatid was washed out; no daughter cysts were present. There was no bleeding from the liver substance. The hole in the liver was gently packed with gauge and a drainage tube inserted. The wound was closed except at the point where the drainage tube emerged, and a gauge dressing applied.

Mr. Evans said that hydatids were not very common in this country; they were much more frequently seen in Australia and in Iceland. In the diagnosis of the present case the chief points were: the situation and the character of the swelling; its situation showed that it was not connected with the gall-bladder, and its rounded shape and the sense of fluctuation, slight though it was, showed that it contained fluid. It was unlikely that it was an abscess, for the patient had no rise of temperature. No hydatid thrall was present, and so he (Mr. Evans) was deprived of this aid to diagnosis; but it may be said that this sign is by no means often seen, but when it is present it is very striking. In this case there were no daughter cysts. It is not known, Mr. Evans remarked, why in one case daughter cysts should be present and in another absent; as a rule their presence makes very little difference in the course of the disease. However, should the hydatid cyst rupture into the peritoneal cavity, the presence of daughter cysts would make a great difference. Several cases, however, were on record, in which hydatid cysts have ruptured into the peritoneal cavity without giving rise to any severe symptoms beyond, perhaps, a severe attack of urticaria, which has been often noticed in connection with hydatid disease. When, however, daughter cysts are present and rupture into the peritoneal cavity the symptoms are much more severe; peritonitis may arise, or the daughter cysts may find lodgment in various parts of the peritoneal cavity, each giving rise as it grows to a fresh hydatid tumour. The treatment of a hydatid cyst which has been caused must consist, Mr. Evans said, in complete removal of the true wall of the cyst; this is generally best done by means of a stream of water, and then the cavity left may be drained. The prophylaxis of hydatid disease consists mainly in the slaughtering of the taenia echinococcus finding a breeding place in domestic animals. It is most important that dogs should not be allowed in slaughter-houses, and that the livers of cattle found to be affected with hydatid disease should not be thrown away, but be burnt.

The hole in the liver rapidly diminished in size, and by the end of a week it was found possible finally to remove the drainage tube and packing; the skin wound speedily closed and the patient was discharged well.

OPERATING THEATRES.

CORRESPONDENCE.

FROM OUR SPECIAL CORRESPONDENTS AT HOME.

SCOTLAND.

EDINBURGH.

WAR.—THE WOUNDED IN SCOTLAND.

On the morning of the 28th some of the realities of war were brought home for the first time to the people of Edinburgh. At dawn a trainload of wounded soldiers, mostly from the Aisne, were brought from the South and conveyed to No. 2 General Hospital at Crayleigh. The hospital train arrived about 2 a.m., and was met by a fleet of some 40 motor ambulances and private cars, and by a corps of stretcher bearers. The transport of the wounded was carried out without any confusion, and before a quarter of four every man was safe in the hospital. Captain Stuart, R.A.M.C., was in charge of the arrangements at the Caledonian station, assisted by Mr. James Adair, of the Red Cross. The surgeons at the Crayleigh were under the command of Lieut.-Col. Cotterill and Col. Cathcart, and the senior physicians present were Majors Boyd and Conrie.

THE EDINBURGH AND LEITH MEDICAL EMERGENCY COMMITTEE

Have now issued a circular explaining the steps which were taken in August, when the medical men were brought out of the region. The situations adopted were two, the first being to do the work of men who were called away by the war, and the second being to co-operate with the Soldiers' and Sailors' Families' National Relief Fund in providing medical attendance. In the first of these matters the private arrangements which have been
made are quite satisfactory, while in regard to the second the offer of help has been gladly accepted, and on all the Local Sub-committees of the National Relief Fund local medical men have volunteered to relieve the demand for local relief, under which this Fund can scarcely be said to have begun, and bearing in mind the limitations under which it is intended to be given, it is not surprising that as yet there have been few applicants.

The same, however, is the case now, and these Committees are encouraged to keep offices open in each ward, and will meet once a week to consider applications for relief.

**Insurance Act—Drug Fund.**

A memorandum as to the cost of medicines and appliances has now been issued. At the end of the medical year, January, 1914, it was found that the expenditure per insured person varied throughout Scotland from 7d. in Sutherland to 10s. 1d. in Zetland. Twenty-six counties were within 1s. 0d., while none exceeded 2s. For the 25 boroughs the range was from 5d. up, most being less than 1s. 0d., while seven encroached on without consuming the "floating sixpence." Two boroughs—Dumfries and Aberdeen—had passed the 2s. limit. Comparison of the first quarter of 1913 with the corresponding period of 1912 showed in almost all localities an upward tendency averaging about 25 per cent. A special inquiry was accordingly made by Mr. Trocher, D.Sc., Public Analyst, and Lecturer on Statistics in Aberdeen. He examined 150,424 prescriptions, amounting to a total of £20,086. He found that the drugs selected were the most modern and in the best repute, and that in any area it is a minority of the profession which runs up the drug bill. About 60 per cent. of prescriptions should be repetitions or mere "Repeat mixture," showing no prescription written out in full, should be allowed. Committees are cautioned, also, as to the extent to which emergency drugs and appliances should be supplied, in view of the great value of proper dressings and appliances. For instance, dressings consisting merely of "Repeat mixture," showing no prescription written out in full form, should be allowed. Committees are cautioned, also, as to the extent to which emergency drugs and appliances should be supplied, in view of the great value of proper dressings and appliances. For instance, dressings consisting merely of "Repeat mixture," showing no prescription written out in full form, should be allowed. Committees are cautioned, also, as to the extent to which emergency drugs and appliances should be supplied, in view of the great value of proper dressings and appliances.

**GLASGOW.**

**Further Arrival of Wounded.**

An additional 100 wounded soldiers (now followed by another 200) have arrived at Stobhill Hospital, Glasgow. Besides Lowland Scotch there are also representatives among them of Highland regiments and of numerous English battalions, while there are also some Irish soldiers. It is gratifying to note that as a rule the patients who have been wounded are the men wounded. Many of those wounded are suffering from sickness, but in only one or two instances are the wounds regarded as serious. All of the patients are progressing remarkably well, and the length of time that the first batch of 200 wounded arrived, 21 men have up to 28th ult. been discharged from the hospital, and have left for homes in various parts of the country including Preston, Belfast, Londonderry, Dublin and London. Only one has died, and he was a fatal case from a chest wound.

**Transport of Wounded in France.**

Dr. Charles Walker, delegate of the Scottish branch of the Red Cross Society, who recently returned from France, brought with him an urgent request from Sir Arthur Keogh for assistance in the work of transport. Owing to broken bridges, etc., the work of transporting the wounded from the battlefield to the base hospitals has now become extremely difficult. Arrangements are now being made by the Society for the equipment of a mobile unit, consisting of a field hospital, ten ambulances, and subsidiary motor-cars and lorries, and a united association of nurses and orderlies. Its purpose will be to provide an intermediate halting place between the fighting line and the base hospitals, and means of transport in either direction.

**Teeth for Recruits.**

The Army Council has accepted an offer made by the Scottish Dentists' Association, on the outbreak of the war, to render dentally efficient men otherwise fit, but who were rejected, an account of their teeth. It has been pointed out that the premises of the three branches of the Association and the Glasgow Dental Hospital, Dalhousie Street, should be open daily for the treatment of recruits. Over 70 dentists have offered their services. The British Dental Association, working in conjunction with the Scottish Dentists' Association in organising and filling up the service.

**Specialists as Army Surgeons.**

Instances that may be given of Glasgow practitioners taken out of their usual line by the war are Dr. H. W. Wright Thomson (who usually devotes his time to the eye) on service in India, and Dr. Goodwin Tomkinson, dermatologist, attending to a large number of wounded at Stobhill Hospital, Glasgow. Dr. G. H. Edington has also gone on foreign service, and his wards in the Western Infirmary are closed.

**LETTERS TO THE EDITOR.**

[These are not held responsible for the opinions expressed by our Correspondents.]

**FORCIBLE FEEDING.**

To the Editor of The Medical Press and Circular.

Sir,—Though Dr. Sers' fluent style leads him to employ regrettable words like "invention," "quibble," "absurd," etc., he should be able to present his ideas with real facts, nor indeed does he read even such a recent document as my letter of the 23rd, which he nevertheless attacks in such unpleasant terms.

In that letter I said he "repeated the absurdly false statement that the Cat and Mouse Act had succeeded," I referred to his repetition of Mr. McKenna's statement, and though he speaks of "invention" (1) he positively admits in the same breath that he was in effect quoting that statement. "Invented" therefore nothing.

Nay, more: though Dr. Sers now goes on to explain that personally he considers the Cat and Mouse Act to be "a greater failure than success," he again, in the same breath, actually wishes this monstrous piece of legislation put more actively into force and particularly "by resorting more often to forcible feeding."

I think your readers must by this time have realised how difficult it is to follow Dr. Sers in his confused mass of ideas. In view of the scandal in which prison forcible feeding involves all medical practitioners, letters are made even worse when Dr. Sers tells us he wrote to the Daily Mail suggesting that if prisoners suffered on account of forcible feeding "they had themselves only to blame." Dr. Sers evidently wished the unfortunate patients who seek for instruction in the Daily Mail to believe that if prisoners did not resist the outrage of being forcibly fed they would not endure any torture. The falsehood of this assertion has been exposed over and over again, as the prison records of unaffected prisoners prove. But Dr. Sers will neither read nor learn the real facts of prison forcible feeding. If he did, then he would not write letters to the Press, and truth and humanity would both greatly profit. His lack of knowledge of the facts and also his (what the Under Secretary of State for the Home Office called) "general prejudice against women" leads him to object to the phrases "torture" and "cat and mouse Act" and again his pages filled with platitudes and absurd assertions prove how perfectly correct the use of these terms is, and also give the proof that it is upon our
profession that the worst reproach for this disgusting practice lies since it is the prison doctors (who being also ordinary police constables) are ordered by the Home Office to be the executioners of this form of torture.

Dr. Sera's whirlpool of sentences needs a passing reference and a comparison of our positions in this matter. I believe in preventing political crimes by establishing political liberty and enfranchising, and I do not believe in Dr. Sera's method of first creating political crimes and then seeking to crush them down by brutal Germanic force.

In reply to his question, I shall certainly continue active protest and protection because I have proved, firstly, that it is neither "medical" nor "legal", and, secondly, that it is both a foul stain on our profession and a tyrannous means whereby a reactionary Minister may temporarily oppose the development of democratic freedom.

I am, Sir, yours truly,

VICTOR HORSLEY.

London, October 5th, 1914.

A NOTE ON THE NEW PHARMACOPEIA.

To the Editor of THE MEDICAL PRESS AND CIRCULAR.

Sir,—You remember that Osler described the general treatment of disease at Johns Hopkins Hospital as "hopeful" and "promising," and that a goodly number of people who are receiving treatment under the Insurance Act far the largest proportion are being doctor'd with this prescription—but what do we find in the new "British Pharmacopoeia"? I find nothing less than this: that the most potent drug known to therapeutics has been reduced to half strength; for the future tincture of rue will contain only one half of the present strychnine content. This means that practitioners who expect certain results from the tincture will no longer get them, because, in future, ten minims will only equal five. Thus therapy is reduced to chaos and confusion. Not only have the compilers of the new "B.P."" lowered the strength of tinct. nux vomica to one-half, but at the same moment they have quadrupled that of tinct. strophanthi. Hence, your heart patient, for whom you have ordered that drug in heavy doses, is liable, after next January, to get a preparation four times as strong, with perhaps lethal effects.

To make confusion worse confounded, the "B.P." juggles with the strength of laudanum—it is made one-third stronger. Conceive, if you can, any more horrible tincture of rue, vomica half strength, strophanthus quadruple strength, laudanum one-third greater strength. That is to say that whenever you prescribe for your patient, with fear and trembling, a fifteen minims he must now be treated as if he had the equivalent of twenty minims. Surely, if there be another drug in the pharmacopoeia whose potency ought to remain untampered with it is tincture of digitalis. Here again the muddler is at work. The new tincture is only four-fifths of the strength of the old; when you order twenty minims you get only sixteen.

There are 40,000 practitioners on the British Regulated List, not one of whom will ever bother to learn the new "B.P." They look on medicine as one of the certainties of medicine, but the strength of unguent hydargyr is suddenly cut down to about half. In like manner the new white peticate ointment is made only one-fourth per cent. instead of ten. Then, again, sarasaparilla, saffron, poppies, arnicas, jaborandi, and galbanum are thrown out; but kaladanca is put in.

I am, Sir, yours truly,

J. C. MCWALTER, M.D., F.R.C.P.

October 2nd, 1914.

THE PATHOLOGY AND TREATMENT OF EXOPHTHALMIC GOITRE.

To the Editor of THE MEDICAL PRESS AND CIRCULAR.

Sir,—I have read Dr. Crookshank's delightfully written paper in the Medical Press, September 29th, 1914. It is scientific, interesting, daring and humorous. The two last qualities are sadly lacking in most medical papers.

I am extremely pleased to find him dealing sledgehammer blows at the stupid use of the term "idiopathic" in medical circles. My own clinical observation of quite a large number of cases presenting symptoms of Graves's disease enable me to agree with him on several points, and I have learnt a good deal from his paper. For one thing, I am convinced there is no such thing as "idiopathic" Graves's disease. One might as well believe in German "idiopathic" as idiopathic, because the guns are hidden.

Three cases come to my mind from my own practice. The following brief notes are from memory.

All three were women about 35 years old.

(1) Married. One child. Had suffered from a severe attack of rheumatic fever some years previously. About a year before I saw her she began to complain of cough, palpitation, shortness of breath, and persistent diarrhoea as main symptoms. After treatment by means of drugs she entered a provincial hospital, and was there for the three months preceding her visit to me. As far as I could gather, she was rested and given belladonna. As she showed no sign of improvement she was discharged. On investigation I found a badly eroded cervix uteri, which I treated by applying iodised phenol to it once a week for several months. She said this had not been diagnosed in the hospital. She was free from the symptoms of the disease. The cervix was so effective she had a new baby in due course which she did not procure from under the gooseberry bush. She was not too pleased, as she said her husband was not doing very well in his business. She made the best of it however, and took in lodgers. She made an excellent recovery after labour.

(2) Single. About two years before coming to me she had been poisoned by sewage gas. For many months she suffered from diarrhoea, palpitation, and great debility. Later on, after the diarrhoea had been stopped, she developed typical rheumatoid arthritis. She tried drugs, baths, rest cures, etc., for over a year, but went from bad to worse, and was very depressed, in great pain, and helpless when I took up her case. As I could find no very definite local septic focus, I treated her by means of multiple acupuncture and irritants. At the end of six months she had gained 14 lbs., in weight, was free from pain almost, the rheumatoid arthritis showed signs of the arms and hands had subsided, and there was no sign of Graves's disease.

(3) Single. Possible atiological factors: influenza and oral sepsis. Symptoms: Loss of strength, palpitation, dyspepsia. Treatment, bed rest, terminal clearance, application of the galvanic current to the root of the neck once a week for many months. Result: Excellent recovery.

I admit that these notes leave much to be desired, but I will send further details to anyone who cares to write to me.

Dr. Crookshank has failed to call attention to the work of two recent writers—Dr.s. R. Llewellyn Jones, of Bath, and Macalister, of Liverpool—whom I have shown that symptoms of tetany, Graves's disease, myxoedema, and Raynaud's disease may be found in some patients suffering from chronic arthritis. I personally find that many of my arthritic patients suffer from asthma as well, and some from diabetes.

I quite agree as the result of clinical observation with all that Dr.s. Jones and Macalister say.

I trust this letter is not too long; volumes could be written about the points raise. I am, Sir, yours truly,

W. J. MIDLETON.

112 Charminster Road, Bournemouth. October 3rd, 1914.

THE ANESTHETIST.

To the Editor of THE MEDICAL PRESS AND CIRCULAR.

Sir,—The interesting lecture in your last week's issue upon "The Medical-Legal Position of the Anaes-
OBITUARY.

SIR HENRY LITTLEJOHN, I.L.L., M.D. EDIN.

On September 30th, at his residence at Arrochar, Sir Henry Littlejohn died at the age of 80. Sir Henry had been in feeble health for the past three years, and his once familiar figure has been little seen in the Edinburgh streets for many months past. He seemed to have the secret of perennial youth, and up to the very end of his active professional life bore his years without a wrinkle. Sir Henry Littlejohn was born at Edinburgh in 1828, and was educated at Perth Academy, at the Edinburgh High School, and at the University. When only 28 years of age, he was appointed to the medical staff of the Royal Infirmary of Edinburgh and in 1869 was made a medical officer of health and in 1875 was made a medical officer of health for the town. He was one of the founders of the Sick Children's Hospital; he was an Elder in St. Giles Church, and regularly attended the daily services.

His position, it need not be said, was fully recognised by his profession and others. In 1875 he was President of the College of Surgeons, and in 1883 President of the Royal College of Physicians of Edinburgh, and in 1886 President of the Institute of Public Health, and in the same year the University granted him the degree of L.L.D. In 1864 he was knighted, and in 1897 he was made a Companion of Honour, and was hailed as a true dapper, witty, or pathetic —which are associated with his name, constitute his chief claim to a place in their memories, his real and enduring fame lies in the great sanitary reforms which he carried through in Edinburgh half a century ago—deeds which on their results are imperishable, though the author may be forgotten—which place Edinburgh in the forefront of sanitary advance, and show the Medical Officer of Health to be a leading sanitarian of the century. In 1865 Edinburgh was a hotbed of typhus fever. The disease was endemic in the old town, and from time to time assumed epidemic proportions. The conditions were such that a whole population of the old city was visited by cholera. Happily he had an able supporter in the Lord Provost of the city—Lord Provost Chambers—who carried through an entirely new hospital. Which without its wholesale destruction the worst plagues by the driving through them of open thoroughfares, such as St. Mary Street, Jeffrey Street, and Chambers Street. It is difficult to realise now that Chambers Street, immediately north of the Royal Infirmary, was some of the worst and most insanitary dwellings in Edinburgh. If Sir Henry had left behind him nothing but this great work his memory would have been perpetual. He had other great works to his credit. He was one of the pioneers in sanitary and municipal advance. Such schemes as the notification of infectious diseases, the treatment of infectious diseases in the old Infirmary, and then, when the new Infirmary was built, the conversion of the old into a municipal hospital, the sanitation of the old city; the sanitation of the palatial new buildings at Colinton Mains, found in him a great supporter and friend. It is mainly due to the work done by the Edinburgh medical officers that the rate has fallen from the figures given above to about 14 or 15 per 1,000. For many years Sir Henry Littlejohn acted as adviser to the Local Government Board, and in 1873 his services were recognised by his formal appointment as Medical Officer of Health, a post which he held until 1908. At the same time he was Police Surgeon, and was constantly occupied in investigating criminal cases and in giving expert evidence in both civil and criminal cases. In 1867 he took an active part in the foundation of Medical Jurisprudence in the University in succession to Sir Douglas Macalgon. No greater contrast could have been imagined between the two professors—the one tall, grave and dignified; the other dapper, humorous, vivacious, and full of life and活力.Always which go to impress on his hearts the point of a story or the lesson of a case. In his hands, truly, the dry bones of medical jurisprudence and toxicology lived.

His statement, although it was already at an age when most men seek rest and retirement, was universally hailed as the best that could have been made, and in the University chair, as in his other capacities, Prof. Littlejohn was an unqualified success. Notwithstanding all the calls on his time made by his multifarious duties, Sir Henry Littlejohn found opportunity for interesting himself in charitable and philanthropic work. He was one of the founders of the Sick Children's Hospital; he was an Elder in St. Giles Church, and regularly attended the daily services. His position, it need not be said, was fully recognised by his profession and others. In 1875 he was President of the College of Surgeons, and in 1883 President of the Royal College of Physicians of Edinburgh, and in 1886 President of the Institute of Public Health, and in the same year the University granted him the degree of L.L.D. In 1864 he was knighted, and in 1897 he was made a Companion of Honour, and was hailed as a true

Dr. David McGregor.

The late Dr. David McGregor, who died last week, was a holder of the Scottish Triple Qualification. He was bacteriologist to the Royal Infirmary, Edinburgh. About six months ago he obtained from the managers of the buildings three months' leave of absence on account of the state of his health. In early life Dr. McGregor was a teacher, and he was at one time second master of Henderson Street Public School, Glasgow, and head of the local branch of the Royal Infirmary. He afterwards took up medicine, and upon completing his curriculum he gained at Glasgow University the Foulis Memorial Scholarship, which is awarded to a graduate in bacteriology. He then held a capacity for original work in the department of pathology. Dr. McGregor then proceeded to Berlin, where he made a special study of bacteriology. When his studies were over he returned to Edinburgh, and practised as a bacteriologist in the south side of the city, but at the end of five years he removed to Hermit Street, and gave up private practice. In 1866 he was appointed assistant pathologist at the Royal Infirmary, and in position which he retained until 1900, and in December of the following year he became bacteriologist, while he was also lecturer on bacteriology at St. Mungo's College. Dr. McGregor was the author of several articles of considerable interest to the medical profession. He was 58 years of age, unmarried, and a native of Kilwinning.

The Scottish Medical Journal.

The Scottish Medical Journal is a monthly publication, the object of which is to promote the advancement of the medical profession, and to afford an opportunity for the interchange of views among the medical profession. It contains a variety of topics of interest to the medical profession, such as medical news, medical cases, medical lectures, medical literature, and medical statistics. The journal is published by the Scottish Medical Journal Company, and is available online. The journal is well-regarded for its high-quality content and its contribution to the advancement of medical knowledge.
REVIEWS OF BOOKS.

THE ILEO-CECAL VALVE. (a)  
This monograph may be taken as one of the symptomatic products of a generalisation of specialism in surgery, in which the producer can look neither to the right nor, left, but always along the barrel of his colli-imator tube. The introductory portion of the booklet is crowded with opinions, details, and references to anatomical authorities, and the enthusiasm of the junior inquirer must experience some discouragement on being told that "there is no complete agreement among anatomical authorities" as to the characteristics of the normal valve, and that "though some observers would have us believe that the condition and relations of the parts are little, if at all, altered by dry preparation (Struthers, Parti) others (Toldt) (Toldt) so far removed is the subject." This statement is directly followed up by the summarising intelligence that: "In the description of details the same divergence of opinion prevails." An outsider would probably have anticipated that modern methods of scientific research would have by this time furnished more defined results. The old story of the discordant views of travellers on the subject of the cutaneous tint of the chameleon seems to constitute no further difficulties.

After the presentation of a multiplex series of views regarding the structure and appearance of the ileo-cecal valve in post-mortem conditions, we meet with the discouraging announcement: "But there is no record by any hands to the knowledge of the writer of the subject from which the specimen was obtained has been dead." In reading this sentence we were reminded, with a pang, of the decay of modern English syntax. The author has evidently taken considerable pains in the collection of his material, and has illustrated his text with three coloured and twenty half-tone plates, which the reader will find very instructive.

OPERATIVE SURGERY. (b)  
This handsome volume has been published, as the author tells us in his preface in response to a demand amongst post-graduate workers in Trinity College, Dublin. It has not been written for students, as students are taught operative surgery to-day, but it deserves a very wide circulation, amongst the class for whom it has been written, the younger surgeons. The style is simple and attractive, almost conversational; the illustrations are excellent and instructive, and in the setting forth of the various operative procedures we are convinced that the author has carefully considered views of a surgeon of ripe experience. It is, in fact, the personal note of the book that constitutes much of its attractiveness.

The opening section on general surgical technique is lucid and practical, without being didactic. In the section on anaesthetics, however, the author lays himself open to a slight charge of inconsistency: "chloroform," we read, "should not be employed if a bottle of ether and a handkerchief are available." Yet later on he recommends the use of chloroform in certain cranial and cleft palate operations. It is a small point, but we are inclined to consider the strictures on chloroform as perhaps somewhat sweeping, though characteristic of Dublin teaching.

Section II, is devoted to the operative surgery of the head and neck. The plan of describing each operation in successive stages from the first incision up to the insertion of the sutures is an admirable one. Each operation is so described, and the reader easily forms a clear mental picture of the procedure.

Some ten pages are devoted to a careful consideration of the surgical treatment of tuberculosis of the cervical lymph glands. This is quite the most carefully written resume we have read upon this subject; starting with a summing up of the pathological changes usually found, the author goes on to the measures to be adopted in his review.

marks with a pregnant suggestion as to the advisability of routine estimation of the eosinopenic index in these cases, and then to the special mention of tuberculin to raise the patient's resistance. The ensuing account of the operative technique is detailed and excellent.

This is an admirable account of thyroid surgery. Special emphasis is laid upon the importance of submitting cases of exophthalmic goitre to surgical treatment before marked degenerative changes have set in in other organs. The various surgical procedures for the relief of this complex malady are discussed adequately, including Jackson's operation for exophthalmic goitre which appears to have a very definite value in cases too far gone for more serious surgical interference. The chapter on cancer of the breast is very well written, and finely illustrated, but we noticed an absence of a clear distinction between its post-operative breathing exercises, or the employment of autogenous vaccines.

The operation of gastrectomy is well described, though we think that insufficient stress has been laid upon the sensitiveness of the pancreas to trauma during the procedure, in view of the emphasis laid on this point by Mikulicz and Moomihan. Any severe manipulation of the stomach has been shown toKiiklaie seriously the mortality of this operation. A concise resume of the recent work of Jameson and Dohson on the gastric lymphatics forms the basis of the account of the operative procedures for the relief of gastric atrophy. The author emphasizes the desirability of excising all gastric ulcers owing to the frequency with which cancer has been shown to originate in simple ulceration. The author advises the intervention of the surgeon for appendicitis at the earliest possible moment. The varying conditions of the peritoneum permit of an association with appendicitis and the consideration of the various operative procedures appropriate for their relief, are admirably described. The surgery of carcinoma of the large bowel and rectum occupies some seventy pages. The whole level of the book is so uniformly good that it is difficult to say what is best; but it seems to us that this particular section could not be improved upon.

In his account of the surgery of the gall passages, the author follows mainly the work of Mayo Robson and Kocher, but lays particular stress on the method of preserving the vascular supply of the liver. The operation of vesical surgery, occupies over 100 pages, and is well up to the level of excellence displayed throughout the whole book.

We wish the author the success this book so thoroughly deserves, and express the hope that its appearance may stimulate that of other surgical monographs from the Dublin School, where the art of surgery, if mute, flounders no less than that of obstetrics.

GAS POISONING IN MINING AND OTHER INDUSTRIES. (c)  
We received this excellent monograph with extreme pleasure, and have perused its pages with continuous instruction. Its appearance not merely "supplies a want," real or imaginary, as we find occasionally acknowledged by the author in his preface, but even the jaded reviewer; it supplies a mine—let not the reader suspect a pun in connection with the discussion of a volume which has so much to say about mines—of important and interesting facts, both theoretical and practical, on a most important subject. As it is truly stated in the luminous preface of the volume now before us: "Gas poisoning cases, then, both major and minor, are greatly, and in an increased and par degree, further increase." And in presence of this unques-  


(c) "Gas Poisoning in Mining and Other Industries." By John Glaster, M.D., M.Glas. D.P.H. (Camb.), F.R.E.S., etc., etc., Professor of Forensic Medicine and Public Health, University of Glasgow; and David Dale Logan, M.D., Glas. D.P.H. Surgeon to the Colliers Ironworks, Newmains, etc. With Plans, Coloured Plates and thirty-six other Illustrations. Edin- burgh: E. and S. Livingstone, 1914.
NUTRITION, (a)
The author, after rightly warning the student of scientific nutrition against " conflicting doctrines expounded by sincere but obsessed philosophers, modestly introduces his "authoritative" little treatise." This is prudent, because in the earlier chapters of his book, Mr. Sohn leaves the domain of analytical chemistry with which he is familiar and enters the field of physiology—a field abounding in pitfalls for the unwary. Experiences of the kind were naturally expected to keep clear of these, but unfortunately this has not proved to be the case, and numerous errors in physiology have crept into this part of his narrative. Thus, the tissues are defined as small oval glands which secrete mucus to lubricate the fancies. Protoplasm in all the higher forms of life is said to be enclosed in a protecting wall of cellulose; nutrients are said to pass through the walls of the villi by osmosis, and osmosis is defined as the passage of a dissolved substance through a membrane. These instances are in a sense pardonable, but so much cannot be said for the obsolete classification of proteins given, nor for the statement that xanthine bases are absent from nucleo-proteins, and still less for the long-abandoned description of inositol as a carbo-hydrate. The author has confused nucleo-proteins with a class of proteins formerly known as nucle-albumins and now as phospho-proteins (casein and vitellin, etc.) are distinguished from the nucleo-proteins by the absence of xanthine bodies. As to the nutritive value of foodstuffs, it has been explained that "it has been proved to be a benzene compound—probably an aromatic alcohol.

Passing over these early chapters, the remainder of the book is, to the whole, good. The author is at home in the chemistry of foods and in his description of the composition and properties of the various classes of foods in the succeeding chapters. He draws, however, too hard and fast a line between tissue-forming and other foods. He is not justified in saying that gelatine cannot be converted into living tissue. It would be correct to say that gelatin, as the only protein, does not provide all that is necessary for tissue formation, which is a different thing. Rather too much stress is laid on the author's term "food ratio" (more properly called "nutritive ratio")—namely, the proportion of protein to non-protein articles of food, in the dietary. It is not necessary to stress all the suggestions close to the proportion of 1 to 5 as the reader is likely to discover. The author's experience has shown that vigorous health and muscular efficiency can be maintained on far lower ratios than this. Probably a ratio of 1 to 7 is all round better than 1 to 5.

Nor is the Mr. Sohn quite up to date in his views about the nutritive value of meat extracts. He cannot free himself from the old belief that they are mere stimulants, and makes no mention of the fact that


Folin and others have shown that the greater part of a quantity of creatin added to the diet is utilised as a food and never reappears in the excreta, either as creatin or creatinine. Thompson and his co-workers also have shown the considerable proportion of the nitrogen of beef extracts is retained, and that in addition they have an indirect nutritive value by causing a more thorough digestion and absorption of other substances. Pawlow and others who have used meat extracts have obtained a better and more active flow of gastric juice, and a Dutch investigator (Eykmann) many years ago found that extracts of flesh meat prevent or cure the polyneuritis which is caused by eating polished rice.

There is one remarkable omission from the book. No mention is made of the subject of vitamins and the important field in the subject of nutrition which their discovery has opened.

It would have been better on the whole if Mr. Sohn had been content to omit from his book all reference to physiology and to give it the title of "Nutrition Instead of "Nutrition." Of those who are not sufficiently informed to be able to grasp the bearings of the data thus obtained. The most fascinating chapter in the book, to our mind, is that in which the author explains the normal and abnormal relations of the blood pressure and the viscosity of the blood. As the investigation of the viscosity of the blood may not be common knowledge, it should be explained that by means of a simple apparatus invented by Hess resembling, roughly speaking, a wet and dry bath thermometer, we measure the viscosity (or viscosity) of the blood, a process which only takes three or four minutes. Now the author, as the result of much painstaking direct observation, is in a position to formulate certain rules of the greatest importance, for instance: When high arterial tension coincides with a high grade of viscosity, we are dealing with merely functional hypertension amenable to symptomatic treatment, on the other hand, if it persists this suggests a functional disturbance, or high arterial tension, the case is one of cardio-renal sclerosis at a more or less advanced stage. It must be plain to everyone that this distinction is of the greatest therapeutical and prognostic importance: it is one, moreover, difficult to establish in any other way.

Incidentally, considerable light is thrown on the vexed question of the vasodilator action of the iodides. The author points out—that no such action can be demonstrated to exist, but it must not be inferred that this medication is therefore useless. One thing seems certain—viz., that the high-tension blood coagulates more quickly than the low-tension blood. This is not surprising, as the heart and kidney in high arterial tension are abnormally warm, and the viscosity, that is to say, clinically, in all cases in which the reserve functional energy of the heart and kidney is markedly diminished, especially in presence of a thrombosis or embolism of the arms and legs, very much contraindicated: indeed, they may determine formidable complications. On the other hand, in phlebitis, uremicmy, gouty and diabetic subjects with high tension and a high grade of viscosity, with a high grade of viscosity, the hyperplasia, heart and comparatively healthy kidneys, then the iodides may, if associated with suitable dietary, lower both the tension and the viscosity, thus obviating the otherwise inevitable consequences of the circulatory disorder.

Among other valuable data the author explains at

length the different forms of renal impermeability, and much of this is now forgotten. There may be only urea retention or chloride retention or water retention, each of which can be gauged and its importance in the determination of the morbid syndrome defined. It is impossible to exaggerate the importance of these data in the selection of treatment. The author goes very thoroughly in fact; one third of the work is devoted to cardio-renal therapeutics.

These remarks may afford some idea of the scope of this work. The book is extensively revised, there is an exhaustive chapter on the measurement and significance of the blood-pressure, and much space is devoted to the mechanism of production of asystole, angina pectoris, aneurysm and arrhythmia.

On the whole it is a most fascinating work, which we can cordially commend to the notice of those of our readers conversant with the French language who desire to place themselves au courant of the most recent discoveries and innovations in the detection and treatment of cardio-renal states. But why, oh why, will French authors persistently abstain from giving us an index, the place of which is very inadequately taken by a table of contents?

NOTIONS PRATIQUES D'ÉLECTROTHERAPIE APPLIQUÉE À L'UROLOGIE.

This volume forms an exhaustive text-book of its very interesting and important subject. We know of no other work of the domain of urology in surgical practice has long been recognised, and of recent years the latest conquests of scientific advancement have been successfully utilised in making diagnosis therein more easy and therapeutic, at any rate, more satisfactory, more useful, and the science of which nearly everyone still continues to expect a great deal more. If the Pentateuchal dictum was that the blood is the life, the ultra-modern materialist would probably say at least to substitute electricity for blood. And one of the most brilliant of living exponents of the mysteries of physical science used to state most emphatically that "electricity is ether." We are not quite sure whether he still continues to hold with the same vigour of intellectual prehension the item of scientific dogma thus so definitely enunciated. The subject of electricity is so thoroughly temptations to the quack—both physical and theological—that its exponents have inevitably brought its fair fame into some disputable discussion and company. But the present volume is the work of a trained and conscientious expert, and as such deserves the attention of all interested in so far as we know he had no worthy predecessor in the domain in which it so clearly illuminates.

LITERARY NOTES.

We have received from Messrs. Baillière, Tindall and Cox a copy of the eighth edition of the late Dr. Murrell's much appreciated "Aids to Forensic Medicine and Toxicology," The volume is too well known to require description, and the publishers have been fortunate in securing the services of Dr. W. G. Atkinson-Robertson for the work of revision. Under his superintendence the book has been thoroughly revised, considerably enlarged and brought up to date. Some rearrangement of matter has been carried out—indeed we think it in our opinion with advantage. We think the latter portion of the book, which deals with toxicology, is the best part, and bring out in a more compact way. The means of refreshing the memory in these subjects this little book is without equal, and if judiciously employed it should prove of much service to the student and practitioner. The price is 2s. 6d. net.

From Messrs. J. and A. Churchill there comes a copy of the seventh edition of the Pharmacopœia of the Hospital for Diseases of the Throat, Nose and Ear (Goldsmith's Hospital). The issue of this edition is opportune and unique, as it practically coincides with the jubilee of the foundation of the hospital. The Pharmacopœia has been thoroughly revised, and the recognition that has been accorded to modern therapeutics in this branch of medicine. A pleasing feature is the arrangement side by side in each prescription of the dosage of the various ingredients in the metric and English systems. The Pharmacopœia has been arranged alphabetically throughout, and this is considered sufficient to make an index unnecessary—a conclusion with which we do not agree. The Pharmacopœia is most representative, and contains many valuable prescriptions suited to the treatment of affections of the ear, nose and throat. The price is 2s. 6d. net.

MEDICAL NEWS & PASS LISTS.

Infectious Disease in London.

The Metropolitan Asylums Board having taken over the work of providing for war refugees and many other duties, the institutions under their control are in consequence mostly overcrowded. At the same time there has been a great increase in infectious disease in the metropolis, chiefly in diphtheria. At the meeting of the Board on Saturday last a letter was read from the Southwark Guardians complaining of the difficulties experienced in obtaining the admission of a child suffering from diphtheria into one of the public hospitals. The letter was referred to the General Purposes Committee, without power to act. It was stated that on September 20 there were 5,102 patients in the Board's fever hospitals, compared with 3,796 a fortnight previously—an increase of 356.

Exhibitions at the Medical Schools.

The Junior Science Scholarships—A. E. Sawday, Guy's Hospital preliminary science class, £125; and S. A. Sharpe, Guy's Hospital preliminary science class, £125. Entrance Scholarships in Arts—J. W. Sharp, St. Paul's School, £120; and M. W. O'Bryan, Oratory School, £70. Open Scholarship in Dental Mechanics—A. H. Bowes, £150; Scholarship in Dental Mechanics for Pupils of Guy's Hospital—W. B. Farrington, £30.

St. Bartholomew's Hospital.—The Senior Entrance Scholarships in Science, value £55 each, have been awarded to H. B. Bullen, B.A., of Clare College, Cambridge, and C. H. Terry, B.A., of Balliol College, Oxford. The Junior Entrance Scholarships in Science have been awarded to A. Durning and J. R. Swinney, of Bridgehampton Grammar School, equal, and the Jefferson Exhibition, value £50, to A. B. Bernard, of Dulwich College, £30.

At Westminster Hospital.—Guthrie Scholarship in Arts (£60), J. G. Wilson, Colle Grammar School, Lewisham; Natural Science (£60), F. S. Davies, University College, London; Anatomy and Physiology (£50), N. M. Lewis, Cardiff Medical School.

London (Royal Free Hospital) School of Medicine for Women.

The following Entrance Scholarships have been awarded by the University of London—Two St. Dunstan's Medical Exhibitions of the value of £60 a year for three or five years to Miss K. M. Matthews (Kentish Town Secondary School) and Miss E. W. Simpson (St. Paul's Girls' School).

Isabel Thornc Scholarship of the value of £30 to Miss D. Pantin (St. Paul's Girls' School).

Mabel Sharman Crawford Scholarship of the value of £20 a year for four years to Miss L. C. Adam.

The Conjoint Examining Board of England.

At the Second Professional Examination in Anatomy and Physiology, held by the Royal College of Physicians and Surgeons of England on September 24, 25, 26, and 28, 62 candidates presented themselves, of
It is announced that the Sub-Committee of the St. John Ambulance Association which has been appointed to care for the welfare of the Indian troops proposes to equip a hospital of 200 beds at Alexandra in order that the Indian wounded who have been discharged from the base hospitals may be given an opportunity of gaining health and strength in a climate suited to their condition. A small staff of non-commissioned officers and nurses will also be undertaken, and it is proposed to supply warm clothing and comforts in the field. An Indian Soldiers’ Fund is to be opened, and an appeal will be made to the public in a few days.

The military authorities have accepted the following offers of help from:—

The Royal College of Physicians of Edinburgh, the Royal College of Surgeons of Edinburgh, and the Royal Faculty of Physicians and Surgeons of Glasgow.

The following candidates having passed the requisite examinations of the above Board on 3rd October, 1914, were admitted to the subway:—

BRIEF.

The Army Medical Service—R.A.M.C.

Among the interesting reports from medical men engaged in or near the fighting line, is one from Mr. James Donelan, M.Ch., M.B.R.U.I., Chevalier of the Crown of Italy, Surgeon to the Throat Department of the Italian Hospital, London, published in the Pall Mall Gazette. Recounting his experiences with the French Red Cross Ambulance Staff, Mr. Donelan, who rendered valuable services at Crépy, says that here “the Germans have behaved in their principal habitations. They seized the mayor and nine of the principal inhabitants as hostages, being highly suspicious of the remedies proposed. The Town Council arranged to place at their disposal four large emporiums containing practically everything that they asked for—food, ambulance equipment,asters, beds, and other requisitions. The Town Council, impatient to have its inhabitants back, and to keep away silt curtains, clothes, personal and household linen, and ornaments. Some of the German wounded who were afterwards brought into the Ambulance had silver spoons, forks, and jewellery belonging to the inhabitants hidden in their long boots. One fellow had three silver spoons in his boots.

After four days’ German occupation the French returned. They may be young men, but they had cases too bad to be removed, were sent down to Dieppe. The Germans had taken away twenty wounded British and six wounded French soldiers who had been in the hospital.

‘The French brought in twenty German ‘trainards, et autre queue de bataille’ (spies, stragglers, and thieves), more or less wounded. It was found subsequently that nearly all of them had revolvers concealed in their mattresses, which had escaped detection when they were arrested.

During my stay I was taken up in a French Ambulance to Pierrefonds, whence we crossed to Villers-Cotterets. The ground there was then steeply sloping towards the Aisne. On the rising ground three or four miles away I could see a great cloud of smoke that looked like a large forest fire. It was that distance small white clouds rising above the trees and bursting.

My companion explained that these were German shells bursting over the French lines. Even at this moment a large number of shells were bursting all along the line, and many killed and wounded were being brought to the hospital. An Indian Hospital Train was already there, and was brought up as fast as others could be found and brought up.
distance the din was frightful, and seemed to be composed of a series of booms, screams, and crashes. Except this and a sort of rising mist there seemed to be nothing peculiar, for the nature of the ground made it impossible to see anything of the troops.

In the course of an interview with a Dutch journalist, eight French Army medical men gave a thrilling account of their recent experiences in Belgium. At the moment the German forces were advancing, but the news was not published in Holland; "they remained in the city in order to take care of the wounded, which they did together with their German colleagues. In accordance with the Convention of General Hospital Ethics, the wounded were not allowed to leave again for France via this country.

"We were not allowed to go South," they said, "because of the military situation. We have been at the war from the very beginning," they further related, "having wounded, with the French, some 1000 miles. The spirit amongst the wounded was excellent. On the whole, they are brave and wish to go back to the front. Of the dumd bullets or other bullets prohibited by International Law for use against civilians, we have received in the hospitals of either party. The ambulance and hospital facilities were excellent on both sides, but we had one great objection, viz., that the wounded were invariably dismissed too soon. Often their wounds had not yet healed and this may give rise to complications that will cost them their lives. It happens sometimes that soldiers with imperfectly healed shotwounds in the side have to make a two hours' march, and we are of opinion that public attention should be drawn to this fact."

Mr. Donelan condemns the methods of medical examination adopted at Folkestone of the passengers arriving there from the Continent, and states that things were managed far better on the French coast.

Dr. L. Tasker, of Alexandra, Park, N., who is serving with the 4th R.M.C., gives his experiences to the Islington Daily Gazette as follows:—

"The real sights of war are more terrible than anything anyone can make up in thought. I am quite well, and we are well fed, but we work like Trojans.

"We are quartered in a series of one-story buildings, as we stand, too tired to go through the formality of unpacking, and not knowing what time we may be called up to attend on some poor fellows—some slightly wounded, with others French--dying... We live in the roar of cannon. They start at early dawn, and continue until after dark. It is terrible.

"The great battle still continues. In our progress through the country we find that the majority of the villages are deserted, the people having fled before the German advance. The weather is very wet, and the continuous moving of transport, guns, etc., have kept us on the move.

"You would not know the smart British officer with his unshaven chin, mud up to the waist, dirty hands. As for Tommy, he looks like a Tartar. What else can you expect when they eat and sleep in the open and lie for days in wet trenches? The people of England can and never will realise what war means until a force lands there.

"A similar thing happened on the 5th and 6th, immediately on my joining No. — Field Ambulance I was sent with the. On the 5th I was able to keep well under shelter of the fire, although a few shells burst about a hundred yards from where I was. On the 6th the wound we were ordered out with them. We had to take three successive hillyroads. Our fellows took the first easily. However, in the wood a German aeroplane spotted and reported us to the artillery, and we had to clear out of that in double quick time, as they shelled us furiously. We then cleared the second hillyroad, and afterwards went for the third. We had reached the crest with little opposition when all at once—bang!—and we were gone all round, and we were trapped. Bullets whistled and crisscrossed. I dropped into a drain alongside a mountain path, and our brave soldiers extended and went into action like on manoeuvres. I lay in the stream-path while the bullets whistled over me, and now and then dug into the sand near me. Still I felt fairly safe from rifle bullets, but, alas! the artillery had found their range, and started shelling us with shrapnel, and the like. You can imagine the sights. ... I continued to lie still, wondering at what moment a piece of shell would end it all. Men were being shot all round. It became too hot in our corner, and we were told to lie down and retire, and as we crept along we were shelled and fired at. Men fell all round, still I was un wounded. Breathless and exhausted, we reached cover, and there I stopped to dress two badly wounded men. Bang! bang! The shell burst over our heads. We were on all fours over stones, earth, and terrible stink. My hat was carried away, but I got off with a slight flesh wound around the forehead. Then our fellows began to advance, and I was left to look after the dying. That day we won all along the line. Our battalion slept on the side of the road. The ground was wet, and we had no food, still we slept through absolute exhaustion. The officer who slept with me that night is alive now, but a long way from the head. And so the war goes on. It is awful!"

NOTICES TO CORRESPONDENTS, &c.

ED Correspondents requiring a reply in this column are particularly requested to make use of a distinctive signature or Initial, and to avoid the practice of signing themselves "unofficial." The additional initials "M.C." Much confusion will be spared by attention to this rule.

SUBSCRIPTIONS.

Subscriptions may commence at any date, but the two volumes each year begin on January 1st and July 1st respectively. Terms per annum, 2½s.; post free at home or abroad. For St. John's the sum of 5s. is payable in advance. Number 8,000. New Subscribers are requested to state their address in full, with the name as it appears on a Cheque. The proprietors and managers cannot in any case be held responsible for letters. The Proprietors are not responsible for subscriptions not accompanied by a remittance. Remittances should be made by Mailed Money Order, Postal Order, or Banker's Draft.

ADVERTISEMENTS.

For One Insertion—Whole Page, £3; Half Page, £2 10s.; Quarter Page, £1 5s.; One-eighth, 12s. 6d. The following are considered standard rates—Whole Page, £10 insertion, £2 13s. 10d.; 26s. at 50s. for 25, and pro rata for smaller spaces.

Small announcements of Practices, Assistantships, Vacancies, Books, etc.—Seven lines or under (70 words), 4s. 6d. per insertion; 6d. per line beyond.

SUFFERINGS OF THE WOUNDED.

An English correspondent resident in France writes us:—

"There is considerable excitement here due to the periodical arrival of the wounded French soldiers from the battlefield. The last batch arrived at midnight and we went working without a moment's rest. I have been attending to over 300 patients this evening. The poor fellows had been there for four days in the train en route. Most of my time was spent on the dressing and administering chloroform at the operating table. It is one of the worst hospital jobs ever known, and the sight is really appalling. If you know any young surgeons anxious for practice, there is plenty of work for them here in the operating theatre.

Dr. S. O. (Wales).—If there are any signs of threatening breakdown in compensation, the patient should certainly not be allowed to go on to term. Most statistics show that the expectation of life in morbus cordis is materially diminished by repeated pregnancies.

THE GUILD OF ST. LUKES FOR MEDICAL MEN.

We are requested to state that the annual service previously arranged at St. Luke's Church, London, under the auspices of the above guild, will not take place this month owing to the war. A similar service at Bath has also, we understand, been abandoned.

Can any of your readers give any information concerning the "Italian Physico-Chemical Academy of Palermo? The President is desirous of hearing from Messrs. Monte Carlo, who are to conduct a certain secret scheme, inviting medical men in this country to become Honorary members and to receive mail in token thereof, for which they are to pay 100 francs each.

ROYAL COLLEGE OF SURGEONS OF ENGLAND.

A series of Museum Demonstrations, intended for advanced
Meetings of the Societies, Lectures, &c.

THURSDAY, OCTOBER 8th.

The New London Dental and Prosthetic Hospital (Western Skin Hospital, N.W.4).—4:15 p.m.: Clinical Meeting.

MONDAY, OCTOBER 12th.

MEDICAL SOCIETY OF LONDON (11, Chancery Lane, Cavendish Square, W.1).—3:30 p.m.: introductory address by the President, Sir John Bond-Salton, F.R.C.S.

TUESDAY, OCTOBER 13th.

ROYAL SOCIETY OF MEDICINE (SECTION OF DERMATOLOGY) (1 Wimpole Street).—3:30 p.m.: The following cases will be shown:—Dr. J. H. Sequeira (1), Sequeira (2), Myco-sarcoma, Quincke’s oedema, Nodules of the Nails. Dr. S. E. Dore, Multiple soft fibromata, and other cases.

Vacancies.

Certifying Factory Surgeons. The Chief Inspector of Factories announces the following vacancies for certifying factory surgeons:—MORSTRAE: Dr. J. H. Sequeira (1), Sequeira (2), Myco-sarcoma, Quincke’s oedema, Nodules of the Nails. Dr. S. E. Dore, Multiple soft fibromata, and other cases.

Appointments.


Lewis, E., L.R.C.P.Edin., and S. Edin., L.R.C.P.Edin., Medical Officer of Health to the Kilmarnock County Council.

Mickle, H. B., M.B.Lond., Assistant School Medical Officer to the Reading Educational Authority.

Birtsh.

Bailie—On October 2nd, at 11 South Garden, Cambridge, the wife of Hamilton A. Bailie, M.S.Lond., of Norwich, of a daughter.

Ball—On October 2nd, at Tinsley, Shantung, N. China, the wife of Harold Lee, F.R.C.S., of a daughter.

Brown—On October 2nd, at 27, West Street, Scarborough, to Dr. and Mrs. R. J. Brown, of a son.

Burse—On October 2nd, at 6 West Street, Scarborough, to Dr. and Mrs. J. B. Dick, of a son.

John—On October 2nd, at Egerton House, Chester, to Dr. and Mrs. J. J. John, of a daughter.

Helm—On September 29th, at 105 Harley Street, W., the wife of N. Bishop Helm, F.R.C.S., of a son.

Hawker—On September 29th, at 3, Portland Place, W., the wife of Walter Hawker, M.B., B.S., of a daughter.

Hewer—On September 29th, at 105, St. Martin’s Lane, Strand, E. W., the wife of R. D. Hewer, F.R.C.S., of a daughter.

Parker—On October 2nd, at “Rathfin,” Newhaven, the wife of Frederick Parker, M.B., of a son.

Stowe—On September 29th, at 22, Suffolk, to Dr. and Mrs. J. L. Stowe, of a daughter.

Marriage.


Doughty—Jenkin—On September 29th, at St. George’s Church, Bristol, Surgeon John Doughty Burtett, R.N., H.M.S. “Prince George,” eldest son of John Burtett, of 55 Widdicombe Avenue, Ealing, to Dorothy Chassey, youngest daughter of Mr. and Mrs. John Fisher, 12 Charlotte Street, Bristol.

Hart—Jessey—On September 29th, at St. Paul’s Beckenham, George T. Hanks, M.R.C.S., L.S.A., of Warwick, Queensland, to Fanny Wyne, second daughter of the late Mr. and Mrs. James Wyne, of Wantage, Berkshire.

Le—McNab—On September 30th, at 74 Murrayfield Gardens, M.B., Ch.B., Lond., M.C., 1st Argylls, Inverness, Lieutenant James McNab, of the late John McNab, of Sutherland, and of Mrs. McNab, at Scarthing, Nairn.

Milne—Arnold—On September 29th, at Croft House, Montrose, Lieutenant Alexander Findlay Milne, M.E., retired, late Army Medical, Bombay Mint, of Moutb, Catts, Aberdeen, to Miss Olive Arnold, eldest daughter of Mr. and Mrs. Peter Arnold, Kirkcaldy, Kildermuir.

Welch—Sinnere—On September 30th, at the Old School House, West Newton, Kenilworth, Mr. Donald J. Alexander Findlay Milne, M.E., retired, late Army Medical, Bombay Mint, of Moutb, Catts, Aberdeen, to Miss Olive Arnold, eldest daughter of Mr. and Mrs. Peter Arnold, Kirkcaldy, Kildermuir.

Woolford—Hart—On October 3rd, at Saint Luke’s Church, M.D., of Monkseaton, north Shields, fourth daughter of the late Charles Stephens Carter, Esq., of 30 Coatham Road, Monkseaton.

Deaths.

Ballantine—On Sept. 28th, at 19 Rathbone Terrace, Edinburgh, John Alexander Ballantine, M.D., eldest son of the late George Ballantine, Esq., of Wredested Lodge, Cambridgeshire, and of Mrs. J. W. Ballantine, M.D.

Brett—On Sept. 21st, at Stratham, Tasmania, E. S. Brett, M.B., B.Ch., Lond., to Rev. Dr. H. Brett, of “The Elms,” Bridlington, of a daughter.


Harley—On Sept. 22nd, at Skendol, John Alexander Harley, M.B., Ch.B., West Africa, Retired Medical Staff, of the late Edith Harley, of Killyvat, Faluggage, and son of the late Alexander Harley and Mrs. Somerville Brown, M.B., Ch.B., of Eglinton Street, Edinburgh, to Miss Agnes Findlay, Registrar to the Home Secretary for New Zealand, Edinburgh, of a son.

Little—On Sept. 30th, at Benmore, Arrochar, Sir Henry Dunlop Littlejohn, M.D., in his 58th year.


Rankin—On Sept. 29th, at Braintree, in France, of wounds received at the battle of 21st, Captain Harry Sherwood Rankin, M.B., C.B., of the Royal Irish Rifles, M.B., C.B., Lond., of the London County Council, of the Beverley Retreat and Mrs. Rankin, of the House, Irvine.

Shaw—On Sept. 28th, while on a visit to Beaulieu, Harold William Shaw, B.A., Medical Superintendent of the Isle of Wight County Asylum, M.B., Ch.B., of Beaulieu, of M.B., Ch.B., of the House, Isle of Wight County Asylum, aged 55.

Thomson—On Sept. 30th, at Morlands Hospital, near Killoch, Sir Alfred E. Thomson, M.B., F.R.C.S., of Cape Town, son of the late Dr. Thomson, of Durness, County Down.

Vassallo—On Oct. 2nd, at Crofton Hill, Lanark, Mary Janet Vassallo, wife of Alex. H. Vassallo, M.B., C.O., 49 Priory Road, London, N.W., only child of Mr. and Mrs. William Vassallo, of Crofton Hill, Kilwinning.

Wilson—On Oct. 1st, at Tuchabridge Wells, Adam, wife of Dr. Newton Wilson, of 27, Whitecross Street, Edgbaston, and daughter of the late Henry de Pethener.

HULME DISPENSARY.

Dale Street, Streatham Road, Manchester.

WANTED A HOUSE SURGEON duly registered, and fully qualified. Salary £60 per annum. Annual inspection to be made with instruments, Government, at a fixed time, with testimonials, at once to Honorary Medical Secretary.
The Serbian Relief Fund is asking for surgeons to help in the treatment of the sick and wounded. They do not offer any salary, but guarantee expenses. This form of vicarious philanthropy at the expense of the medical profession, we venture to assert, is out of touch with modern tendencies. The day is gone by when medical men could be found in shoals ready to undertake any gratuitous work professed in the name of charity or humanity. There is, happily, not the least reason to suppose that the ideals of medical men will not be maintained at the high standard which has become a tradition in the land. At the same time their emotional instinct is becoming more tempered with reason. If the surgeon be ready to abandon his practice he is giving the equivalent of an income to the aid of the Red Cross and other relief agencies of the kind, and it is difficult to understand on what ground he should be expected to serve without an adequate salary. The Serbian Relief Committee, as a plain matter of fact, has to compete with the War Office, which offers pay at a rate, roughly, of about £500 a year to newly qualified medical men who join for the War. Unless the Serbian or any other special Relief Fund for the sick and wounded be prepared to pay their medical officers a correspondingly adequate sum, they may expect to find their organisations bare of surgeons. We go further than that and say that no Red Cross or relief work could ever relieve the sick and wounded unless they are prepared to recoup the medical men liberally for the great personal and pecuniary risks to which they are exposed by war service. The Serbian Government, if ready to accept such skilled service, should find the money needed for its remuneration, just as they are forced to pay for guns and other war-like munitions. If British philanthropists undertake to go to the succour of Serbian soldiers let them at least provide enough money to do the thing handsomely.

Considering the supreme importance of physical fitness for all those actually or about to be engaged in any form of active military service, it stands to reason that the medical examination of recruits, even in the present stress of circumstances, can hardly be too severe. We have commented on previous occasions on the mistaken kindness and false patriotism which would pass a man as fit who is suffering from any progressive organic defect that would develop rapidly under severe strain or upon exposure to cold and damp. Such a condition as incipient, latent, or partially healed phthisis, for instance, would, obviously, be wholly incompatible with the arduous work of a soldier; indeed, it is incredible that anyone could be found to think otherwise. The astonishing statement is reported to have been made the other day by no less responsible a person than the chairman of a local insurance committee that the open-air would be beneficial to men who had enlisted upon discharge from a sanatorium. In another case a man waiting for admission into such an institution is said to have rejoined the Army. That such a thing could have happened is impossible, unless the medical examination had been very incomplete, or the patient cured in the meanwhile. Statistics are not available as to the number of men who return home from the front victims of tuberculosis brought on from the actual conditions of warfare, but it cannot be inconsiderable. Meanwhile, too much care cannot be taken to exclude tuberculous disease of any part of the body when examining men for active service.

It is always a pleasant thing to record acts or expressions of gratitude for medical services rendered. During the recent revolution in China, Surgeon William Miller, of H.M.S. Britomart, gave such valuable assistance in the field and in the hospital at Kiukiang that he was afterwards presented with a gold medal and a diploma, together with a special address of thanks from the Chinese Government. The following is a translation, as given in the Naval and Military Record:—"China is one with the rest of the world in honouring philanthropic deeds and by presenting testimonials to preserve their memory; hence, during the war in the South (Kiangsi), when Surgeon Miller attended our wounded, bravely risking the battle, faced the bayonet, braved the firing, endured the heat of the day, was undaunted by the bullets which rained down, and faced the rifles, the arrows of the forest, all these dangers he risked in order to bind up the wounds, care for the sick, and remove the injured to the hospital at Kiukiang; and this he did ceaselessly. He was most assiduous in attending to the wounded, and desperately earnest in his deeds of mercy; whilst the skill which he exercised in the healing art was equal to the greatest traditions, and his gracious minstry to the living and dying was most tender. And so all my soldiers desire to express their gratitude and admiration for his goodness by having made for his acceptance a gold medal and banner which they respectfully present—a token of their loving respect—but to adequately express their sense of his glorious praise, which has so increased his merit, his name should be inserted in gold, and the fame of his love for humanity set forth in the
most beautiful language (literally recorded in "Seal" characters) of sincerity, as a fitting record of their gratitude to Surgeon Miller from Li Chun (signed by his seal), second year of Chinese Republic, fourth month, 1st day."

The nightly darkness into which

Darker London London has been plunged in order and its escape the threatened bombardment by German aircraft should not be without its lessons. A vast number of lights have been extinguished in our streets and within the next few days the police order of "lights out" will have done away with a good many more. In the height of the crisis, that now prevails, the nightly life of the great city goes on much as it did before the German Emperor made his bid for the world's supremacy. Traffic is carried on perforce at a more reasonable rate and so far has not been attended by any marked increase of street accidents. That pregnant fact should be noted by those interested in the control of street traffic. As a matter of fact, one of the chief dangers at present arises from an excess rather than from a deficiency of light. The dazzling headlights of the large private motors have a most confusing effect upon passengers in the darkened thoroughfares. On country roads one is familiar with their blinding glare. Here, they may be commended to the serious attention of the British Automobile Association, which has already done a great deal to harmonise the relations between motorist and public.

The Cost of Excessive Street Lighting. One solid fact that emerges from the passing gloom is the readiness with which the Metropolis can shear away half or three-quarters of her nightly illumination. The unavoidable conclusion is that a large amount of ordinary street lighting is unnecessary for civic purposes and its maintenance is correspondingly wasteful. The cost of maintaining a dozen street lamps where two or three would be sufficient falls, of course, on the shoulders of the ratepayer. In those districts which have no municipal supply the profits arising from extravagant consumption go to the shareholders of those concerns. There is, naturally, a good deal to be said of the principle that, by the use of street lighting, the well-lighted street is undoubtedly an important factor in the maintenance of law and order. Good lighting, however, is a thing apart from the excessive blaze that floods many of the streets of our chief centres of population. Any statistician who cared to enter into the figures would find enormous sums spent nightly in the mere outside or "display" lighting of the shop windows. The drink bill of the country, about which one hears so much, is probably far exceeded by our lighting bill. At a time like the present, when rigid economy is desirable at all points, the regulation of excessive street lighting is worthy the attention of the public. In many thoroughly thorofored streets, the shop lights render public lamps unnecessary, and the latter might be dispensed with to a great extent. In any case, a large proportion of street lights might be put out at midnight and economy effected in various other directions.

Distinctions return by British recipients of German military orders, uniforms and decorations to their donors that has been and is being carried out of late from the Soviet downwards contrasts strangely with the feverish and hasty acts of the professors in some of the German universities. In accordance with the crushing spirit of militarism which is the curse of the German Empire at the present time, these savants have boldly declared their intention to renounce all honours and distinctions bestowed on them by universities and scientific societies in this country. This renunciation is read in The Times paper, has given to the German Red Cross the medal presented to him by the Royal Society of Great Britain in honour of his discovery of the X-rays. The medal, says the Medical Record, is of gold to the value of £250, and it will be melted down. The Royal Institute of Public Health in London presented a medal some years ago to Koch, of tuberculosis fame, and now it is stated that his daughter, who is the wife of a Prussian general, has offered this distinction to a company which is melting down precious metals. In this case the medal is to be spared, as it is said to be of greater value as a curiosity. Others, we may suppose, will follow suit. So is the fair name of science dragged into the conflict by a spurious patriotism whose vision is hopelessly warped by the insensate worship of military rule. Knowledge, like the sun, shines far above the clouds of strife and passion, while the light of science continues to guide and illumine those from among every race whose eyes are open to receive her beneficent rays.

Medical Heroism at the Front. Further particulars have lately been received respecting the heroism of a Jedburgh medical man, Dr. J. Laithlaw Huggan, R.A.M.C., who was killed at the battle of the Aisne on September 16th. Dr. Huggan (says the Newcastle Chronicle) was attached to the 3rd Battalion Coldstream Guards, and, according to the testimony of Lieut. Soames, now returned to this country wounded, he behaved in a most gallant way, being recommended for the Victoria Cross only two days before he was killed. He organised and led a party of volunteers, whereby a number of wounded were all safely removed from a barn that had been set on fire by a German shell. The operations were conducted under a heavy shell fire, and the success of the enterprise was entirely due to the gallantry of Dr. Huggan. So strong deeds as these will live in the minds of men long after German "culture" has ceased to trouble mankind.


Dr. John Fletchee Little, M.B., M.R.C.P., of 33 Dorset Square, N.W., late of 1 Park Crescent, Portland Place, W., J.P. for London, who died last year, aged 35 years, left estate of the gross value of £19,004 12s. 1d.
THE DEPLETION OF HOSPITAL STAFFS.

The general deprecation of the medical profession on account of the War is already much in evidence in all parts of the United Kingdom. As in all probability the War will last for a year or more it is evident that steps must be taken in order to secure adequate medical service for the community in general. That phase of the question involved in the staffing of the hospitals, both voluntary and Poor Law, demands serious attention. In many instances members of the medical staffs of these institutions have thrown up their ordinary practice and have joined the Army Medical Service either at home or abroad, or one of the Red Cross or other voluntary associations for the relief of the sick and wounded at the seat of war. Under these circumstances the work of the hospitals has in many instances been brought well-nigh to a standstill, owing to the lack of resident and of visiting medical officers and consultants. The Army Medical Department is admittedly unequal to the strain imposed upon it by a great war, and in the present struggle its resources have been taxed to an extraordinary degree. Civilian medical men have responded loyally and enthusiastically to its call for help, but have thereby created a corresponding gap in the ordinary hospital service at home. It is clear that the large proportion of our population whose medical and surgical wants are provided for by the magnificent system of voluntary and Poor Law hospital service, must not be allowed to suffer from the depletion to any extent beyond the minimum unavoidable by humane prudence and foresight. The only practical steps so far taken have been a general relaxation of the stringency of final examinations, whereby many hundreds of students have received a legal qualification. A large proportion of these newly-fledged practitioners have been absorbed into the Royal Army Medical Corps. It is obvious, moreover, that the more responsible work of the hospitals must be entrusted to men of mature knowledge and experience. What is to be done under these circumstances? In the first place the tension might be relieved by increasing the number of junior surgeons and physicians and specialists in the large hospitals. In many of the out-patient departments one man has to do work sufficient to occupy the energies of half-a-dozen, owing to the traditional objection to the multiplication of hospital posts. It is not an uncommon thing for an out-patient physician or surgeon to see fifty to a hundred patients or more. There are plenty of energetic and highly-qualified medical men outside the hospitals who would be ready to share such posts. Then, again, the removal of the condition that bars private or general practice, at any rate in some of the minor posts, would increase the number of available applicants. If such minor posts, again, were salaried, their attractiveness and value to younger men would be greatly increased. Another point that may be considered is whether the services of men engaged in private practice could not be more widely utilised, both in voluntary and Poor Law hospitals. In the present difficulty the engagement of visiting medical men would certainly ease the strain upon the residents left in the latter institutions. Whether the foregoing suggestions be feasible or not it is evident that steps are needed to bring up the depleted hospital service to an efficient working standard. The indirect effects of the present War upon our hospital system are likely to be far-reaching and permanent, and, so far as can be judged, their tendency appears to incline in the direction of a State Medical Service. It seems not unlikely, indeed, that in the long run the Government may take the hospitals under their control, if only as a logical extension of the principle of State responsibility already embodied in the National Insurance Act. Meanwhile, to preserve the efficiency of our existing service is a matter of urgent national concern.

MEDICAL SCIENCE AND THE WAR.

It may be safely anticipated that when the history of the present colossal war is written no small share of credit and renown will be allotted to the medical men on all sides. As things go it is possible only to speak of our own share in the struggle, and from available evidence it is clear that the officers of the R.A.M.C. have played their part with a devotion worthy of the best traditions of our race. The risk to which they are exposed at the front is abundantly testified by the casualties amongst the officers, whose lists of killed, wounded and missing have attained dimensions that point to a portentous loss before the end of the war. The methods of warfare have been revolutionised during recent years, and the two factors of motor transport and long range actions have added greatly to the risks of wounds and capture that have to be faced by the army surgeon in the discharge of his duty. It is well that our countrymen at home should realise the conditions under which he does his work at or near the firing lines. First aid has often to be administered under fire, while field hospitals may be annihilated by long range missiles. Last week the newspapers described an incident in which the bursting of a shell over a hospital tent killed three nurses and several wounded. The fact of increased danger in the medical service, so far from deterring men from seeking to join, appears to aid as a sharp incentive to recruiting. At any rate, medical men compare favourably with other classes of our countrymen who have come forward with splendid enthusiasm to defend the cause of liberty. Any difficulty experienced by the War Office in providing adequate medical care for the wounded in France is certainly not due to the lack of medical men, of whom a large number have for weeks past been eagerly awaiting a summons from the War Office. If these men, regulars and volunteers, are not wanted for British troops it seems somewhat a matter for regret that their ser-
sives cannot be to some extent available for our Allies, especially for France and Belgium, which are nearer home and from which the hospital units could be recalled at a later stage if found necessary. The medical examination of recruits is now being conducted with despatch, and anti-typhoid inoculation is being carried out on an extensive scale. At the end of last week it was announced that Surg.-Gen. A. T. Sloggett had vacated his post as Director-General of the Army Medical Service on account of ill-health, and had been succeeded by Sir Alfred Keogh, who resigned the appointment only a few years ago. To the latter distinguished officer is due the extremely effectual arrangement by which the home military hospitals, denied of their orders, have been restaffed automatically and speedily by trained members of the St. John's Ambulance Association. There is little fear that Sir Alfred Keogh will meet the exceptional circumstances of medical service in the present war with energy and initiative, especially as regards the fuller use of the civilian medical help that has been so freely offered.

CURRENT TOPICS.

The Mitchell Banks Memorial Lecture.
The delivery last week of the Sir William Mitchell Banks Memorial Lecture in the University of Liverpool, by Sir Victor Horsley, afforded the latter the opportunity which he was not slow to take of lauding the memory of a great surgeon and teacher, and of pointing out his principal contributions to the advancement of surgical science.

There can be no doubt that in the surgery of malignant disease, especially carcinoma mammae, Mitchell Banks was the first to advocate the early and complete extirpation of the local disease and as much of the neighbouring glandular tissue as possible, and this principle has been widely adopted by surgeons ever since. The complete abolition of the sac in the operation for the extirpation of a cancer of hernia was another principle that Mitchell Banks always strove after, together with the protection of the hernial area by closure of the femoral canal.

In this interesting lecture, which will be found in full elsewhere in our columns, Sir Victor Horsley aptly calls attention to one phase of Mitchell Banks' activity—namely, the interest which he took in the daily life of his fellow-citizens of the city of Liverpool. Nothing was further from his heart than to be self-absorbed in his profession, and in this respect his example may well be followed by all who would seek to devote themselves wholeheartedly to the service of their fellow-men, and to assist in the physical and mental betterment of the race.

Pigeons and the War.
The disclosure of a vast network of German espionage in various parts of the United Kingdom has led to vigorous action on the part of the authorities. Special attention has been given to the ownership of pigeons by aliens, and a number of birds have been promptly seized and destroyed.

In one instance a German pleaded that he had recently bought the pigeons found in his loft to make a pie, but as they were valuable carrier pigeons able to fly a couple of hundred miles, and as it was shown he had kept them for a year, and had furthermore failed to register himself as an alien, he was sentenced to sharp and summary punishment. The breed of the bird is an all-important feature of the case, for as most people know, some pigeons are able to fly home for long distances with unerring instinct, while others would be unable to find their way back over a couple of hundred yards. In one case brought to our notice, an Englishman was the proud possessor of a number of prize-bred tumblers. The bird took first in the feeblest flight, and one day the owner turned out on the roof of his house a fine bird for its first flight. The pigeon promptly disappeared, and the owner watched for it with a pair of field-glasses for hours, when it happily directed its topsy-turvy flight back to the coop. His manoeuvres were promptly followed by a visit from two police officers, who had previously investigated the facts, and who were on this occasion accompanied by a pigeon fancier. The latter was shown the pedigree-book, and had no difficulty in endorsing the statement that the tumblers in question were of a particularly helpless kind so far as flight was concerned, but the pigeon-loft is still kept under strict surveillance. As a matter of fact, the somersaults described by the tumbler pigeon in its flight appear to be a form of epilepsy, the occurrence of which is readily explained by a reference to its bulging, shortened, and misshapen skull, which forms a complete contrast from the shapely and capable-looking cranium of the carrier pigeon.

The Metric System and the New Pharmacopoeia.

We are glad to see that the compilers of the new "British Pharmacopoeia" are encouraging the adoption of the metric system. There have been considerable diversions of opinion as to the practicability of its extended employment in this respect. The Preface decides as follows:—"With regard to the weights and measures of the British Pharmacopoeia, the metric system has been employed for all pharmaceutical and analytical computations. The metric system has also been employed for the specification of doses, in the expectation that in the near future the system will be generally adopted by British prescribers." The metric system in everyday medicine is one of those things that would be a great boon if once adopted, but it does not appear to be possible without inconvenience of the actual adoption. Our present system is a clumsy anachronism whose existence is its sole and unjustifiable excuse for existing. To find out how much of a substance is needed to make half a gallon of a 2% per cent. solution requires at present the mathematical genius of a Newton plus a technical literature of reference that would not disgrace a Carnegie library. Of course, we use the metric system fairly often. In all laboratory work we find nothing else and in the practice of therapeutics we cannot even now avoid it in our use of vaccines and sera. Of course, in prescription writing we shall be at sea for a short time, but we shall get accustomed to the change. We shall have to learn a good many new doses at any rate, and they will be no harder to memorise in metric than in imperial measure. Doses are given in "mils," a term which has had some vicissitudes during its thirty odd years of existence. It originally meant 0.001 grams for a short time, but we are being accustomed to the idea of a "c.c." Beyond this the measure is the same as what we are more or less familiar with and presents no real difficulty. Temperature is throughout measured in Centigrade, and this scale might well be adopted clinically. The hieroglyphic mystery of the old prescription is failing. Instead of dog-
Latin and scruples we shall use English and "c.e.'s." We hope the new scale will come rapidly into general use. In pharmacy at any rate it is high time for us to mend our weights.

Radiotherapy in Gynaecological Practice.

For various reasons the use of X-rays has not been very largely employed in gynaecological affections in this country, save in cases of uterine myomata, where operative measures have not been carried out, or in malignant disease. Cases of pruritus vulvae, whether diabetic or associated with the peculiar condition known as kraurosis, are certainly benefited by judicial exposure to X-rays. The use of small doses enclosed in suitable capsules, has also succeeded in bringing about a shrinkage of carcinomatous growths of the uterus or vagina. In an interesting communication Dr. Cuthbert Locker (a) is convinced that radiotherapy promises great things in the future for the relief of female ailments, and he quotes the opinions and experience of Continental authors in support of his belief. For instance, it is asserted that Kronig-Gauss obtained one hundred per cent. of "cures" with the Kronig-Gauss intensive treatment of uterine myomata. The average time needed for the production of amenorrhoea and shrinkage of a tumour is said to be about eight weeks, the total dose being 1,800 X. If 50 mg. of mesothorium be enclosed in a strong metal capsule it may be left in any portion of the genital canal for many hours together, until the characteristic mesothorium reaction—a blue coloration of the vaginal mucous membrane—be obtained. Other observers are enthusiastic with regard to the combined use of X-rays and radium. In view of the marked progress made by radiology during the past few years, it may be regarded as a useful instrument of gynaecological disorders, and, as Dr. Locker remarks, the best results for the patient are obtained by the two specialities gynaecology and radiology, working in unison—or rather, we should say, in harmony.

The Exchange of Prisoners.

As a rule the exchange of prisoners is a measure of relief to each of the militant parties concerned, and still more so to the prisoners, who are thereby restored to their loved ones. In the midst of medical men a further consideration arises from the fact that their services are of value in ministering to the sick and wounded soldiers among their own countrymen. In the present war the excessive and unusual number of casualties that characterises the campaign in all parts of Europe has almost from the first hopelessly handicapped the efforts of the comparatively exiguous band of available medical men. Hence a rapid exchange of army surgeons is imperatively demanded in the broader interests of humanity. It is to be hoped that the diplomacy of Europe will recognise this fact, and do its best to bring it forthwith to the notice of each and all of the combatant nations. A still better suggestion advanced recently by Mr. C. H. Grinling, of Woolwich, in the Daily Citizen, is that every R.A.M.C. officer or soldier taken prisoner should at once be liberatd. It is to be hoped the War Office may find time to attend to this matter.

The Health of Mill Workers and Miners.

In selecting as the subject of his introductory address before the Faculty of Medicine at Manchester University last week "The Industrial Diseases of Greater Manchester," Professor E. S. Reynolds touched upon some important hygienic problems affecting the daily life of some three and a half millions of people in Lancashire. It is a good thing to take stock of our present condition in sanitary matters, especially where great industries are concerned, and therefore it is satisfactory to reflect that the efforts of legislation, the decrease in the consumption of alcohol, the improvements in housing and the general conditions of work have all combined to render the lot of the mill hand and the miner far easier and their health much better than they were thirty years ago. With regard to the cotton trade the main causes of illness are still the inhalation of dust, insufficient ventilation and humidity of the atmosphere, though even these conditions are greatly improved at the present time. Professor Reynolds pointed out that certain diseases to which the miner is susceptible, but lead poisoning was the commonest occupational disease. It is often the case that workers with quite small quantities of lead will suffer most, probably because they are less on their guard than those who know the danger of handling the metal in bulk. Nevertheless, the good results of increased attention to these matters are apparent every year when the statistics of diseases affecting large numbers of operatives are examined.

PERSONAL.

DR. HAROLD LITTLE, M.A., B.C.Cantab., has been appointed Medical Officer of Health for Dunstable.

DR. CECIL BURT, L.R.C.P. and S. Ed., L.F.P.S. Glasg., D.P.H., has been appointed Assistant Tuberculosis Officer for Oldham.

DR. THOMAS H. OPENSHEW, C.M.G., F.R.C.S., has been elected Master of the Ancient and Honourable City Company and Guild of Wheelwrights.

DR. WILLIAM NICHOL WATSON KENNEDY, M.B., Ch.B. Edin., D.P.H., has been appointed Assistant Medical Officer to the Croydon Education Committee.

DR. HENRY HOLROYD, M.B., B.S.Lond., D.P.H., has been appointed Assistant Medical Officer of Health and Assistant School Medical Officer by the Norwich City Council.

DR. ROBERT ARMSTRONG-JONES, M.D., F.R.C.P., opened the discussion yesterday afternoon before the Society for the Study of Inebriety on "Drug Addiction in Relation to Mental Disorder."

DR. M. J. KENNEDY, Oak Lodge, Clondalkin, Dispensary Medical Officer for Clondalkin, has been appointed by the Lord Chancellor of Ireland to the Commission of the Peace for the County of Dublin.

A pair of spars was presented to the other day to Major Charles Robert Bourne, R.A.M.C. (T.F.), by the Falmouth Division of the St. John Ambulance Brigade as a token of appreciation of his services as Honorary Instructor, and also to congratulate him upon his appointment as Major.

The following have been appointed Temporary Assistant Surgeons to the Edinburgh Royal Infirmary for a period of six months, owing to the depletion of the assistant surgical staff—R. Charles Alexander F.R.C.S.Ed., Walter W. Carlow, F.R.C.S.Ed., James M. Graham, F.R.C.S.Ed., Frank E. Jardine, F.R.C.S. Ed., and Walter Q. Wood, M.B., Ch.B.

The Cross of Chevalier of the Legion of Honour has been conferred by M. Poincaré, the French President, upon Dr. Simon Flexner, of the Rockefeller Institute of Research. Dr. Flexner is well known in the medical profession in this country for his bacteriological researches in connection with the cultivation of the virus of anterior poliomyelitis.
Gentlemen,—The subject of the lecture this afternoon is "The Practical Treatment of Insomnia." But on a subject like this, on which many different views are held, one cannot embark without, to some extent, clearing the ground on the theoretical side, though I shall endeavour to do that quickly.

Insomnia is a symptom always: it is never a disease. In many text-books there is a reference to "idiopathic insomnia." That is the insomnia described by the ignorant man. We are all ignorant on this subject, and the best thing is to admit our ignorance, rather than trying to satisfy our consciences by describing it as idiopathic, or putting a long title to it or classifying it, and concluding that it is well.

Insomnia has been variously defined. The loss of the normal amount of sleep, is one definition; but that, on reflection, does not satisfy one. If I try to sleep in a front bedroom of a house in the Strand, obviously I shall suffer from the lack of the normal amount of sleep, but it will not be insomnia. Another definition is that it is the inability to sleep normally. Neither does that satisfy. There are people, such as myxoedematous patients, who sleep nine or ten hours, but do not sleep normally, and yet they have not insomnia. A fairly good working definition is, the inability to sleep normally under normal conditions.

Now we come to consider what is sleep? That is a nice problem for us to tackle. A French author said of life what we may say of sleep; it does not define itself, it simply manifests itself.

Sleep has been defined as the "resting-time of consciousness" by Mile. de Manacéine, a well-known Russian authority. This definition is neat, but full of fallacies, because our consciousness is not resting during sleep; it is merely transformed; the normal waking life is transformed into dream consciousness, but it is not resting. How can you define sleep without involving some of the physical sides of the phenomena? Hudson Foster has said that consciousness has no more need of rest than it has of nutrition, which is a neat criticism, and he says sleep is the resting-time of the support of consciousness. But when we talk about the support of consciousness we are entering upon a theory. Munsterburg, with his characteristic pedantry, describes sleep as "the normal periodical suspension, more or less complete, of conscious processes due to organic conditions." That is bad, because he gives a suggestion of cause, and thus states a dictum. Fraser Harris defines sleep in this way: "the physiologically diminished activity of the cortex cerebi together with the psychologically rhythmically recurring periods of unconsciousness terminating in a spontaneous return to consciousness." That is very clumsy and elaborate, but it contains much truth.

Halliburton has described it as "the period of normal repair and growth," and that is more satisfactory, and coming from Halliburton, one naturally listens to it with interest. My own contribution to this array of further definitions is, "the state of minimal normal activity, psychic and organic." Most of the other definitions suggest a cause or a theory of sleep. The chemical theories of sleep are the oldest, and, on the whole, they are the most out of date. There are the theories of carbon dioxide, and fatigue toxin. The carbon dioxide theory was resurrected with great pomp and ceremony by a very eminent alienist at the last meeting of the British Medical Association, at Brighton, last summer, and also at the International Congress. To say that I am sleeping because I am intoxicated with carbon dioxide is a thing you may prove to me by test-tubes and equations, but you will not convince me as a human being that that is the case. I know that if I am one of eight men sleeping in a close damp bell-tent, roped in, I have slept very heavily, but I am not the man I should be if I had slept in the open or in a shelter; and I have never come nearer to asphyxiation than in the bell-tent I mentioned. A better definition that state when I slept practically in the open. It is less easy to point to the fallacy in the fatigue-toxin theory. But let us lay it at rest with Halliburton's words: "It rests on the flimsiest of foundations." When Halliburton says that, we need not trouble further about it.

The second group of theories are histological ones, and they depend upon the work of Ramon y Cajal on dendrites and synaptic resistances. There are two phases in which these theories have been represented. One represents sleep as depending upon a shrinking whereby contact ceases in the synapses, so that there is a gap. The other set of theories are based upon the assumption that the opposite condition occurs, and that in sleep there is such a close union of dendritic processes that you are getting short-circuits in all parts, and thereby they would try to explain the incoherence or the irrationality of dream consciousness.

The third group of physiological theories with regard to sleep are the circulatory, and these are the most important. Sleep has been described as due to congestion of the brain, and it has been said to be due to anaemia of the brain. In 1888 someone described in the Lancet a cure for insomnia, which consisted in inducing passive congestion of the brain by some kind of breathing. On the other hand, it is now admitted that relative anaemia of the brain, or better, stasis in the cerebral circulation, is a concomitant feature of sleep; it is admitted that during sleep there is a slowing of the circulation. Leonard Hill uses this circulatory basis in this way: that sleep consists, in a particular control that we have over the circulation in the splanchnic area, so that when
we feel sleepy, we are really producing a dilated condition of the splanchnic vessels, with a compensating anaemia of the brain. Hale, on the other hand, says that when we go to sleep we produce again by a vaso-dilator process, a dilatation of the whole circulation of the periphery, that is to say, the cutaneous circulation, and that produces a compensating anaemia of the brain. On the whole, I think Leonard Hill's view is more acceptable. But let us get down from theory to fact.

I would first ask you to remember that we are never unconscious during sleep; in sleep we have a transformed consciousness. Instead of the relation of the ego to his environment being maintained, as it is during waking hours, we have a complete change, in which the ego goes through thinking processes, but without the same feelings of relativity. Unquestionably thought continues: the direction of thought is altered. There is, in dream consciousness, hardly any, if any, effort to control the thoughts. The thoughts very largely control themselves. Our conscious life ought to consist of a continuously controlled and directed stream of thought by association. But in dream consciousness the thought is completely uncontrolled, and it is all done by spontaneous association. The attention is diffused and dim, extending over a very wide field, instead of a small and whole, I think Leonard Hill's view is more acceptable. But let us get down from theory to fact.

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In the condition of the blood vessels you get the real common cause of insomnia, there is either hypo- or hyper-tension. If you have a man who is getting gouty, and whose blood vessels are inelastic, he is losing compensatory power over his circulation. You know the type of patient, not very young, but a gentleman of about seventy, who has been a vigorous man and lived well; and is now upon a meagre diet, which his doctor will not allow him to exceed. He sits down in the drawing-room after dinner before a warm fire and goes to sleep. As he fills everybody with concern at his behaviour, he is urged to go to bed. He does so, but next morning sweats he has not slept. This assertion is received with incredulity, but it may be true, for the factors which made him sleep in the drawing-room are reversed when he goes to bed. He has hard arteries. In the drawing-room he was in a relatively vertical position, and gravity was mitigating against his keeping awake. Moreover, he has his dinner to digest, and the splanchnic area has taken blood away from his brain for the purpose. Again, the warm fire has dilated his peripheral vessels, and in this way still more blood is drawn away from the brain. But when he goes to bed, every one of these factors is reversed. There he is more or less flat, and gravity, instead of helping sleep, makes it difficult, and there is less of what is spoken of as anaemia of the brain; the splanchnic area does not need so much blood, and the feet are no longer at the fire. So do not be too unsympathetic when the old gentleman says he has not slept. At that stage you may not be able to restore elasticity to the arteries, but you must encourage him to sleep on a high pillow, and have hot bottles to his feet. Also give him something stimulating to take at night; he could have something in a "Thermos" flask by his
Hypo-tension produces all its results in the way of insomnia in an opposite way to hyper-tension. The person with a low blood pressure,—110 perhaps—sleeps unsatisfactorily because there is no compensation about his circulation. The chlorotic girl with a low blood pressure has so little tone in her arterial system that she cannot get compensation up. So her cerebral circulation will be never good, and never bad.

I have spoken of relative anaemia of the brain, but I am not sure that it exists in insomnia. It is a matter of very delicate hydrostatics; there are some good physiologists—among them, I think, Starling—who maintain it does not exist. The brain is enclosed in an absolutely inelastic container, and it is the only organ of which that is true. We can speak of engagement in such organs as the kidney, liver, etc., because their volume may be altered according to the contained blood, but owing to its rigid case, the brain has to remain constant, for all practical purposes. During sleep what probably happens is that blood is passing through the brain at a slower rate than when the person is awake, and the nervous system is very sensitive to that change; sensitive not to anaemia, but to comparative stasis.

Dyspepsia is one of the conditions which most commonly militate against sleep; gastric distension is a well-known disturber of the sleep function. Many people do not sleep simply because of the vigorous growth of sarcines in the stomach, so that the increased bulk of the stomach compresses the heart and the splanchic circulation, and thus stimulates the circulation in the brain. But there are patients of the psychasthenic type who complain of this distension, and on never you do—starve them, diet them, give them carminatives—you will not cure them, because they are the subjects of neurotic distension. In many of these cases I do not think they keep awake because of dyspepsia, but it is a true neurosis, which is part of their case. Aqua menth., pip is good for this; so is turpentine. In these cases particularly, beware of the milk craze which I have referred to, though you will find the nurse look forward to it as the most sacred rite of the day. It produces only slight good, and by the time, the fluid further increases the blood pressure. Moreover, most of these patients have atonic distended stomachs. The dyspepsia, of course, has its psychic effect upon sleep, apart from the mechanical one; apart from any pain it naturally keeps alive the state of consciousness; patients lie awake at night theorising as to their condition.

There are a large number of cases of insomnia associated with toxic neurasthenia due to intestinal dyspepsia. I think these cases will largely tend to disappear as the nation learns to drink paraffin continually.

I have already spoken of gout, and I would only say, further, that when the gout has got to the point of appreciably reducing the lumen of the arteries and the circulation is affected by more than posture, then the reduction of the lumen is going to cause stasis in the cerebral circulation; and the continuation of that will cause an unsatisfactory state of cerebral nutrition. So that there will either be a very bright consciousness when the individual is awake, or a very peaceful slumber. In gout the irritable temper may be due to an alteration in the blood content, apart from the circulation; and Garrod has pointed out that the blood in gouty people is almost neutral.

With regard to general physical treatment, the first thing I would say is that the insomniac is for the most part a person who has much claim on our sympathy, though he claims more than he deserves, and that for the simple reason that the hours we lie awake make a greater impression on us than do the hours we sleep. There are various ways in which one can help the insomniac by showing him that he sleeps more than he thinks he does. If you can prove that, and if he ceases to worry about the amount of sleep he gets, the insomnia will die of inanition.

What we have to aim at physically, is a slowing of the cerebral circulation; and you can often do much by change of position. You will remember what I said about a high pillow for people with high blood pressure; and you will keep people with low blood pressure as flat as possible. For high blood pressure, try to get the blood to the skin as much as possible; use massage and warmth, and a hot bath is useful, especially a mustard bath last thing at night. Aqua menth, pip is good, because it stimulates the whole circulation, but do not adopt both these measures for the same patient because one would largely counteract the other. Then aim at quieting the heart’s action, by such things as bromides, and removing exciting causes. Reading may be soothing, or it may be exciting, according to the book. Macaulay’s Essays would not have the same effect as, say, a French novel. So you must satisfy yourself as to what the patient is reading just before going to sleep. There is also a difference in feeling as to whether the patient has a half dioptr of astigmatism, or whether he is reading a book with large or small type, or with a bright light blazing in front of him. Because, remember, sleep is a poise. The arrangement of the room, and the weight of the bedclothes are also points worth thinking about; and also the question of ventilation. In our country we have an absurd system of blinds whereby if you want to exclude light you must also exclude air. In many countries they have a much better arrangement. You cannot do worse to blind-folding the patient, a dodge which is well-known in the Tropics. You must also go into the question of fatigue. There is for the insomniac a point of physical fatigue at which it is right for him to retire to bed. If he is allowed to get beyond that, you are not doing your best for him. You can only determine this by the most careful observation. I believe in vibratory massage as the best form of massage for many. Electrical vibrators are very useful, because they produce very satisfactory imitation of fatigue, without any exertion, and in a very short time. Electricity is useful to some of these people.

From the psychological point of view, remember that sleep is, above all, a habit. Sleep is one of the rhythms of our existence, and in the lower animals these are more accurately observed than with us; it is only civilised and thinking man who interferes with this the most sacred of the rhythms of Nature. And then the question comes as to how best we can establish it. You cannot do a good deal to get back this rhythm of sleep. I am constantly being asked to stop
giving my patients hypnotics. They say: "Surely he can now go to sleep without his draught at night." I reply that if this draught were for only this night's sleep, it would be a very expensive sleep, but the draught is for an indefinitely more important object, namely, to re-establish the habit of sleep. You will not re-establish sleep in the insomniac unless you train him to sleep night after night, continued for a long time. I often find it difficult to get my colleagues to see that point of view. A doctor will say he is giving a patient five, or it may be ten, grains of veronal when it is apparent that he means nothing at all. I still find it necessary to give him a 2 grm. dose of this hypnotic, which he requires for the rest of his life. That is a scientific way of giving these drugs, it must not depend on what the patient did last night, and what he is likely to do to-night; and it is worth doing a lot to avoid the risk of her having a broken night. It is the broken nights which knock the sleep habit to pieces. I know about the fears of setting up a drug habit, but we are not now in the old days when the only hypnotic available was opium, which almost invariably led to the drug habit. The modern hypnotics, which can be handled with greater safety, and which do not establish habits in the way that opiates did. When you have got your patient a bad night by grudging your drug, you have done him or her a bad turn; you want to get the patient to forget what it is like to lie awake at night. There are only two conditions in which I use opiates: one is pain, the other is morphinism.

With regard to the other hypnotics, I think we, as doctors, are too much afraid of them. Bromides are excellent, and I have never seen anything worse than acute result from them. I use them for all cases which are akin to epilepsy, and almost always where there is moderate pain. All our new drugs, of the coal-tar variety, etc., fail when there is pain. Try to get into your mind the idea of the conservation of energy. It is the sleep which is induced, even though it be by artificial means, that conserves the energy. A person lying awake at night is dissipating energy, if only by worrying. The veronal group I regard as very useful. Luminal is a new coal-tar preparation, and I strongly advise you to try it. Bromides will take ten times more than veronal. A smaller dose is required, and it should be given with a warm drink. Luminal in 5 gr. doses is a powerful hypnotic. You judge of the effect of a hypnotic by the way the patient feels next morning. You can always make a patient sleep, but you cannot always ensure that he shall awake with a fresh head. Adalin is useless as a hypnotic, unless you give a great deal of it. Still, it is one of the most effective preparations to give an impatient patient throughout the day if he is irritable and "jumpy." I have a great belief in a mixture of hypnotic drugs; I very rarely give one drug only. We get much better results from polypharmacy when it is a matter of sleep drugs. A very good combination is 10 gr. bromide, 10 gr. chloral, with hyoscyamus and cannabis indica. It acts even in long-standing obstinate cases. Liquor brom. chlor. co. B.P.C. gets the patient early to sleep, and the addition of luminal prolongs the effect beyond what would otherwise be the case. If, however, you give luminal alone, it is apt to produce annoying skin symptoms in some people; I have seen a case in which ½.gr. did this. I am trying now a preparation which is based on this polypharmacy; it is somnacrin. It seems to be very innocuous, and I am testing it on many patients. They seem to awake fresh; but it is necessary to give 1 grm. to produce really satisfactory results.

I had intended to get much further with my subject, and to have devoted some attention to the psychological aspect of insomnia, but I will conclude by giving you three points about the treatment of insomnia:

1. Never let your insomniac drug himself.
2. Never let him know what he is getting, or how much. This is necessary so that the doctor, if he needs to, can adjust the drug to alter it without the knowledge of the patient. It is essential that the patient's dose shall be graduated by an independent party.
3. Never, under any circumstances, allow your patient to go to sleep with any hypnotic by his bedside, with the idea that he will not take it unless he needs to. It means that the patient's mind is started on a train of speculation as to whether he will or will not need it, even after the light is out and conditions are favorable to sleep. The patient can truly say: "I will not take it now; I will wait another half-hour," and the upshot of it is that the wretched patient gets five hours of sleep instead of eight, because during three hours the draught was in the bottle instead of in his stomach.

Note.—A Clinical Lecture by a well-known teacher appears in each number of this Journal. The lecture for next week will be by Edward C. Hart, F.R.C.P. Edin., late Assistant Physician Italian Hospital, &c. Subject: The Recognition of Haemic Infections of the Urine: Its Clinical and Experimental Value.

PRESENT-DAY LESSONS FROM THE LIFE-WORK OF MITCHELL BANKS. (a)

By Sir Victor Horsley, F.R.C.S., F.R.S., Etc.

Consulting Surgeon to University College Hospital, Surgeon to the Hospital for the Paralysed and Epileptic.

Though the keeping bright the memory of our benefactors is a pleasant and a wholesome practice, it is none the less important that the object and value of a memorial lecture rests equally on the fact that even a superficial consideration of the conditioning circumstances of our predecessors' work involves a whole crowd of conclusions which are full of lessons for us.

The life's work of Sir William Mitchell Banks in every aspect is not only interesting and educational, but it is also a pleasant study of how much public benefit can be secured to the community by the efforts of one of our profession, and how much can be affected by single-mindedness.

For Mitchell Banks tried to live up to Pasteur's scientific ideal of what should be the inspiration of a medical practitioner—namely, that "a doctor must consider what people will say about him 100 years hence and not trouble himself about the blame or praise of to-day." Probably, Bank's public service was the most active public service in this country, and public benefit can be secured to the community by the efforts of one of our profession, and how much can be affected by single-mindedness.

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Seventy-two years ago Mitchell Banks, as he was familiarly known to most of us, was born in Edinburgh (in 1842), his father being Mr. Peter S. Banks, Writer to the Signet, and his mother Miss Ann Williamson, a student of the greatest ability, originality and promise, he took his M.D. degree in 1864 with the highest distinction, and, under the

(a) Being the third Sir William Mitchell Banks Memorial Lecture. Delivered on October 9th, 1914.
stimulating scientific influence of Good sir, produced original work on the William book which at once became an authority on that subject. Banks had, in fact, entered the profession at the moment when the greatest advances in medical science were being made by the anatomists owing to the development of microscopy in progress, and had all John Hunter's feeling that anatomy should be pursued, not only as part of natural truth to be determined for its own sake, but also always with the interpretation of function as the basis and clue to all general and particular work and thought throughout his whole life exhibited this practical combination.

We have to thank the Scottish School of Medicine and its various teachers for many things. Thus, we have the Edinburgh system for teaching anatomy. For just as Good sir was the successor to the distinguished line of Munros, so Bell made his contribution to the progress of surgical science more notable through his practical, communal public life, as well as his professional work.

There was thus from the first the development in him of that knowledge and sympathy for anatomy as a part of medicine which subsequently he so extended during his tenure of the Chair of Anatomy in the Medical School as to make that at first the most flourishing teaching department in University College at its foundation in 1822. And, later on, his work for the developing Medical School and University meant labour, not merely for medical science alone, but his sympathy for social science as well, because of the inestimable benefit the University has conferred on Liverpool.

What now of the main work of his life, his surgical achievements?

Two subjects will always be honourably associated with his name—Medical School and University of Surgery—namely, Cancer and Hernia. To-day, they are humanity problems just as important and just as much in need of constant notice, consideration and reconsideration as they were when he began to hold up the light of surgical principles.

Both, too, are subjects respecting which his teacher Good sir had put the true value of surgical work in words which, for their scientific precision and accuracy, are worthy of recollection—he, and for their just appreciation of the possibilities of clinical work ought not to be forgotten:

"It is with methods of, prevention and recovery that our profession has to do. If we take up of the terms cure, relief, and longevity, we say so their fundamental and not in their vulgar sense, for we do not profess to perform the one or to provide the other in their vulgar sense.

"It is, we need to provide are: Firstly, the conditions of relief or alleviation of pain as far as these have been discovered; secondly, the conditions of recovery, provided these conditions can be fulfilled; and thirdly, the conditions of longevity within the limits assigned to the life of man in the present phase of his existence."

Everyone who followed Mitchell Banks's work, whether in the wards or as revealed in his writings, knew that he exactly expresses what he did, and no one recognised more clearly the scientific limits of the surgery of his day on the fundamental questions of "cure," "relief," "longevity," etc., which were so clearly laid down by Good sir. No one in speaking of "results" used the word "cure" with more meticulous care, and no one weighed up more carefully in the interests of his patient the risks of any suggested procedure. One word "results"—nay, "cure"—the word must be interpreted here. Social changes advance so unnoticed by those participating in them that the handicapping conditions under which our predecessors have worked and seldom interfered in the progress of surgery.

The risks to life caused by even a simple operation and due solely to ignorance and want of civilisation, which existed only a few years ago, are already forgotten in the safety of modern operative procedure.

It is in the year 1864, when Banks began his career, so backward were we in civilisation that a troopship crowded with sick women, children and time-expired men took more than a month to come from Bombay to this country. And, again, to quote an instance from our immediate subject—namely, the survival of patients on whom an operation designed to prolong life has been performed, let me point out that Banks, as late as 1882, stated that the death of a patient by infection was due to such shocking neglect in hospital administration that "many of the beds in the ward in this patient lay were found to be absolutely rotten at the back and end, and in similar circumstances Lister—misunderstood, contemned, and cold-shouldered by his ignorant and unscientific contemporaries—had completely solved long before 1882 the principal causes of infection."

Consequently, since we have besides protection from sepsis, modern means for successfully dealing with shock, Good sir's condition of "longevity" is now fully satisfied in both these subjects of cancer and hernia.

With this preface and with these rather painful memories of a by no means distant past, let us take the first of these two—cancer—shall we limit ourselves to the special case of cancer of the breast.

No subject is commoner and none has been dealt with more widely by surgeons, yet, at the present time, there cannot be said to be either a full consensus of opinion among surgeons as to the best operative procedure for dealing with it, nor anything like a fulfilment in practice of a general acceptance of the principles on which that procedure must be based.

Mitchell Banks, at a time when pathology was only just emancipating itself from the pre-conceptions of clinical hypotheses, began with the fundamental fact that cancer is primarily a disease of the blood, and so to be fought on the blood. Perhaps we owe also to Edinburgh teaching the idea that cancer was not a general blood dyscrasia, but a parasitic disease beginning locally and only gradually invading the body. It seems to have been first taught clearly by John Bell at any rate.

But many decades passed without this all-important axiom being generally accepted. Indeed, after Mitchell Banks had begun to make true surgical principles better known, an old practitioner wrote (anonymously, of course) to the Medical Times and Gazette, 1879, p. 702, suggesting that all surgical treatment of cancer of the breast was useless.

It was too long a time, and the work of a great man which best the profession that Mitchell Banks began the work, which became so essentially his own, for which the human race must always be indebted to him, and which, let us all be of the same achievement, not only enhanced his reputation, but also added further distinction to the School of Surgery in Liverpool.

He first published in detail the results of his work in 1877, and formulated the true position of the surgical treatment of mammary cancer by putting forward two principles:

(1) That the whole of the breast tissue must be removed, and that even in the parts of the gland not obviously the seat of active cancer there were, nevertheless, changes which must be regarded as pre-cancerous.

(2) That all the lymph glands in relation to the
mamma should be removed, on the ground that it is impossible to determine at the time of operation, (2) really infected. Though possibly not entirely true, it is certainly not correct, for they are not generally infected. Case that sh ould be fulfilled in practice with scientific loyalty, though 35 years have elapsed since Banks promulgated them.  

It might be said that these principles of operation for cancer of the breast are after all but the practical recognition of the theories of Bell's dictum that cancer is at first a local disease, but that in any other way of saying that all genuine advance in operative surgery is based on pathology.  

Moreover, the need for Banks' teaching was indeed great, since owing to their lack of scientific appreciation of Lister's great discovery, surgeons in 1882 did not operate to remove the disease, but to palliate it. Such was the condition that operations were so limited in design and execution that ten years before (in 1877) Moore had protested against what he aptly described as "wholly inadequate operations."  

It was in reference to this inefficient fashion of operating in 1877 that Banks in 1882 said in his immediate result of it (i.e., such operations) were want of a little later period they all died from cure."

No doubt the fatal error of this incomplete operation was due in a large measure to post-operative disease and to the manner in which it was performed, and that they would not not see what they did due to their neglect of scientific facts and research.  

The best evidence of this is the fact that even in Mitchell Banks' own practice at that time (1882) the risk to life, i.e., the mortality after operations for cancer of the breast, was not less than 13 per cent; a mortality which in the hands of most surgeons was wholly disappeared from this branch of operative surgery.  

Allow me to digress here for a moment on the matter of surgical terminology. I have always urged monly used is, in fact, a false statement, and should be replaced by "mortality after an operation." For an operation for it is not a cause of death unless it is is not a cause of death unless it is.  

Whether or not the patient is operated on, the fact is that patients are not adequately clinically analysed, and as a rule the failure of post hoc presents is no longer unreported, while the occasional instances of successful operations are a rare and unusual. The failure of operative technique depends largely upon various diseases, and more significantly so that in the case of cerebral tumours, where the patient is rarely offered surgical treatment until in the late stages of the disease. Let me at the same time point out that this mistake in statistical method is not characteristic of the medical profession only, for mathematical statisticians when investigating the results of a disease are in the same position.  

Leaving now the question of danger of treatment as one that wholly without importance, we must proceed to the discussion of the chief object of Mitchell Banks' work on the treatment of cancer, namely, how to secure for the patient what Goodenow meant by "Preservation" and "Cure."  

In the treatment of cancer this means the immediate extirpation of the diseased part that is yet only local, and it would naturally occur to any surgeon to extend the operation of Mitchell Banks that such extirpation must include all the structures likely to be invaded in the order breast, lymph glands, and pectoralis muscle.  

In speaking of this anatomical process of the mode of invasion of the body by cancer beginning in the breast, it is worth while drawing attention to the close parallelism between it and another parasitic disease, namely, tuberculosis.  

The local lesion, the subsequent infection of the glands, and later of the viscera in tubercular localisation of growths presents in a few weeks exactly the same picture that cancer does in months or years when commencing in the breast.  

Early and complete extirpation of the local disease and new growths effects a cure in both conditions alike.  

That was Mitchell Banks' principle in respect of mammary cancer.  

It might be thought that as his surgical teachers at Edinburgh were also primarily anatomists (a) he simply followed their inspiration, but I have not been able to find any evidence in their writings that such had arrived at the point of intellectual evolution which marks the beginning of Mitchell Banks' original work.  

One quotation will, I think, prove this. Thus, Syme, his chief teacher in surgery, not only was in the habit of dismissing all cases of mammary cancer as hopelessly incurable if he discovered any evidence of infection of the axillary glands, but also in his last description of operating for the disease given in his "Principles of Surgery" (4th edition, 1853) he makes no mention of removing the glands as a measure of precaution.  

There is certainly no evidence that the idea was present to his mind at all, and we may fairly assume that Syme represented the surgery of his day which had not yet so freed itself from tradition as to be guided by scientific principles.  

It was on this principle of making the local removal of the disease complete that Mitchell Banks advocated the clearing of the axilla, and the occasion of this lecture is the moment to consider whether we have sufficiently studied his teaching, and to see whether the present day operative treatment of cancer is always as complete as it should be, and as st in when it was made.  

Yet from the standpoint of surgical principle it cannot not justifiedly be denied, for what Banks said of the axilla, "Since you cannot tell whether the glands are infected or not, remove them and dissipate the doubt," applies with equal force to the supra-clavicular region.  

He might have added to his terse phrase the words, "thus giving the patient the certainty of security due to them," for Halsted, who, by carrying out Mitchell Banks' principles with completeness and originality, has done much to get their truth recognised, found by a laborious and accurate investigation that cancer was present in the supra-clavicular and axilla glands and tissues in 34 per cent. of the 67 cases he examined. Plainly, therefore, we owe it to our patients to clear out both cases.  

It is not just, however, to leave the question of the design of an operation for mammary cancer until this point, for the subject has been further elucidated by subsequent investigators, notably Sampson Haldy.  

In his method of operating, Mitchell Banks removed the skin from the breast, far protected his patients from local recurrence, but is not out of conflict with the anatomical point of view of likelihood of original focus of disease being left, and this part of the scheme of operation not put on a scientific basis until Haldy's complete demonstration of the infection paths through the lymph vessels in the fascial planes.  

(a) The archaeology of surgery is always interesting, and on this point I note that Lister taught anatomy, while Syme took his place. Though followers of John Hunter they never seem to have been drawn towards biological physiology.
Consideration of this point naturally brings us to the remaining one of the treatment of the pectoralis muscles. The paramount source of risk is, of course, the pectoralis major, and the empiric practice of Volkmann in 1835, when he advocated the irremovable removal of this fascia (more properly the muscle itself), unfortunately was regarded by the timorous (because septic) surgeons of the day as an experiment which they were not gainfully minded to undertake until Heidenhain, many years after Banks and Volkmaim, proved anatomically the widespread degree of involvement of these structures in an average case. Perusal of the errors of professed quacks prevails in the minds of some against the even realisation of its necessity.

To sum up: Every operation for mammary cancer, it is necessary to do all known requirements and by antagonising all known avenues of the cancer, to really serve the interests of the patients, must include—

Firstly, very wide removal of skin, breast and margin of subcutaneous fat and fascia outside the gland edge, the pectoralis major and the whole axillary contents—fat, fascia and glands up to the edge of the first rib in one mass; secondly, free removal of the supra-clavicular fat, fascia and glands.

Perusal of the errors of professional quacks is not followed in its entirety, except by a few surgeons.

Various explanations are often offered to justify omitting, in given cases of carcinoma, parts of the procedures. Almost every such omission is, for the reasons given above, a violation of the principal. To me such omission seems also to be a grievous wrong done to the memory of Mitchell Banks, and these we must leave it.

Now let us turn to the other subject which Mitchell Banks, with practical presence, seized upon as a very common infirmitv on suffering humanity and yet one most imperfectly treated—namely, hernia.

Perusal of the wonderful benefits which have directly issued from Lister's work is the absolute safety he conferred on the surgical treatment of hernia, and it is interesting to see what a striking difference is made by its so-called clinical importance has in consequence resulted.

But hernia still remains a very considerable national evil, and one which it is the business of our profession to remove.

In view of this responsibility upon us and the fact that hernia is a cause of death is a wholly preventable one, it is very depressing to read in the last Report of the Registrar-General for England and Wales, viz., for 1907, that 10,500 deaths were certified in one year as due to hernia alone.

Since, as I have elsewhere shown (3), our national vital statistics are extremely untrustworthy (in respect of the causes of death—e.g., alcohol, syphilis, etc., utterly so as to cause any average person to be unable to analyse this astonishing figure; but it may be assumed to mean that a very large number of persons do really die every year directly because of their suffering from a hernia. Whether strangulation occurs or not, however, important clinically as being the immediately fatal factor, is a detail quite unimportant for the present purpose, and so also is the question how many of the 10,500 deaths stated upon.

The one grave fact which stands out clearly is that our present treatment of such a very common and simple condition as hernia is exceedingly faulty, and urgently needs reconsideration, because a very large number of our fellow citizens are clearly not protected from its fatal consequences.

But there is also an equally important socio-economic reason for condemning our present methods of dealing with hernia, and that is the continual loss of national working efficiency which results from personal incapacity caused by hernia to the hardest worked and most industrious classes of the community.

In the present paper we must determine, if possible, what information are thus handicapped or rendered practically useless to the nation.

In his recent statistical report to the Local Government Board, Mr. Cook gives figures compiled from the examination of recruits which at least constitute a rough basis for a minimal estimate.

From these figures we are probably justified in assuming that at any given moment 500,000 individuals of all ages are suffering to a greater or less degree from hernia in the United Kingdom.

We have hitherto been told by our leaders that incapacity leading to social failure and poverty, Dr. Basil Cochran, amongst others, attributed 2 per cent. to their being rendered incapable by a hernia.

Now if we ask why the medical profession in this matter of hernia has failed to promote a community to preserve national efficiency, the answer is simple, namely, that until quite recently the largest proportion of the profession's mode of dealing with hernia has been by means of trusses.

Unfortunately for the nation the application of a truss to a hernia is not treatment of the evil, but merely palliation. In my opinion, we had drifted into this until cases in which regarding a truss as treatment of hernia by following the usual path of first resistance, for the only procedure which merits the name of treatment is, of course, radical cure, i.e., the obtaining by operation a permanent closure of the hernial defect in the abdominal wall. This being so, we have yet to explain why the profession had largely become satisfied with makeshift applications such as trusses. The explanation is not without interest, and shows that cure of hernia—treatment of hernia is due to the same causes as our inefficient operating care of the breast, and therefore rightly became an object of Mitchell Banks' reforming zeal.

Seventy years ago the misdeeds of itinerant quacks and the disastrous results of so-called operative or what is now called truss or surgical treatment of hernia into such a disrepute that as late as 1830 the then leader of operative surgery, Liston, (4) said: "Operations for unincarcerated (i.e., without any symptoms of strangulation) hernia are not satisfiable, and, be added, "those who have operated in such circumstances give a very unfavourable account of the experiment."

In fact, throughout the whole pre-antisepctic era no progress whatever was made to any extent to freed operative procedures from the risk of septic infection, but in this case also from the further risk of producing more functional and material injury by suppurative inflammation occurring just where most mechanical strength was needed. On this latter point I may remind you that Denk (5) showed from his examination of the statistics in von Eisberg's clinic that of the cases of hernia operations in which suppuration had occurred, recurrence followed in 43 per cent. alone.

The same point had been demonstrated by Damer Harrison (6) 17 years before.

Although Liston's work is not 45 years old, such is the unfavourable reception which has met with the‎ pre-antisepctic era, its effect has been such that there is no certain prejudice against the radical operation, and some surgeons in consequence still speak of "treating" hernia (even in the adult) with a truss as though this mechanical placebo was something more than a makeshift.

In fact, a truss, like "treatment" by taxis of a strangulated hernia, is one of those reliquiae diluvianae which will survive as a monument to the depravity and custom in our profession that there still exists a certain prejudice against the radical operation, and some surgeons in consequence still speak of "treating" hernia (even in the adult) with a truss as though this mechanical placebo was something more than a makeshift.

This custom being even now prevalent in our profession, it can easily be understood that it was not one of the least difficulties which Mitchell Banks had to contend against when he began, and even as recently as 1910, that date appears in the subject when he read his paper at a (Worcester) Branch meeting of the British Medical Association that Mr. Spanton, in the discussion pointed out that in the "text-books of surgery all operations for the cure of hernia are alluded to as to be condemned as unnecessary and unjustifiable."

No doubt the idea that a truss deserved credit as a form of treatment arose from the number of so-called congenital cases in infants which are apparently cured by a rubber truss or even a figure of 8 woolen band.
All that actually happens under these circumstances is that the normal developmental process of closure of the muscular inguinal canal occurs, and possibly more rapid than usual. No support was used, but that a permanent cure is really produced in all the cases in which the hernia does not recur in adolescence there is no evidence to show. Of course, these cases of spontaneous cure of congenital hernia are never followed up, and often the presence of the hernia in infancy is wholly forgotten.

Thus, as late as 1895 the principal textbook of British surgery contained the following passage:— "The operation (i.e., radical) is comparatively rarely required, for during the first few years of life hernia show a great tendency to undergo spontaneous cure." This is an unqualified statement which justifies the use of the word "cure" as here given. One can imagine Goodall asking the pertinent question: What is a cure? What was the subsequent adolescent and adult life histories of these cases? How many relapsed soon, and how many developed hernia with advancing age?

In truth, the actual clinical facts are entirely the other way, as the following analysis of the conditions which underlie the causation of hernia prove.

The most startling fact is that the causes of hernia were manifold, but that the hernial ring should be agglomerated together under one head—namely, muscular effort and strain. That is to say, the assumption was made, and is still taught, that by muscular effort the abdominal wall is driven against the muscles and tissues, gradually stretching these until a sac is completely developed.

I must bring myself to believe that a smooth, soft, elastic coil of intestine could be forced through the abdominal wall by violent contraction of muscle, the action of which is not in fact convergent on any spot, but over the superficiality of the abdomen generally. A greater strain on the abdominal wall by possibly violent alone is not reasonable, and moreover cannot be said to have been proved to be really operative in the way supposed.

Further, every surgeon knows that clinically in the large majority of cases a hernia is stated to have been discovered accidentally by the patient, therefore it was not suddenly produced by any such suppositions violence. Thus Cockey found that of 4,750 cases of hernia in adult males it appeared in no less than 3,102 without any known cause or violence.

Frankly, the only reasonable pathogenesis is that so clearly worked out and formulated by Hamilton Russell—namely, that a preformed sac is the causal factor and that muscular effort simply occupies a logical position being the rule first urged by Mitchell Banks and to the discussion of which I revert directly—namely, that no cure of a hernia is possible unless the sac itself is removed.

Hamilton Russell's view that all herniae are due to a primary congenital defect is further proved by the fact that the topical frequency of hernia occurs in precisely the proportion to be expected—namely, according to the regions in which congenital deficiencies and areces and failures of development most frequently occur. For this reason inguinal hernia heads the list of herniae by such an enormous majorit.

Thus all facts, anatomical, pathological and clinical, confirm the conclusion I have put forward, that so-called congenital hernia is not "cured" by trusses: that when the funnel-shaped fossa in the peritoneal surface is filled by the contents of the abdomen, and when in later life the tone of the muscles is diminished, the hernia naturally becomes re-established. The final conclusion follows that for the good of the community—i.e., the State as well as the individual, every hernia must be cured by radical operation as soon as it is discovered, and such, I believe, is the opinion of every modern surgeon.

Mitchell Banks's scheme for treating us up to this level of surgical progress was a very interesting one—because although as late as 1893 he was an advocate for the use of trusses, his scheme of real curative treatment was practically what is now universally adopted. I believe as a radical cure—namely, the fulfilment of two principles:—

(a) Removal of the sac, with restoration of the continuous peritoneal surface—i.e., abolition of the fossa.

(b) Protection of the hernial area by closure of the inguinal canal.

Of these two Mitchell Banks undoubtedly thought the first most important, but he always fulfilled the second by closing the canal with permanent—i.e., bonding—incisions.

(a) Closure and removal of the hernial sac as the chief step in radical cure.

I have already stated the causal importance of the hernial sac as a developmental relic. If the old theory of meralgia is supported by such facts as this then simple ligature of the neck of the hernial sac could not be effective as a radical cure.

Yet that it was actually so has been proved for years by the work of many surgeons, especially Prof. Ruston Parker, (7) and this fundamental principle for which Mitchell Banks contended at a time when little or no support was forthcoming is now thoroughly accepted for the cure of inguinal hernia.

The next anatomical condition of inguinal hernia secure that with the closure of the neck of the sac there is also an abolition of any inguinal fossa, but this is not the case with femoral hernia, and I believe that some unfavourable criticism of radical cure of hernia in general has resulted in consequence of these operative treatment of femoral hernia failing to completely satisfy Mitchell Banks's first principle viz., complete abolition of the sac. All present-day operations for the radical cure of femoral hernia which approach the sac from below and include various steps such as closure flaps of aponeurotic tissue like the pectineal fascia, etc., are liable to failure, though a certain number succeed.

They should, in my opinion, be wholly abandoned in favour of the method of operating from above, which I employed from about 1890 at University College Hospital.

It consists, firstly, in a 3-inch horizontal incision through the abdominal wall just above the inguinal canal, ample room being obtained by firm retraction, especially of the rectus inwards.

The peritoneum being exposed, traction is made upon it and the femoral hernial protrusion lifted out of its bed intact. The sac is then completely removed and the continuity of the peritoneum made normal.

The upper orifice of the crural canal is then closed, preferably by a modification of the previously described technique of bone from the posterior surface of the pubis bone.

I would suggest that recurrence is impossible by this method of operating, and that it involves no more special procedures than those of approach from below, but that it is the sole cure that has ever been complete fulfillment of Mitchell Banks's principles.

Schwartzchild (8) has since employed a similar procedure for the radical cure of a remarkable case of recurrent obturator hernia.

(2) Protection of the hernial area by closure of the inguinal canal.

I have already shown that Mitchell Banks fully recognised the importance of this question, but curiously enough he does not in any way grasp the most important step of supporting an inguinal hernial defect by transplanting downwards the lower border of the internal oblique muscle and fixing it firmly to Poupart's ligament.

Perhaps the elastic value and therefore immensely higher efficiency of muscle tissue as compared to fascial and fibrous tissue was not then realised, nor the fact that the rigidity of aponeurotic fibres not only does not permit it to support or suspend, but, also, of course, precludes any physiological elastic recoil which is essential for the support of the viscera.

Owing unfortunately to so many cases coming for radical cure when they have been imperfectly supported by even the best inorganic (i.e., muscular) atrophy has resulted, surgeons have been obliged to employ flajere or other materials to furnish a shield to the abdominal defect, and Trendelenburg indeed transplanted bone for this purpose, but no case of
hernia should be allowed to sink into such a difficult and hopeless condition.

To sum up this question of hernia, the removal of which from the community is a matter of such vital importance, I would say that our plain duty is to press to their logical conclusion, and in an active and availing manner, the principles sketched out for us by our predecessors like Mitchell Banks. Our reward will be that we have then achieved a great benefit for our people and for the State by abolishing a source of danger and suffering.

This leads me to conclude with what can only be a very brief reference to a very large share of Mitchell Banks' useful life, namely, his public work for his city, his infirmary, his university, and his private practice.

The help which was so great that it is impossible to do more than express our gratitude by meeting on an occasion like this.

Deeply interested in all phases of humanity and of human life, he was especially in the interests and success of his fellow citizens in the city of his adoption, he emphasised in the following poignant sentences the duty of every one of us to take some active part in public affairs and assist in the development of social progress.

"We must be something more than mere prescribers of physic and healers of wounds. In my youth I had it strongly recommended to me to stick to my profession and have everything else of minor importance. The life of a doctor was to see patients, do operations, order drugs and collect fees. I thank God that I entirely repudiated this idea of my profession."

Let us show our respect for Mitchell Banks by trying to follow his example.

References.

(1) Subsequently fully confirmed by Johnson, Readies and others.

(2) In 1877 historical methods were not sufficiently advanced to permit of rapid microscopical investigation of doubtful tissues at the time of operation. But such examination, though occasionally carried out, does not meet the necessities of the case in gland infection, since time does not permit of an exhaustive search. Consequently Banks' law is as true now as in 1877, and must be faithful to the letter.

(3) In the First Report of the Royal Commission on Venereal Disease, 1914, also "Elements of Surgery," London: Longmans, 1900.


(7) Deutsche Zeitschrift für Chirurgie, Sept., 1901.

THE CONTROL AND TREATMENT OF SCABIES. (a)

By FRANK HAUXWELL, M.B., Ch.B., D.P.H., Assistant Medical Officer of Health, St. Helens.

In St. Helens information regarding cases of scabies comes to the medical officer mainly from two sources: (1) teachers notify all cases of infectious and contagious diseases occurring in the schools, and (2) health visitors report cases discovered during their weekly visit to the schools, or during the home visitation of children stated to be absent by the school attendance department. All cases reported are seen by the medical officer who excludes the child from school, and no case so excluded is allowed to return to school until re-examined and certified by him to be free from infection. Only in this way can efficient supervision become possible. Many of the cases when first seen are slight in extent, and localised, and with proper care and treatment at home can be cured in a short time. In a considerable number, however, the disease is extensively spread over the body before it comes under observation, and it is in these cases that most difficulty is experienced in supervision and treatment. They are absent from school for prolonged periods, and though they may be under the care of a medical practitioner it is difficult to get the parents to carry out at home the very general and thorough treatment required. For some years past attempt has been made to treat some of these cases by daily bathing at the borough sanatorium, together with disinfection of the underclothing at each attendance. Unfortunately this system, while doing some good, has not been found sufficiently effective, the weak points being (1) the irregular attendance of the children, and (2) re-infection from case sources. Especially when nearly healed did the attendances become irregular, and unless promptly followed up the children would be found in a very short time as extensively affected as at the commencement of the treatment. Even when the attendance was regular, fresh outbreaks were not uncommon, due to re-infection in the home from bed-clothing, etc., or from other cases in the house.

It was therefore decided in October, 1913, to make a more vigorous attempt to deal with the disease. The purpose was to systematise a method of isolation of actual cases, together with disinfection of the home, is now carried out. When possible six beds have been set aside in the isolation hospital for the reception of cases of scabies, and this number has been augmented at intervals according as the accommodation allowed. The routine procedure now adopted in all cases is (1) suspected cases are submitted to the medical officer as previously; (2) slight cases and isolated cases occurring in families are advised regarding treatment, and in most cases it is found that directions given are carried out fairly well, and the child recovers within a reasonable time; (3) in other cases the health visitor visits the home and inquires regarding the presence of other cases in the home, and reports on the general cleanliness of the premises; (4) if there appears no satisfactory means of home treatment, all cases from the house are removed to the sanatorium, the bedrooms are disinfected, the bedding, clothing, etc., removed, and the room steam disinfected; (5) should the case be in a filthy and insanitary condition dealt with under the Public Health Act, 1875, Section 120. It is hoped that by these means not only will cases be cured more quickly, but that the sources of re-infection will be materially diminished. The scheme is, however, limited by the accommodation, and it has been found necessary to supplement it by dealing with certain selected cases by means of daily baths at the isolation hospital.

During the six months the scheme has been in operation, 18 cases have been admitted, and 11 cases treated by daily baths. The effect of treatment is shown by the accompanying table which gives the duration in weeks of cured cases treated at home during 1913, together with the duration of cured cases treated at the isolation hospital by daily baths and of those admitted during the past six months.

It will be noticed that of those admitted to the isolation hospital, the stay in two cases extended to eight weeks. This was due in one instance to the child developing chicken-pox fourteen days after admission, followed by pneumonia, and in the other case to persistent dermatitis. The average duration of all cases was—

(a) Abstract of paper read at the Annual Congress of the Royal Sanitary Institute at Blackpool, July, 1914.
Children treated at home during 1913 ... 8.6 weeks.
Children treated at isolation hospital during past six months—
(1) By daily baths ... 4.7 weeks.
(2) After admission ... 3.5 weeks.
If the two cases mentioned are excluded from those admitted, the average for those admitted falls to 2.0 weeks.

Duration in weeks.

| Home treat- | Treat- | by adm- |
| at isola- | ment at | isola- |
| tion | isolation | tion |
| hospital | hospital | hospital |
| 12 | 15 | 67 | 89 | 10 | 11 | 12 | 14 | 15 | 16 | 47 | 19 | 26 | 21 | 22 | 22 | 24 |

It would seem therefore that admission to the isolation hospital gives the best results, though with only six months' experience of the present scheme it may be too early to form a definite opinion. It must be remembered that those cases admitted are all more severe than the cases treated by baths, and it is therefore hardly fair to compare the two classes. Undoubtedly the combined scheme of treatment by the local authority means a more speedy return to health and comfort for the child and a great saving of school attendances. In the isolation hospital many of the expenses naturally go on irrespective of the number of beds occupied, so that if proper advantage is taken of empty beds for cases of scabies the cost is practically limited to food and drugs. It is hoped in future that part of this cost may be recovered from the Board of Education as grant towards the scheme for the medical treatment of school children, and even should it not be so I think the extra expense to the local authority is amply justified.

SUDDEN DEATH DURING THE Puerperium.

By P. RUDAUX, M.D.,
Obstetric Surgeon to the Hospitals.

There are several causes liable to determine sudden death during labour, which are also operative during the puerperal period, the two principal ones being cardiopathy and syncope. A heightened blood pressure may persist during the first few days after delivery and this would explain the occurrence of delayed asystole or attacks of acute oedema of the lung occurring ten or fifteen days after the confinement. This is plainly the manifestation of 'degeneration of a myocardium which, exhausted by pregnancy and labour, undergoes complete dilatation under the influence of the high blood pressure to which it is subjected' (Poutier).

With regard to fatal syncope this is met with in women who have been rendered extremely anemic by free hemorrhage during or after delivery, and is provoked by some change of position, moving from one bed to another or even by some simple effort. In other cases the nervous system is the starting point, syncope following a powerful emotion, disagreeable news, fright, etc.

According to Meigs and Playfair "in women rendered anemic by profuse flooding we may get spontaneous coagulation in the right heart, the clot gradually increases in size, acting as a foreign body on the blood with which it comes into contact. Ultimately the heart, irritated by the presence of this clot, contracts imperfectly and syncpe follows. If this proves immediately fatal it is because, during the syncope, a fresh mass of blood coagulates and the right heart is more or less obstructed thereby." According to these authorities there is a reason for refusing to admit that coagulation may take place in the heart and pulmonary vessels just as well as in other parts of the venous system.

Latent pericarditis may also precipitate a fatal result, as shown in the case reported by Corvisart and quoted by Bronard. A woman, fully conscious, suddenly dies six days after her confinement. She only complained of the region of the heart where she said she could feel a hard prominent tumour, although no one could detect anything of the kind. At the post-mortem examination the pericardium was found to be infiltrated throughout and covered with serous-purulent exudation over the entire surface.

The cause of sudden death which dominates this period of the puerperium is infection taking place during labour, especially infection localised in the venous system. If we consult obstetrical literature we find indeed that embolism is the commonest cause of sudden death during the puerperal period. Embolism, supervenes in women suffering either from well marked phlegmasia alba dolens or from latent phlebitis, an affection which has been fully described by Ernn and Madame Liefmann. In both cases the picture is the same, a woman suffering from phlebitis makes an effort to sit up, or it may be a woman who presents no trace of venous inflammation who has just left her bed for the first time, often in order to leave hospital at too early a period, she utters a cry, becomes pallid and falls back dead.

Sometimes the scene is not so rapid and we witness the struggle of the organism against asphyxia caused by the impaction of a clot in a branch of the pulmonary artery. Or, it may be, following a movement or even without any obvious reason, the patient suddenly becomes the prey of a sudden attack of suffocation, she cries out for more air, the mouth is widely open, the nostrils are dilated, the face is cyanosed, the eyes are prominent. The pulse, rapid to begin with, rapidly falls, and at the same time the extremities become cold and within a terrible few minutes, or at most half an hour, she succumbs. This usually happens between the fourteenth and the twenty-second day, sometimes earlier, towards the tenth day, sometimes later, even as late as a month after the confinement.

In the course of an attack of infection of puerperal origin, sudden death may be caused by hyperaemia generalised septicaemia, this is what Hervieux calls puerperal poisoning, or by involvement either of the serous system of the heart or lung or the motor apparatus of the heart. We have already mentioned Corvisart's case in which death supervened most unexpectedly and proved to be due to sero-purulent pericarditis. As in all infections the myocardium may yield all at once under the influence of the toxins.
which act either on the cardiac fibre itself or on the nervous system. This action on the myocardium is similar to that produced by the diphtheritic toxin, consequently sudden death from myocarditis may supervene in the course of an attack of purpural infection, or in full convalescence. Puerperal endocarditis, which has been exhaustively investigated by Westphal and Virchow, is rarely \textit{per se} a cause of sudden death, the emboli to which it gives rise being too small and when it proves suddenly fatal it means that the affection has involved the myocardium.

**THE VALUE OF THE INCUBATION TEST IN THE EXAMINATION OF WATER AND OTHER PRODUCTS.** (a)

BY SHERIDAN DELEPINE, M.B., M.Sc.,
Professor of Public Health and Bacteriology in the University of Manchester.

This short communication is offered in support of my plea for the adoption of simple bacteriological methods whenever the results looked for can be obtained by such methods; simplicity is a powerful promoter of accuracy and uniformity of results. The fact that incubation at certain temperatures favours the multiplication of certain bacteria and restrains that of others is well known but the great number of media containing enriching or restraining substances which have been brought forward during the last fifteen or twenty years is evidence that many observers have overlooked the possibility of obtaining good results by simpler methods.

In a paper published in 1898(b) I described a method which I had used during the previous six or seven years in the bacteriological examination of water, and has since that date formed a part of the tests to which water and other products are regularly submitted in my laboratory. This method consists, as far as water is concerned, in incubating measured quantities of the fluid at a temperature indicated by the purpose in view. The test may be applied to the water alone or more generally to the water after some proteid or other material has been added to it. Since the time when this method was first used by me and by bacteriologists who have taken any direction, several observers have introduced methods in which incubation at blood temperature plays an important part, and that introduced by MacConkey is perhaps the one most extensively adopted in England. I have, however, found that MacConkey’s method, excellent as it is, does not present any material advantage over the one I had previously described, and that inexperienced observers who use that method without proper control are liable to interpret wrongly the results obtained by it.

If properly controlled, the use of MacConkey’s media involves a greater expenditure of time than my simple incubation method. In this respect it is open to some of the objections which could be offered to the methods which were in general use in 1890 when I introduced the incubation method which I propose to describe here. I based this method upon observations made during the years 1889 and 1890 upon the effects of temperature and pabulum upon the relative rate of growth and the vital concurrence of micro-organisms. At the Seventh International Congress of Hygiene and Demography, held in London in 1891, I demonstrated by means of cultures of various pathogenic and non-pathogenic moulds the effects of composition of media and of temperature upon mixtures of micro-organisms, and I summed up the results of these experiments as follows (a):

“If two moulds are placed under conditions which allow the growth of both, but which are ever so little more favourable to the one than to the other, the favoured one will not only outgrow the other, but will even prevent (b) its development,” and I pointed out that this was also true of bacteria.

This principle is particularly useful in investigations which have for their object the detection in water of pathogenic bacteria or of micro-organisms living in the organs of warm-blooded animals. Ordinary water bacteria thrive best at ordinary temperature in water poor in proteid matter. A great number of them multiply very slowly, if at all, at temperatures approaching 37° C., and their growth is generally completely arrested by a temperature exceeding 40° C. Most pathogenic bacteria grow best in proteid media and at a temperature of 37° C. Among them there are a few, such as the Bacillus enteritidis, which multiply rapidly at a temperature of 42° C. Among the facial bacteria, the B. coli communis and the B. enteritidis thrive at that high temperature. When a pure, unpoluted water is incubated by itself at a temperature of 42° C., it generally remains clear for many days, and if gelatine or agar plates are made with 1 c.c. of such water after it has been incubated for four, eight, sixteen, twenty-four, forty-eight or more hours, one generally finds that either very few colonies grow on these plates or that the plates remain apparently sterile.

If a facally polluted water is treated in the same way, it is usually found that after incubation at 42° C. for from four to sixteen hours, a general turbidity is visible, and that if gelatine or agar plates are inoculated with from 1/1000 to 1 c.c. of that incubated water, an abundant growth of bacteria is obtained among which bacilli of the colon group are generally fairly abundant.

The same differences are observed, but generally in a more marked degree, if, before placing the water in the incubator, a large proportion of slightly alkaline peptone bouillon is added to the waters under investigation. In some cases, whether the water is polluted or not, certain bacilli produce on the surface of the water a thick scum. These are generally sporing bacilli, such as are common in the soil or dust, e.g., some belonging to the B. mesentericus or B. subtilis group.

I have taken advantage of these facts during the past twenty-five years for the purpose of detecting the presence of pathogenic or facial bacteria, such as the bacilli of the colon, enteritidis or typhoid groups, the spirilla of the cholera group, etc., in water, sewage, facial and

\footnotesize{(a) Transactions of the Seventh International Congress of Hygiene and Demography, held in London, 1892.}
\footnotesize{(b) In this sentence the word delay would have expressed my view better than the word prevent.}
other discharges, organs, shellfish and other foods, etc.

When dealing with solid or semi-solid substances, these are first crushed and mixed with definite quantities of sterile water, and the emulsion so obtained is treated as water. The procedure is as follows when the objects are to discover whether bacilli of the colon or of the enteritidis groups are present and to estimate their number approximately. The fluid to be tested may be used undiluted, or it may be diluted so that each cubic centimetre of the dilution contains from 0.5 to 0.0000001 c.c. of the original fluid. In the case of moderately polluted water it is not generally necessary to use less than 0.001 c.c., but in the case of fecal matter, badly contaminated milk, etc., it may be necessary to reduce the quantity to 0.000001 even to 0.0000001 c.c. One cubic centimetre of each of the selected dilutions is added to 5 c.c. of peptone bouillon (+5), which is incubated for four to sixteen hours at 42° C. At the end of that time, if the bacilli of the groups in question are at all numerous, the fluid is generally distinctly turbid and the turbidity is uniformly distributed. (If there is an apparent turbidity, the tubes are replaced in the incubator for a few minutes.) Without disturbing the fluid a loopful of the upper layers of the turbid bouillon is taken and laid on the surface at one side of a previously prepared plate of litmus lactose agar. (If the turbidity of the fluid is not very distinct, two or more loopfuls are taken.) The small drop of fluid is spread on the surface of the medium with a bent glass rod, successive parallel strokes being made with the rod after the drop of bouillon has been rubbed thoroughly by the side of the medium at one side of the plate. The amount of material spread is therefore more abundant at one side of the plate than at the other. The plate so prepared may be placed lid down in the usual glass chamber, but the chamber is not made moist. The plate is incubated at 42° C. (if the object is to look for bacilli of the typhoid group or for the Spirillum cholerae a temperature of 37° C. is more suitable.)

After from eight to twenty hours' incubation, the plates are examined isolated colonies, and the reactions associated with the organism looked for. The morphological characters, motility, staining reaction, and agglutinating powers are ascertained, and the colonies which are indicated by these preliminary tests to be worth identifying fully are at once sub-cultured in the various media which are usually employed to ascertain the cultural characters and the fermenting properties of the bacteria belonging to the group in question.

In this preliminary scheme of organisms, such as those of the B. enteritidis group, can be isolated and fully tested in forty-eight hours to seventy-two hours from the beginning. The test for indol generally takes the longest time when the old methods are used, but when paraldehyde and potassium per-sulphate are added according to B3hme's method, twenty-four hours' incubation is generally sufficient (a).

In badly polluted waters the preliminary culture on bouillon often gives a typical indol reaction before the end of the first day. When the water appears to be fairly pure, larger quantities of it (up to 100 c.c. and sometimes 1,000 c.c.) are used. In such cases bouillon is added to the water in the proportion of 10 to 20 parts of bouillon to 100 of water, or peptone in the proportion of 0.5 to 1 percent.

The procedure which I have adopted in water examinations is clearly indicated by the headings of two pages of the book in which the results of all bacteriological analyses of water are entered in my laboratory (see scheme of records at the end of the original paper).

Many will think this method more complicated than that based upon the use of the bile salt media introduced by MacConkey some years after I had adopted the method which I have just described, but it is easy to prove that this is not the case if one wants to obtain accurate information.

If, as is usually done, one adds various quantities of water to the bile salt medium, the occurrence of the acid reaction and gas is often slow, and if one waits for their appearance before proceeding further much time is wasted. The production of acid and gas is not absolute proof that the B. coli is present, and the absence of any proof of the contrary. To obtain reliable well-controlled results within as short a time as possible, it is necessary to use the bile salt medium much as I use the alkaline bouillon, but as the MacConkey's medium is less favourable to the development of the Bacilli of the Colon-typoid group than the simple alkaline bouillon, one may fail to detect the B. coli when it is scanty. I have more than once satisfied myself that this is the case by making parallel series of tests with the same samples. In one series I use my method and in the other MacConkey's, and ascertain in each the highest dilution in which the B. coli can be discovered. On several occasions I found the B. coli in smaller quantities of water by the simple incubation method than by the bile salt medium.

To compare the two methods I prepared on one occasion a series of dilutions in which 1 c.c. of each of the dilutions corresponded severally to 1/2, 1/10, 1/100, 1/1000 of the undiluted solution. I added 1 c.c. of each of these dilutions to 5 c.c. of bile salt medium and to 5 c.c. of simple bouillon respectively. The same pipette was used to transfer each dilution to the two media.

After ten hours' incubation I transferred 1 c.c. of the contents of each tube of the simple bouillon series to five new tubes of MacConkey's medium, and I also made litmus lactose agar plates with one loopful of the contents of each of the first two sets of dilution series. After thirty hours there were acid colonies resembling colonies of B. coli on each of the agar plates inoculated with each of the dilutions of the original water up to the 1/10,000 dilution.

All the MacConkey's tubes inoculated with 1 c.c. of incubated bouillon showed acid reaction and gas production, except the tubes inoculated with the bouillon corresponding with the 1/1,000 and 1/10,000 dilutions. Of the MacConkey's tubes to which the original water had been added directly, only those corresponding to the 1/2 and 1/10 dilutions showed clear evidence of acid reaction and production of gas after thirty hours; those corresponding to the 1/1,000 and 1/10,000 showed no evidence of any change;
the one corresponding to the 1/100 dilution was turbid, its reaction was doubtful and no appreciable amount of gas could be seen. In a case like this to obtain definite quantitative results by the MacConkey's method, it would have been necessary to begin at the end of thirty hours the confirmatory tests which can be started at the end of from ten to sixteen hours when my simple incubation method is used.

This experiment may be summed up as follows:

| T.L. AGAR PLATES | C. Bouillon 1/100 dilution | MacConkey's 3° C. Bouillon 30 hours to hours | ++++++++ | mean s. cold. colonies of E. coli type, and found by usual H.</p>

- means abscees. or colonies of E. coli type, and found by usual H. R.E. +++++++

- means ununiformly diffused turbidity.

- means no gas production.

- means acid reaction.

- means peritoneum.

- means gas production.

- means acid reaction.

- means gas production.

- means acid reaction.

- means gas production.

I use the MacConkey's medium among other media to test the bacilli isolated by other methods, I do so in order to be able to compare my results with those of other observers who employ MacConkey's method for isolating the B. coli, but for the purpose of discovering this and allied bacilli specially when they are very scanty I much prefer my older incubation method.

**Hampstead and North-West London Hospital.**

Mr. Jackson Clarke operated on three cases of fracture.

**Case 1.—Separation of the Head of the Humeral at the Anatomical Neck and of the Greater and Lesser Tuberosities.**—The patient, a stout, middle-aged woman, had fallen heavily on the point of the shoulder six weeks ago. An ordinary forward dislocation was said to have been diagnosed and an attempt made to reduce it in the ordinary way without success. Mr. Clarke made an anterior incision, and, on separating the bicep from the pectoralis muscle, the long tenden of the biceps was seen dislodged from its groove, but little of the upper end of the humeral was visible. Moderate outward traction on the upper end of the shaft failed to dislocate the upper end of the bone. He therefore defined the coracoid process and detached it by bone forceps in the manner suggested by the late Mr. Keetley. This done, a good exposure of the parts was obtained, and then, starting at the upper end of the bicipital groove, an incision into the capsule of the shoulder joint was made, revealing the head of the humerus loose and turned upside down, and also that the tuberosities were completely detached. The head of the bone was removed and the tuberosities were replaced and fixed by silk stitches to the periosteum and capsule of the joint. The coracoid process was similarly re-attached, and the deltoi and pectoralis muscles replaced and fixed by two catgut stitches.

The external wound was then closed.

**Case 2.—Fracture of the Patella.—** A heavy man fractured the left patella in the usual way. A transverse slap incision, convex upwards, revealed the seat of fracture; a long tuft of the ligamentum patella, comprising about one-fourth of this ligament, was drawn out of the knee-joint. A circular silver wire was first passed and drawn tight in a way the operator had found to succeed in other cases, but on testing the approximation by passing the finger round the side of the patella to its joint surface, it was found that the fragments were so tilted that they did not quite meet. The silver wire was taken out and a thick silk ligature passed in its place, first through the quadriceps tendons at the lower border of the patella, then threaded in and out of the capsule at the inner border, so as not to penetrate the synovial membrane, next through the middle of the upper attachment of the ligamentum patellar close to the bone, and finally along the outer edge of the meniscus. The same manner as before was done on the inner edge. On tightening this ligature a perfect approximation was obtained. The synovial membrane was then re-attached by mattress sutures of catgut, the capsular rents repaired by silk, and the external wound closed.

**Case 3.—** Bi-malleolar Fracture at the Ankle.—A heavy man, as the result of a fall, had sustained this common fracture (often mistaken for a Potts' fracture), and there was a considerable amount of deformity and much pain. The region of the internal malleolus was exposed by a flap-incision behind the lower end of the bone. This revealed the interior of the ankle-joint, the tibialis posterior tendon being exposed between the fragments, but it was not of great value, as the same manner as before was done on the remainder. On tightening this ligature a perfect approximation was obtained. The synovial membrane was then re-attached by mattress sutures of catgut, the capsule repaired by silk, and the external wound closed.

**SPECIAL REPORTS.**

**INFANT MORTALITY IN LANCASHIRE.**

(a) The perennial peril of the new-born has long been one of the most perplexing problems set before the
guarantors of our health. The avoidable waste of good human material is appalling.

The Local Government Board in its wisdom has issued a letter warning medical men to request valuable information from the mountain head of infantile mortality, the registration county of Lancashire, which for the period 1901-1910 occupied the worst position in this respect among all the registration counties of England and Wales.

The registration county of Lancashire contains a larger population than any other county in the kingdom, London not excepted. At the census of 1911 its population was 8,260,000, exceeding that of the corresponding county of London by over 300,000. Though the infant death-rate of the county as a whole is the worst in the country, its incidence is not uniformly distributed, and it is by studying the circumstances of these differences that we may hope to obtain the knowledge of the evil that must be the first step towards its obliteration.

Lancashire has shared in the recent decline in infant mortality experienced by the whole country, and it cannot yet be accurately determined how much of this improvement is due to such measures as improved scavenging and housing, better disposal of excreta, and domestic refuse and the increase in such work as health visiting and allied measures for spreading ideas of hygiene among the mothers of the area.

The outstanding feature of the report is the fact that the infant mortality rates are not uniform throughout the county, even in apparently similar areas. For instance, the three neighbouring towns of Burnley, Colne, and Nelson have respective infantile mortality rates of 175, 101, and 97 per 1,000 births. In each of the three towns the circumstances of female employment are similar, and in Burnley the proportion of married women engaged in industrial occupations is not much in excess of that of Nelson, though the infantile death-rate is 90 per cent. greater.

Overcrowding was investigated, which, for census purposes, means a population greater than two for each room, or 100 men or a tenement, and it was found that this did not seem to affect the figures much one way or the other.

The industrial employment of married women, too, has apparently little direct effect on the early death of infants.

Mining districts, with their irregular meal-times and the possibility of having two male members of a family working on different shifts, are notorious for high infantile mortality, and in other areas the local standard of cleanliness, care and attention seems to be the determining factor.

The fact remains that, during 1913, if Lancashire had shared the average experience of England and Wales 3,600 lives would have been saved, while in the town of Nelson they would have been taken a standard the 16,183 deaths under one year would have been reduced by no less than 5,112, and there is no reason why this reduction should not take place. The towns of high and low mortality are often close to one another, and their people live similar lives. It is all a matter of care, education, and consequent attention to simple details of nutrition and hygiene.

To-day of all our needs—and will need more sorely yet—her men. It is in the simple little details that results lie. Much good work is being done by baby clinics and such like organisations, but we should not rest till this outstanding blemish to our credit and our efficiency as a nation be eradicated.

CORRESPONDENCE.

FROM OUR SPECIAL CORRESPONDENTS AT HOME.

SCOTLAND.

NEW NAVAL HOSPITAL AT QUEENSFERRY.

This new hospital at South Queensferry, called the Queen Mary and Princess Christian Hospital, has come rapidly into existence, after some seven weeks' labour. It lies immediately to the east of the existing Royal Naval Hospital at Butlaw, South Queensferry. The new building is a yard of brick, wood and iron, and consists of large wards, administrative central building, operative theatre, staff quarters, power station and entrances. The hospital is set in a park of 80 acres, and Humphreys, Limited, Knightsbridge, London, and the Lord Provost Mr. Fred W. Marks, F.R.I.B.A., London. The first complement of patients, numbering 84, occupied the wards last night after 24 hours. These were men of the navy, drawn from the ordinary sick and injured on board the vessels of the fleet in the North Sea, and were in no way connected with the war casualty lists. On removal from the hospital they were conveyed to their various home ports, in order to rejoin after convalescence.

NATURAL HISTORY SOCIETY OF GLASGOW.

At the opening meeting of the sixty-fourth session, there was exhibited by Mr. James Simpson, M.A., a specimen of the large spider, Lycosa tarantula, got among bananas in Glasgow. Mr. John Glag exhibited Hymenophyllum unilaterale Wild, the Scottish fern, from Loch Riddlen, and for comparison with this Mr. John R. Lee brought forward specimens of the much rarer H. tunbridgetcite from the same district. Mr. Lee also exhibited specimens of the giant sawfly; and Mr. James Steele exhibited preserved specimens of mountain chickens (giant frogs), Goliath beetles, and young alligators, from Dominica.

SCOTTISH RED CROSS.

The Scottish Section of the British Red Cross Hospital in France has now been established. It is on the second floor of the Hotel Azizy in Paris, and it is fully occupied. Paris has now been chosen as the site of the hospital instead of Rouen, on the ground of the German retreat having relieved the French capital. Mr. W. C. Care, of the Scottish Section of the French Red Cross, has returned to France, and is at present busily engaged in organising work at Rouen and Paris. The provision and equipment of the fleet of motor ambulances which the Scottish Section is sending to France is proceeding rapidly. The early despatch to the fighting line is anticipated of two Albion ambulance cars, four Wolseley ambulance cars, two Argyll ambulance cars, three Arrol-Johnston ward wagons, six motor cars and three motor bicycles, with appropriate personnel. The first consignment will speedily be followed by others.

FURTHER ARRIVALS OF WOUNDED.

At Aberdeen 100 wounded soldiers have arrived by hospital train from Stobhill, the majority of them injured in the legs. This makes 300 wounded men in Aberdeen. A further 100 have arrived at Stobhill Hospital, Glasgow, making 600 arrivals. Of this 100 the majority are connected with English regiments; some are the Black Watch, Scottish Rifles, King's Own Scottish Borderers, and Royal Scots, and the Royal Scots Fusiliers are also represented.

OPENING OF WINTER SESSION.

The session opens this week at Glasgow University and the Glasgow extra-university medical schools. At Edinburgh University, which, with the exception of two weeks' diminution was experienced in the number of students matriculating, and Glasgow must expect a similar diminution, owing to the large number of students who have volunteered for the war. Dr. William Watson, 3, Queen's Place, Glasgow, is appointed Lecturer on Medicine in the Western Medical School.

BELFAST.

THE COUNTY TYRONE HOSPITAL FOR THE FRENCH.

The St. John County Tyrone Association, of which the Duchess of Abercorn is President, is sending a fifty-bedded hospital to Paris at the request of the French Red Cross Society. Three surgeons and ten trained nurses will accompany it, and all surgical and medical stores are being provided for it by funds raised in the county.
LETTERS TO THE EDITOR.

[We do not hold ourselves responsible for the opinions expressed by our Correspondents.]

THE ATTEMPTED GERMANISATION OF LONDON UNIVERSITY.

To the Editor of THE MEDICAL PRESS and CIRCULAR.

Sir,—Your leading article of October 7th on the Germanisation of London University is worthy of the serious attention of any educated man, and I need but add that it has interested me to an extent that the fundamental defect in the Tenetonic system lies in the curtailment of the means with the end. So much attention is given to methods that it loses sight of the primary object—namely, to develop in each citizen to the utmost of his individual potentiality. If we are to judge a tree by its fruit, German culture has not produced any startling results in the way of great scientific advances. The steam engine, the electric telegraph, chloriform, the aniline dyes, aseptic surgery, and many modern epoch-making advances were not "made in Germany." Koch’s identification of the bacillus of tuberculosis was only one of many such discoveries founded on the germ theory of disease evolved by the illustrious Pasteur. It is true that the Germans have produced many synthetic drugs, notably that of salvarsan, a discovery of enormous importance.

It will be indeed a misfortune for our countrymen if in medical education we lose sight of the practical end and aim of medical practice. As things go, the private medical practitioner, upon whom the brunt of every new accident must fall, is a far better man in England than the corresponding German qualified man, although the latter may be and often is stuffed with masses of detailed scientific information. So long as he has the latest views upon a given subject he feels happy, only to be happier when the next learned discussion gives him fresh theoretical vantage ground. Two German medical men will discuss with animation the latest researches upon some polynomial, synthetical drug across the bed of their patient, where a practical Englishman would direct his attention to the pulse, the nutrition, and the condition of the lower bowel.

Lastly, our insular system, whatever may be its defects, does not dwarf the humaner virtues at the bidding of a savage, Louvain-sacking materialism. Nor are kindliness, charity, tolerance and loving-kindness to all men incompatible with the highest quality and achievement of genius, as witness the life and character of the late Lord Lister.

By all means let us stick to our insular methods of medical education, perhaps adopting some modification of the system adopted in Germany, which instances sail parously near the theoretical whirlpool in which aspiring German youth is destined either to sink or swim."

I am, Sir, yours truly,

David Walsh.
Harley Street, W.
October 10th, 1914.

FORCIBLE FEEDING.

To the Editor of THE MEDICAL PRESS and CIRCULAR.

Sir,—I am sorry if I misunderstood Sir Victor Horsley in what to me was a vague and ambiguous statement—namely, "Had he, as myself, read Hux- tard he would not have repeated the absurdly false statement that the Cat and Mouse Act had succeeded." Sir Victor, I presume, refers to my letter of September 10th, in which, commenting on the Home Secretary’s statement, I said: "I do not want to disturb the Connollys..."

These are the only words and in the only sense I can be said to have repeated the "absurd statement," as far as I can see, I do not expect him to warrant Sir Victor’s statement, which I regard as misleading and exaggerating, although I now understand his meaning and have no desire to quibble.

Sir Victor, with almost theatrical astonishment, now upholds me for admitting the failure of the Act, whilst, he says, I in the same breath advocate forcible feeding, and he charges me with having confused and inconsistent ideas. On the other hand, I claim that those ideas are simply common sense and rational. It may be urged that Sir Victor was not careful in his choice of words. September 23rd last, says great emphasis on the failure of the Act, and points out that Mr. McKenna’s anticipations have not been realised—that is to say, "the Act has not put an end to forcible feeding, neither has it stopped persons nor corrected the abuses under their sentences"; but these are the very reasons which, to my thinking, render forcible feeding necessary to carry out convictions; and, indeed, the Home Secretary says the Act is causing the option of forcible feeding if necessary. Why, therefore, does not the Home Secretary avail himself of the means to make the Act a success? But this I have urged before, so surely Sir Victor must see that failure of the Act and forcible feeding are quite reconcilable conditions.

As is well known, the militant suffragists vainly boast that they defy the law. They do not, however, defy the law as decreed through enactment, of which they are as frightened as any ordinary mortal; what they do is to defy individuals such as members of the Government, stipendiary magistrates, and the other highly placed legal functionaries whom they assail, and the reason of their audacity is due to the present Government’s enabling robust and virile dignity and majesty and deterrent action through this very Act, which makes the administration of criminal law as though a mere personal matter subject to the whim or caprice of any one of the Government, when they say that the Government has forged a weapon by this Act they are afraid to handle, and the militants, well knowing this, rely upon "attempts to commit suicide as a ready means of escape, while the general public have to pay toll and too frequently at considerable cost."

Sir Victor has more than once referred to Germanic barbarity, comparing it to forcible feeding. On this point I need only remark that, regarding the destruction of war and work and work and work, however, every man at his work, and if the militant were a waiter, whatever his work were, as an example, at his work, they exhibited the same spirit of revenge as the Germans.

I note that Sir Victor, with commendable candour, if I mistake not, would support militancy even to the extent of obtaining seats in Parliament, but if militancy is to prevail the vote seems scarcely necessary, because if a handful of violent women can obtain one law through violence, why should they not obtain any other law without the vote which they might deem expedient?

I am, Sir, yours truly,

Clement H. Sers.
5 Chancetown Road, Hove.
October 6th, 1914.

REPORT OF THE SELECT COMMITTEE ON PATENT MEDICINES.

To the Editor of THE MEDICAL PRESS and CIRCULAR.

Sir,—Whilst the war continues and Parliament remains in its present plight, it would be absurd to open a discussion for the promotion of medical law reform. When the time arrives the Report of the select Committee will furnish a weapon powerful enough to assure victory, if only the organisations calling for legislation are united and active. The Select Committee ought alone to be the official in the demand for legislation. The Report is unanimous; it demonstrates the nature and magnitude of the evils and abuses it seeks to remedy, and formulates the simple legislation which it is necessary to carry away to the prohibition of all nostrum-mongers. They are not an organised body, nor can they become one. The greater part of them are living by obtaining money under the'crust of false pretences, and all very few of them to have to defend their position. The most serious obstacle to reform will come from the passive or active attitude of the newspaper Press. There exists a small minority, headed by the Spectator, whose columns are clean, but the great bulk of the papers of every class, including the majority of those that stand in the front rank of journalism, are even now, weeks after the issue of the Report, filling their columns as usual with advertisements of "cures" and of quacks, "swindlers"
and "fakirs" exposed and denounced therein in these terms. I myself have during late years been in correspondence with editors and managers of leading papers. They are all fully alive to the foul source of their income. Unfortunately a vast number of medical men are still incorrigibly impressed upon these facts and my main purpose in writing this, for the moment final, letter, is to entreat your readers to gain the necessary knowledge. The Report costs only 3d. It can be got through any bookseller, or direct from Wyman and Co., Fleet Lane, E.C., the Government printers. One shilling will pay for three copies and postages. I have been sending out a large number to medical friends, and have been giving copies to nurses, and if we could induce our readers to adopt a similar course they might help to enlighten the intelligent public as to the fraudulent and cruel character of quackery which is exposed with admirable lucidity and brevity in the Report.

I am, Sir, yours truly,
HENRY SEWILL.

The Old Rosery, Earlswood Common, October roth.

THE NATIONAL RELIEF FUND.

To the Editor of The Medical Press and Circular.

Sir,—As we have now reached the £3,000,000 mark, the Prince of Wales will be glad if you will kindly insert the enclosed letter in your issue.

I am, Sir, yours truly,
HEDLEY F. LE BAS,
Joint Hon. Secretary.

October 6th, 1914.

Buckingham Palace.

On the 6th August I appealed to the Nation to assent to me in founding a National Fund to aid our brave and valiant ally, its military and civil distress arising in consequence of the war. To-day, after the lapse of exactly two months, I am happy to say that the Fund has reached the splendid total of £3,000,000, and I wish to take this opportunity of thanking once more all the many thousands of generous subscribers who have helped me to achieve this grand result.

I have delegated the responsibility of administering the Fund to the Executive Committee which I have appointed on the advice of the Prime Minister, and I count upon the Committee to see that assistance in emergency cases is adequate and given with as little delay as circumstances permit. I trust that the portion of the Fund which is to be applied in relief of civil distress may as far as possible flow into productive channels such as assisting schemes for male and female employment and perhaps industrial training, so as to render the recipients that assistance should be distributed mainly in the form of doles. What men most want is work and what young people need is training.

The Fund which has already been raised is magnificent, and I am confident that the generous British public will continue to do their utmost to alleviate the distress which war inevitably brings in its train.

EDWARD.

OBITUARY.

SIR ALFRED THOMSON, M.D.

It is with regret we announce the death of Sir Alfred Thomson, who passed away in a nursing home in Belfast on September 27th. He was born at Baldjess, County Antrim, in 1863, and was the youngest son of Dr. Henry Thomson, of Baldjess, who practised in Bangor from 1853 to 1888. Educated at the Royal Academy Institution, Belfast, he went to Queen's College, London, and afterwards to Dublin and then to London, where he was a student of the Royal University of Ireland and became M.R.C.S. Eng. His Hospital training was received in Belfast, Dublin, and London, and he was for a time Resident Medical Officer of the Belfast Infirmary. In search of health, he went to South Africa in 1891, and became Resident Medical Officer of Kimberley Hospital, leaving to start private practice in Capetown two years later. He was attached to the staff of the Somerset Hospital, and held several Government and company appointments. His great ability, and also his generosity and kindliness, soon brought him to the very forefront, and his recent knighthood was followed by a knighthood of the order of the field he filled. Four years ago he undertook an operation in London, and again last July he left South Africa to seek medical advice at home. Another operation was performed, which was performed in Belfast, and had unhappily a fatal issue. His delightful personality will long be remembered, and his death leaves a gap in South African circles which will not readily be filled. Sir Alfred was unmarried.

DR. E. HOOPER MAY, OF TOTTENHAM.

The medical profession in Tottenham and district have sustained a great loss in the death of one of their oldest friends and colleagues, Dr. Edward Hooper May, Consulting Surgeon to the Prince of Wales's General Hospital, Tottenham, N., which took place on the 6th inst., at home, in High Cross, aged 83. Descended from an old Quaker family, Dr. May was educated privately and at St. Bartholomew's Hospital. He became F.R.C.S. Eng. in 1865 and took the M.D. St. And., four years later. It was largely owing to his efforts that the Tottenham General Dispensary was established, but Dr. May's greatest work was in connection with the Prince of Wales's Hospital, of which he was the earliest member of the medical staff in the Dispensary. His part in the training of deaconesses under the direction of Dr. Michael Lasseron. The Evangelical Protestant Deaconesses' Institution and Training Hospital, to give it its full name, was established in 1867, and the hospital in its early days was staffed by Dr. May in association with Dr. Rasch and Dr. Lichtenberg. It may not be generally known that Lister's treatment and the carbolic spray were employed earlier at this hospital than in any other hospital in London. Dr. May was a constant visitor at the hospital, and its successive changes of name from the Tottenham Hospital to the present one of the Prince of Wales's General Hospital, were a source of peculiar pride to Dr. May who watched over its vicissitudes and laboured most yet. He was so faithful for upwards of forty years. As a surgeon Dr. May attained a great reputation, his decisions being invariably correct and his treatment fearless yet conservative. With the comfort and treatment of patients he was specially concerned, and he would visit a critical case many times unofficially if he thought he could suggest anything further for the patient's relief and well-being. The whole bearing and everyday attitude of Dr. May to his profession and patients, and to his patients was of the old-fashioned courtly Christian gentleman No further tribute to his sterling character than this is needed. Much sympathy is felt with the widow and family in the loss they have sustained.

MEDICAL NEWS AND PASS LISTS.

Hospital Saturday in London.

The Lord Mayor of London issued the customary appeal through the Press in the interests of Hospital Saturday, which was fixed for Saturday last. He remarked that owing to the splendid manner in which the hospitals are accommodating the sick and wounded from the war, and helping the sufferers in other ways, he would urge upon the public to do their best this year, as the cause is good and the need great. Thousands of ordinary subscribers have joined the colours. Those safe at home, he said, should give for those who are fighting as well as for themselves. It would not be right to send the funds direct to the hospitals because one is giving to the patriotic funds. Both should be supported to the very utmost.

Large Benefactions to Dublin Charities.

Mr. Francis Leonard, of 5 South Circular Road, Dublin, retired merchant, recently deceased, left
personal estate in the United Kingdom valued at £15,000. By his will the testator made the following among other charitable bequests:—£200 each to St. Clare’s Home, St. Margaret’s Home, Harold’s Cross, the Mater Misericordiae Hospital, and the St. Vincent’s Hospital, Dublin; £150 each to Our Lady’s Hospice, Harold’s Cross, and the Jervis Street Hospital, Dublin; £100 each to the Institutes of Our Little Sisters of the Poor, St. Patrick’s Home, South Circular Road, Kilmainham, the National Lying-in Hospital, Dublin, the Lakefield Orphanage, Sandymount, and St. Joseph’s Night Refuge for Homeless Women and Children, Dublin.

Gift from London Panel Practitioners.
As the result of an appeal to practitioners on the London panel subscriptions have been received which will enable the Society to present the Red Cross Society with a 25 h.p. 1915 Berliet chassis, equipped with a motor ambulance body, constructed to take four army stretchers or to seat 14 wounded men. The equipment includes a dynamo electric lighting set.

University College, Cardiff, Medical School.
At a meeting of the Council of the University College of South Wales on Friday last, it was announced that the following are the candidates for the post of Professor of Preventive Medicine and Medical School Buildings.

Societv of Apothecaries of London.
At the primary examination held on October 7th and 8th, 1914, the following candidates passed in:

University of Glasgow.
The following have passed the recent final examination for Bachelors of Medicine and Bachelors of Surgery (M.B., Ch.B.):

Without Honours—James W. Moffat.
With Honours—John B. M’Dougall, Dugmar F. Currie, Alexander H. Hall, Donald McIntyre.

Mr. James Wm. Moffat gains the Brunton Memorial Prize of ten pounds, awarded to the most distinguished graduate in medicine of the year.

MEDICAL WAR NEWS.

A Captain in the R.A.M.C. relates his experiences in the Times:

"We had got a school with a private dwelling house next door rigged up as a hospital at —. We had about 48 cases in hospital at the time—all serious. About 10 a.m., a tremendous explosion occurred about 100 yards away. Almost immediately afterwards several more explosions took place about the hospital, and a wounded officer told us that the Germans had got our range with a battery of siege guns similar to those used at Liége. A moment later a shell struck the far end of the building, instantly killing a patient and severely wounding others. We were not aware that we were attending him. The room was wrecked, the wall blown in, and the whole building shaken. The place now rapidly filled with men who had been wounded in the vicinity of the hospital. These wounds were terrible. The fragments of shell are burning, and they tear and crass. Even the doctors, with their trained eyes, can hardly see them without a sensation of shrinking. I was trying to stop the bleeding of a leg when a wounded man came in, and to the groin, when a shell burst outside the window and threw the tables, dressing cases, and stretchers to the ground, filling the room with smoke. The orderly who was helping me was struck on the arm, and in his fall knocked me down. There was a little confusion, but order was quickly restored and the dressing of the wounded continued. Captain — successfully performed a tracheotomy on a gunner wounded in the throat. Shells were now pouring in from all directions at three a.m. The rush of a shell through the air can be heard for about three seconds, and this gives one just time to take what cover is available. The thin walls of the building were a good protection against flying fragments of the shell and shell bursts, but of no more avail than tissue paper against the shell itself. About 11.30 a shell went through the roof without bursting, and almost at the same time one wrecked the kitchen, wounded two men, and blew out the shell. The shells were brought to the garden, digging a pit into which you could stand up to your waist. We had finished dressing the wounded, and I was about to look round. Everybody was in his proper place; the surgeons were working away, trying to remove fragments of the shell, while they were tidying up and removing soiled dressings, Capt. —, who had comically cleaning his instruments. It was now 12, and to our great relief the shell dropped suddenly stopped. After an anxious interval we began to recognize the hospital. The debris of bricks and masonry was cleared away, the mattresses brought out of the wrecked ward, and another ward established and the patients were fed. At 1 o’clock shelling commenced again, and about 2 o’clock shells were again bursting all around the hospital. The noise was deafening, and the racket of falling plaster and brickwork and the groans of the wounded were one of the wreck of the building and a strong wind. At 3 o’clock a shell struck the house first used as a hospital, bringing down the roof and large blocks of masonry with a terrifying crash. I went in with Capt. ——, to see what we could do —— the wounded were crawled away from their mattresses towards the door and begged us pitiously to remove them. One man, both of whose legs had been shattered, had just died as he reached the middle of the room. The last shelter was afforded by the back end of the building, which was still standing, and there we took them, trying to reassure them. Shortly after this the shell became even more terrible. The roof was split open from end to end, and the first gunner to be killed was blown to pieces. An ambulance wagon inside was shattered; four horses were killed—all this with one shell. The mortar—a large outbuilding at the back—was completely wrecked, and another small outbuilding also disappeared. There was nothing but the foundations left. We four officers held a little council of war to decide what had best be done. The Germans generally stop shelling at nightfall. We had no orders to move; we had done what we could, and were waiting. The rooms were in a state of darkness, for we had closed the wooden shutters outside as some feeble protection against the flying fragments. The shelling during the last hour was terrific. A curious incident occurred when a cloud of shell came through the window, and took the chair on which an A.S.C. driver was sitting from under him without hurting him in any way. Shells were now bursting regularly every minute. We looked longingly at the clock, but it seemed to have
stopped going. During the last hour we sat waiting for the shell which was to finish us. At 2.40 it seemed to have come. There was a deafening crash immediately behind the hospital, all the shutters instantly opened outwards, and the house was filled with smoke. The rattle of falling cars and bedframes and furniture of the house trembled from end to end.

Then everything became strangely quiet. We looked at each other with one question in our faces, but no more shells came. We began to talk to each other again—a great relief. After a little time food was served out to the patients. Then the dead were collected and removed. An A.S.C. driver was in a corner crying. All his horses had been killed. After the dead had been gathered up, the arrangements were made to evacuate it as soon as possible. It was a merciful thing indeed to have escaped, but of one thing we were glad—at no time was there any panic, and whatever we may have felt we had managed to cheer our patients and keep hope alive throughout this terrible day."

Dr. Leonard Owen Taylor, who has been promoted to be Captain since he went to the front, has contributed some interesting letters to the *Nottingham Guardian*. He says that the battle of Mons was much bigger than those in the firing line imagined, and that the attitude of the wounded was wonderful, and that the wounds of the Germans are more severe than those of ours.

"The cavalry brigade to which Captain Taylor is attached is resting at a farm with their horses after their terrible hard work up to the time that the Germans determined to hold their present fortifications facing the allies. On the day before his last letter he had been under fire with the wounded, and had finally been placed in charge of a hospital holding about 1,000 wounded prisoners, who he says presented the most dreadful sight. He adds that the splendid system of waterways in Northern France will be utilised. The barges will carry surgeons and nurses and form floating hospitals which can easily be moved about. Severe cases can have immediate attention in favourable circumstances.

The first barge was presented last week. It is named "L'Ile de France." It will accommodate 40 wounded men and two surgeons. It is believed that it should make the journey from the front to Paris in less than three days. This scheme deserves every encouragement and will be widely extended.

An appeal was issued last week by Lord Roberts on behalf of the Indian Soldiers' Fund, the object of which is that the Indian Service may be restored to India, and relatives be spared the heart-breaking journey from home. It is suggested that donations be made on the following basis: (1) to buy a special transport for Indian soldiers, who may be wounded or fall sick in this war, a hospital in a warm climate in which they will be able to regain health and strength so as to return, either to the front completely cured or to India; and (2) to provide comforts for the Indian soldiers while in the field, and to replace the warm clothing with which they will start fully supplied, but in regard to which losses must inevitably occur. With the approval of the Viceroy of India and the Secretary of State, the St. John Ambulance Association has appointed a sub-committee constituted as follows:—Sir John Hewett (chairman), Col. Sir T. Wynne (vice-chairman), Lord Roberts, Adeline Duff, Sir John Lendrem, Maj. B. Scarbrough, Lady Minto, the Maharani of Bharatpur, Lady Amphill, Lady Sydenham, the Hon. Lady Lawley, Lady Peckett, Lady Duke, Lord Curzon. Lord Harris, Lord Grantham, Lord Milner, Lord D'Abernon, Lt.-Col. Sir R. Temple, Sir H. Perrott, Sir Mortimer Durand, Surgeon-Gen. Sir R. Havelock Charles, Sir D. Yule, Sir J. Stanley, Lieut.-Col. Sir J. Dunlop Smith, Lieut.-Col. F. F. O'Connor, Mr. Ratan Tata, and two secretaries—Mr. P. D. Agnew and Mr. E. H. Blakesley.

It is proposed to establish a hospital of 500 beds at Alexandria and a smaller subsidiary hospital at Marseilles.

It is announced that Mr. Oliver Williams left London recently for Paris with 33 nurses of the Allied Forces Base Hospital, the equipment of which has been carried out by Messrs. Harrods, who have undertaken to do the catering on the Continent. Lady Sarah Wilson, one of the principal organisers of the hospital, preceded the staff and goes to make preliminary arrangements for their arrival. Further subscriptions are urgently needed, and may be sent to the Hon. Treasurer or Secretary, the Allied Forces Base Hospital, Grosvenor St., London. Mrs. Louise Garrett Anderson and seven English lady doctors have organised a military hospital in Paris. The hospital is "maned" by women. The entire staff is composed of women. It contains 70 beds, and is doing excellent work.

Actuated by deep sympathy for the wounded of the Russian Army and by the desire to alleviate their sufferings and save valuable lives, a new field ambulance service has been formed in the City of London, to provide first aid especially for the cavalry of the Russian Army. It is hoped that this new force will be well supported by the initiative of efficient men who have volunteered as chauffeurs and attendants. The Lord Mayor and others associated with this presentation are appealing for funds, particularly to those having affiliations for business interests with Russia, who are intended to purchase and maintain in the field for three months as many units as possible, each consisting of ten ambulances. After this date, the Russian Red Cross Society will defray all further expenses of maintenance.

The office of the Committee is at 33, St. Swithin's Lane, E.C.; Honorary Secretary, W. E. W. Hall.

**NOTICES TO CORRESPONDENTS.**

ADVERTISEMENTS.

For Our Insertion—Whole Page, 2s.; Half Page, 2s. 6d.; Quarter Page, 2s. 1d.; One-eighth, 2s. 6d.

**MEDICAL WAR ITEMS.**

The Egyptian Red Crescent Society, of which Prince Mohamed Ali is president, has contributed £14,000 to the funds of the British Red Cross Society.

The War Office has accepted 10 beds at the Royal Westminster Ophthalmic Hospital for the use of the wounded suffering from injuries and diseases of the eye.

It is reported from Paris that the Union of the Women of France has inaugurated a service of hospital barges for the wounded. Three have already been sent to Paris, and other are to follow.

The first barge was presented last week. It is named "L'Ile de France." It will accommodate 40 wounded men and two surgeons. It is believed that it should make the journey from the front to Paris in less than three days. This scheme deserves every encouragement and will be widely extended.

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The following reductions are made for a series.—Whole Face, 13 insertions at £3 10s.; 26 at £3 3s.; 52 insertions at £3, and for rates smaller than these.

Small announcements of Practice, Asstnacies, Vacancies, Books, etc.—Seven lines or under (70 words), 4s. 6d. per insertion; 6d. per line. These are kindly requested to send their communications, if resident in England or the Colonies, to the Editor at 1 The Old Vicarage, Strand, London, W.C. 2, or resident in Ireland to the Dublin office, in order to save time in reforwarding from office to office. When sending subscriptions, it is essential to state to whom they are addressed, in order to be addressed to the Publisher.

Original Articles or Letters intended for publication should be typed or written double the size of the paper only and must be authenticated by the name and address of the writer, not necessarily necessarily as a mark of identity.

Reprints.—Reprints of articles appearing in this Journal can be had at a reduced rate, providing authors give notice to the publisher or printer before the typeset of the article is distributed. This should be done when returning proofs.

Dr. C. L. (London, W.)—Communication received too late for insertion this issue.

THE RESEARCH DEFENCE SOCIETY.

We are asked to announce that, in view of the publicity now being given to the question of preventive inoculation against typhoid fever, the Research Defence Society are prepared to furnish supplies of a leaflet entitled "Protection against Typhoid Fever," which is in stock and at 6d., and will require the ratification of the process. The Society is further making arrangements for providing the treatment free of charge. Applications should be addressed to: Dr. John, Research Society, 21, Ludgers, London, W. 1.

Ms. H. G. (Nottingham).—According to the new statute of the Elms Club, under the Defective and Epileptic Children Act, 1914, a local authority may, after consultation with the parents of a child under the age of 5 who is a defective of 5 or above of 5 years, require such parents to send the child to a certified class or school suitable for it, if they are satisfied that provision is not being made for the child's education.

Meetings of the Societies, Lectures, &c.

HUNTERIAN SOCIETY (Babbin's Hall, Monkwell Street, E.C.)—6.30 p.m.: Council Meeting.

ROYAL SOCIETY OF MEDICINE (Section of Electro-Therapeutics) (Bolingbroke Hospital, Woodwards Common, S.W.)—9 p.m.: Dr. A. Whitfield, Lichfield.

FRIDAY, OCTOBER 10th

ROYAL SOCIETY OF MEDICINE (Section of Tropical Medicine and Hygiene) (Bolingbroke Hospital, Woodwards Common, S.W.)—9 p.m.: Professor Marshall, M.D., F.R.C.S., and Mr. C. E. M. Balfour. 

THURSDAY, OCTOBER 22nd

HARVIAN SOCIETY OF LONDON (Stafford Rooms, Titchborne Street, Elkgrove Road, W.)—1.15 p.m. (An exhibition of clinical cases will be held in the Society’s rooms.

Vacancies.

Abbeyleix Union Medical Officer and Medical Officer of Health.—Salary £70 per annum, with addition of £60 as a year ($13,000) to Michael, Clerk of Union. (See adv.)

Hulme Asylum, Dale Street, Stretford Road, Manchester.—Wanted a House Surgeon, duly registered and fully qualified. Salary £150 per annum. Age 25, with special qualifications, and with testimonials, at once to Office Secretary, Medical Officer. (See adv.)

Bristol City Asylum, Fishponds.—Second Assistant Medical Officer Salary £20 per annum, with furnished apartments, board, washing, and attendance. Applications to the Medical Superintendent.

Swansea Union—Resident Assistant Medical Officer. Salary £25 per annum, with furnished apartments, board, washing, and attendance. Applications to the Medical Superintendent.

Abbeyleix Union.—Resident Assistant Medical Officer. Salary £25 per annum, with furnished apartments, board, washing, and attendance. Applications to the Medical Superintendent.

Royal Sea Bathing Asylum, Littlehampton, West Sussex.—House Surgeon, Salary £150 per annum, with board, residence, and laundry. Applications to the Secretary, Royal Sea Bathing Asylum, New Street, Littlehampton, West Sussex.

West Riding Asylum, Wakefield.—Assistant Medical Officer. Salary £200 per annum, with board, residence, and laundry. Applications to the Medical Director.

Corporation of Manchester—Assistant Tuberous-Crop Officer. Salary £25 per annum. The appointment is subject to the Sanitary Committee. Civic Buildings, 1, Mount Street, Manchester.

NOTTINGHAM GENERAL HOSPITAL.—Senior House Physician. Salary £170 per annum, with board, residence, and laundry in the Hospital. Applications to the Secretary. E. M. Keely, Secretary.

KENT.—Ray Asylum, Chatham, near Canterbury.—Junior Assistant (Third) Medical Officer. Salary £250 per annum, with furnished quarters, attendance, coal, gas, milk, garden produce, &c. Salary £200 per annum, and be bound to the Medical Superintendent.

MANCHESTER.—Northern Hospital for Women and Children, Park Place, Cheadle Hill Road.—House Surgeon. Salary £250 per annum, with apartments and board. Applications to Mr. James Tongue, Secretary, 25, Barton Arcade, Manchester.

Leicestershire and Rutland Mental Hospital, Narborough, near Leicester.—Junior Assistant Medical Officer. Salary £250 per annum, with board, lodging, and washing. Applications to W. J. French, Medical Officer, Belgrave Square, Leicester.

RAMGATE.—General Hospital for Women and Children, town surgeon. Salary £250 per annum, with board, residence, and supplies. Applications to Mr. J. S. Collyer, 5, Barton Arcade, Ramsgate.

Appointments.

CARLOW.—Walter W., F.R.C.S.Ed., Temporary Assistant Surgeon to the Royal Infirmary, Edinburgh. Salary £150 per annum, with board, residence, and supplies. Applications to Mr. J. S. Collyer, 5, Barton Arcade, Ramsgate.

JARDINE, F. M., F.R.C.S.Ed., Temporary Assistant Surgeon to the Royal Infirmary, Edinburgh. Salary £150 per annum, with board, residence, and supplies. Applications to Mr. J. S. Collyer, 5, Barton Arcade, Ramsgate.

McEwen, C. C., B.M., B.C., Continent, D.P.H., Certifying Surgeon under the Factory and Workshop Acts for the Ardsleigh District.

RITCHIE, J., M.D., C.M. Aberdeenshire, D.P.H., Medical Officer for the Harbour Board, Edinburgh. Salary £150 per annum, with board, residence, and supplies. Applications to Mr. J. S. Collyer, 5, Barton Arcade, Ramsgate.

Births.

CASEWELL.—On October 10th, at 61 West Side, Wandonmore, Common, the wife of Robert Casewell, M.A., M.B., Ch.B., of a daughter.

CLARKE.—On October 9th, at Emsden, Stirbufield, the wife of H. R. Clarke, M.R.C.S., L.R.C.P., of a daughter.

CUMMINGS.—On October 9th, at 27 Weymouth Street, W., the wife of R. Cummings, M.B., of a daughter.

DARTNELL.—On October 9th, at Castleacre Florence Road, Southsea, the wife of E. Dartnell, L. E. Dartnell, R.N., of a daughter.

MANSELL.—On October 9th, at Brentwood, Essex, to Dr. and Mrs. Mansell, of a daughter.

MARSHALL.—On October 9th, at Shanghai, China, the wife of D. J. Marshall, of a daughter.

Marriages.

BANBURY.—On October 6th, at All Saints, Norfolk Square, to Miss Margaret Clarke, the daughter of Charles Banbury, 46, St. Cuthbert’s Place, High Street, Wakefield, R.N., only son of Mr. and Mrs. Clarke, of 106, High Street, Wakefield, R.N., and of Mr. and Mrs. Walter Trower, of 11 Talbot Square, Hyde Park, London, to Miss Ellen Manners, daughter of Mr. and Mrs. Manners, of Woodland, Letchworth, Herts, and of Mr. and Mrs. John Bentham, of Hanger, Coombe, Essex.

PENNY.—On October 9th, at St. Mary’s Church, Cockfosters, Middlesex, to Miss Margaret Penny, daughter of Mr. and Mrs. Penny, of 76, Broad Street, Ealing, to Mr. John Penny, 76, Broad Street, Ealing, to the daughter of Mr. and Mrs. John Penny, of 76, Broad Street, Ealing, to the daughter of Mr. and Mrs. John Penny, of 76, Broad Street, Ealing, to the daughter of Mr. and Mrs. John Penny, of 76, Broad Street, Ealing, to the daughter of Mr. and Mrs. John Penny, of 76, Broad Street, Ealing, to the daughter of Mr. and Mrs. John Penny, of 76, Broad Street, Ealing, to the daughter of Mr. and Mrs. John Penny, of 76, Broad Street, Ealing.

Deaths.

GREENFIELD.—On October 11th, in Edinburgh, Miss Amy Wissfield, daughter of Emeritus Professor Greenfield, M.D., of Kirkcaldy, Elgin.

LIAS.—On October 8th, at his residence, 44 Tidewater Road, Putney, Alfred William Lias, M.R.C.S.Ed., L.R.C.P.Lond.

LINDSAY.—On the 11th of September, at the Battle of the Aisne, Victor Aoibus Iervais, 3rd Lieutenant Canonge, youngest son of Mr. Jervais, F.R.C.S., 42, Montrose Square, Leith, to Katherine Eileen, eldest daughter of Mr. and Mrs. John Farmer, of Greenlees, Kirkcaldy, Elgin.

ROGERS.—On October 4th, at Springield, Tuckentay, Totes, S. Devon, Dr. Cecil Rogers, aged 70.

HULME DISPENSARY.

DALE STREET, STRETFORD ROAD, MANCHESTER.

WANTED.—A HUSBAND SURGEON on the district of Sale and fully qualified. Salary £120 per annum. Annual increase £10 to £200, with apartments, coal and gas. Applications to W. J. French, M.R.C.S., L.R.C.P., 25, Barton Arcade, Manchester.
Temperance and the War.

The marked advance of temperance principles in the present war has been already commented upon in these columns. Londoners have always enjoyed the privilege of keeping their public houses open an hour later than the time fixed in the provinces. That tradition, however, has been rudely disturbed by the Licensing Authority, which not long ago decreed that licensed houses were to be closed at 11 p.m. The experiment appears to have answered its purpose satisfactorily, for, on the 15th instant, a special meeting of the Authority decided that from the 10th all licensed houses in London should close at 10 p.m. It appears that the Licensing Authority administers the Act in conjunction with certain other authorities, and the curtailment of hours has the agreement of the Home Office and the Police. Another step which has for a long time been favoured by the Licensing Authority is the postponement of the opening hour for the sale of intoxicant liquors to 10 a.m. It is interesting to note that the curtailment of hours applies to private clubs, whereby any appearance of class favouritism is avoided.

All this means a victory for the temperance cause. The shortening of hours on licensed premises was, in any case sooner or later a foregone conclusion, but it can hardly be questioned that its present consummation has been mainly due to the advent of the war. It was found in various parts of the Kingdom that alcohol was responsible for a deal of trouble amongst the mobilised troops and the recruits of the new army, and a general early closing order was adopted in all parts of the Kingdom. So far as our army is concerned, both at home and in the field, strict temperance, or, for the most part, abstinence, is the order of the day. There can be no doubt as to the part played by alcohol in military crime and disorder in times of war no less than of peace. There is evidence to show that much of the barbarity that has disgraced the German army for ever in the history of nations has been due to indulgence in strong drink flouted by the soldiers. The fact that the British Army has followed the fashion of sobriety set by other classes of the community marks one of the final triumphs of a great social reformation. A late conversion to the temperance movement is that of the Kaiser, who has issued an order to the German soldiers to drink no more wine!

Gratitude of a "Nervous" Patient.

A Ryton turner and his wife were sued for £38 6s. 6d. medical fees. It appears that defendant secured £300 damages from the Newcastle Corporation on account of his wife, who had fallen from a tramcar and injured her spine. Of the sum mentioned £250 was awarded for general and £50 special damages, the latter including doctor's fees £29 12s. 6d., the balance of the claims being made up by special consultations and reports, whereby the defendant won his case. His plea was that being in a medical club the attendance was covered by the subscriptions. In the witness box he trembled violently and was so nervous that the case was stopped for several minutes at a time. At length, trembling violently, he asked the judge whether he "would make it second division," thereby clearly announcing his own view as to the punishment best fitted for his particular crime. The judge remarked that there was no defence to the action, and declared in favour of the medical man. Defendant, who was said to have done no work since he won his suit against the Corporation, declared that all the money was gone. The obvious reflection arising out of this case is that money earmarked for medical fees should in future be paid to them in advance. Lawyers take care to deduct their fees before handing over damages to their clients: why should not a solicitor be similarly careful in securing payment of medical fees?

The trial of Orlando Edgar Miller was opened on Tuesday last at the Old Bailey. The charge was that of the manslaughter of Miss Kate Addison-Scott. The facts of the case, as stated by Mr. R. D. Muir, counsel for the prosecution, were that "Dr." Miller received patients for payment at his house, which was known as the Miller Institute. Miss Scott suffered from paralysis and attended lectures given by defendant on "Higher Thought and Faith Healing," and it was alleged that as a result she entered the Institute, where she was treated by a dangerous drug—hyoscine. Miss Scott died five days after admission, and was not attended by a medical man until the afternoon before her death. As the case is sub judice at the time of writing, no comment can be made at present. Our attention, however, has been called to a rumour that a qualified medical practitioner has taken over the management of the "Institute" during the past few weeks. Without full confirmation we should be inclined to doubt the credibility of any such report. If such were the case, Dr. Miller's successor would in all probability be called upon to furnish certain explanations to the General Medical Council.
LEADING ARTICLES.

THE SELECT COMMITTEE ON PATENT MEDICINES AND THE PRESS.

One of the many important subjects dealt with by the Select Committee on Patent Medicines is that of the relation of the periodical press to secret remedies. The profits made by the trade in the boser proprietary medicines—which must, of course, be carefully distinguished from the legitimate and reputable class of drugs—are enormous. The report states that the yield of special duties upon patent medicines showed its greatest advance in one year for many years in 1914, when the increase amounted to £31,958. For the year ending March 31st, 1914, the number of medicine stamps issued was 44,237,166, of which 34 millions were for 1d., nearly nine millions for 3d., and a little over one million for 6d., an increase of rather over 2½ millions in six years. The Customs and Excise cannot form any estimate from these figures as to the total sales. On the assumption, however, that all the 1d. stamps were put upon medicines retailed at 15. 1d. (which is not entirely the case), the sales of them would reach about £1,936,000, and that all the 3d. stamps were put upon medicines retailed at 25. 9d., the sales of these would be about £1,275,000, or nearly £3,000,000 for these two classes of preparations alone. There is no means of ascertaining the amount of sales of American patent medicines sold in the United Kingdom, but it is known that the amount has increased during recent years, and that it has roughly corresponded to an increased stringency in United States legislation. The report alludes to the fact that the turnover of the proprietor of "Beecham's Pills," selling over a million pills a day, Sundays included, is about £300,000 a year. The proprietors of "Seigel's Syrup," who have sold 100 million bottles in 40 years, pay upwards of £40,000 a year in wages alone. Instances of figures might be multiplied ad nauscam, but there is little need to labour the point—viz., that the profits of the trade in the undesirable class of secret remedies are enormous. That proposition being established the next question naturally arises as to how these profits are secured. The answer to that query is "Advertisement—and again—Advertisement—and always—Advertisement." The relation of the newspaper and periodical press to the trade in secret remedies is thereby thrust into prominence. It is no use blinking the fact that without the aid of the public press the patent medicine trade would never have been able to attain its present dimensions. It redounds to the credit of Sir Henry Norman and the Honourable Harry Lawson, both distinguished in the journalistic world and members of the Inquiry, that the matter was fully entered into by the Committee. It is admitted that a sum of £2,000,000 or more is spent annually in newspaper advertisements of the kind under consideration. After remarking that the proprietors of the better class of newspapers and secret remedies alike would welcome a drastic suppression of "suggestive or improper" advertisement, it goes on carefully to exclude from that observation "the advertisements of swindlers like Macaura, the 'eye quacks,' the 'deaf quacks,' the cancer-curers, the consumption-curers, the electric belt makers, the curers of rupture without operation, or 'fakirs' generally." "As regards these classes," says the ingenious report (p. XI.), "most newspaper proprietors do not regard it as incumbent upon them to test the good faith of secret remedy advertisers any more than advertisers of other goods, though a few of the leading newspapers exercise a very severe censorship upon advertisements of this kind also." This sentence undermines the position of newspaper proprietors, for it makes the cynical confession that they are as a body ready to share in the proceeds of money obtained by false pretences of swindlers like Macaura, cancer-curers, and of other harpies of a like kidney. This apparent laxity, however, is handsomely atoned for in the recommendations, which advise the prohibition of advertisement and sale of medicines purporting to cure cancer, consumption, diabetes, Bright's disease, deafness, epilepsy, rupture and so on. Meanwhile, it is to be regretted that certain leading newspapers are at the present moment inserting advertisements of patent medicines making, obviously, unsupportable claims to cure this, that, or the other complaint. There can be little doubt that were Parliament to pass legislation controlling the advertisement of the disreputable class of secret remedies, it would thereby strike a deadly blow at the root of a nefarious traffic. It is to be hoped that the legislature will deal with the matter in a spirit of thoroughness and fearlessness of opposition by vested interests that has inspired the Select Committee. The social abuse investigated by that body demands speedy and sweeping legislation in a matter vital to the public health of the community.

THE MEDICAL ROLL OF HONOUR.

We regret to announce, as a result of the sinking of H.M.S. Harache by the enemy last week, the following surgeons are missing, and it is feared they must have lost their lives:—Staff-Surgeon George C. C. Ross, Surgeon Gustavus W. M. Custance, and Surgeon Jas. H. Dicky Watson. The following medical officer at the front is reported missing: Captain A. D. Fraser, R.A.M.C. Officers previously reported missing, now unofficially reported prisoners of war: Capt. R. J. Coghill, R.A.M.C., Capt. J. W. Graham, R.A.M.C., Major H. W. Long, R.A.M.C., Capt. G. W. Stevenson, R.A.M.C., and Capt. W. I. Thompson, R.A.M.C. Among the South African casualties are reported Capt. W. F. L. A. Holcroft, S. African M.C., wounded and captured: and Capt. Dalton, S.A.M.C., also wounded and captured. This week a despatch from Sir John French mentions the names of a number of officers and men who have distinguished themselves in the series of arduous battles that have been waged during the past month. The names of the medical men thus honoured are as follows:
General Headquarters Staff: —
Surgeon-General (temporary) T. P. Woodhouse.

Royal Army Medical Corps: —
Birrell, Major E. T. F.
Boordillon, Lieut. L. G.
Butler, Major S. G.
Caddell, Capt. E. D.
Cowey, Major R. H.
Dolbey, Lieut. R. B.
Ensor, Major H., D.S.O.
Fielding, Major T. E.
Foster, Major R. L. V.
Goodwin, Major T. H. J. C., D.S.O.
Grech, Major J.
Harsine, Lieut. C. (Special Reserve).
Helm, Lieut. C.
Hinge, Major H. A.
Hopkins, Lieut. H. L. (Civil Surgeon, since deceased).
Howells, Lieut. W. M.
Huggan, Lieut. J. L. (killed).
Kempthorne, Capt. G. A.
Lathbury, Capt. E. B.
Leckie, Capt. M.
Lewis, Capt. S. E.
Lloyd, Major O. W.
McEntire, Capt. J. T.
Mitchell, Lieut.-Col. A.
Morgan, Lieut.-Col. J. C.
Murphy, Capt. J. F. (Special Reserve).
O'Brien-Butler, Capt. C. P. (attached 5th Lancers).
Oubridge, Capt. A. C.
Treeston, Lieut. R. A.
Proehl, Major C. W.
Kanen, Capt. H. S.
Sampson, Capt. F. C.
Shields, Lieut. H. J. S.
Stewart, Capt. H.
Ware, Capt. G. W. W.
Wylie, Lieut. (Civil Surgeon).

The following non-commissioned officers and men of the R.A.M.C. have also received the honour of being mentioned in despatches: —
Amsden, No. 16902, Sergt. H.
Anderson, No. 10434, Sergt. -Major H. J.
Bennett, No. 6630, Lance-Corp. T.
Blair, No. 17843, Staff-Sergt. A. C.
Burstall, No. 2310, Lance-Corp.
Chatting, No. 2226, Corp. F. J.
Coad, No. 16396, Corp. R. H.
Coggin, No. 11441, Sergt.-Major T. E.
Coffey, No. 11780, Lance-Corp.
Cuffley, No. 4168, Private.
Fann, No. 11874, Private H. W.
Gardiner, No. 13960, Staff-Sergt. J.
Goodwin, No. 6617, Private R. A.
Hasler, No. 16699, Sergt.-Major A. T.
Jonas, No. 12953, Lance-Corp.
Leech, No. 18722, Private.
Leveget, No. 17096, Corp. G. W., Army Service Corps (attached).
Lockwood, No. 17416, Sergt. J. W.
Loft, No. 10466, Sergt.-Major C. R.
Mears, No. 8522, Private R.
Nicholas, No. 12487, Sergt. E.
Noble, No. 16103, Private H. G.
Pettit, No. 10236, Corp. F. F.
Plume, No. 17421, Corp. B.
Prince, No. 1505, Sergt. H. M.
Raver, No. 11224, Staff-Sergt. A. T.
Rideout, No. 16680, Driver D., Army Service Corps (attached).
Spence, No. 11020, Staff-Sergt. A.
Steel, No. 15768, Quartermaster-Sergt. E.
Stevens, No. 128, Private G.
Sworn, No. 7477, Private R. V.
Turner, No. 300, Private.
Walder, No. 8268, Quartermaster-Sergt. G. B.
Wass, No. 18180, Lance-Corp.

Medical Attendance upon Dependents of Soldiers and Sailors.

In our issue of September 23rd (p. 321) we referred to the organisation of a scheme for the provision of free medical attendance and medicine to dependants of men serving with the Colours. The arrangements have now been made by the Special Committee (including representatives of the British Medical Association and the Pharmaceutical Society of Great Britain, together with the Duke of Devonshire (chairman), which has issued a memorandum explaining the methods of working of the scheme which, we understand, has met with the approval of medical men and chemists throughout the country. Upon being satisfied that an applicant is dependent upon a man serving with the Forces, the Local Representative Committee, or the Local Branch of the Soldiers' and Sailors' Families Association, as the case may be, will issue a Medical Book, with a specimen of which we have been favoured, which will be accepted as evidence of bonâ fides by medical practitioners and chemists who have offered their services, and must be produced an applicant medical attendance or medicine is required. The prescriptions for medicine or medical appliances are written in by the medical man in duplicate, after the fashion of the National Insurance forms, one of which is retained by him and the other handed to the patient who takes it to the nearest available chemist. The Medical Book is to be kept for one month from the date of issue, and it may be renewed for a further period. Lists of medical men and chemists who are cooperating in the scheme are being prepared by the Local Representative Committees and will be available for inspection in convenient places which are to be indicated in the Medical Book. Applications for copies of the memorandum or for further supplies of Medical Books should be made to The Joint Secretaries, Naval and Military Dependents (Medical Treatment) Committee, Wellington House, Buckingham Gate, S.W.

The Medical Profession and Gratis Teaching.

It is regarded as a platitude at present that whatever bills are to be paid that of the doctor is left to his own discretion. The patient shows no hesitation in coming to the doctor after being cured to say that owing to the expense of nurses, of extra fires, of extra washing, owing to the amount of work lost by the illness, he really cannot afford to pay the doctor’s bill at present. The latter, in the fullness of his sympathy, refrains from the obvious retort “why pay for all the lesser things and not be ashamed to be indebted to the chief factor in your recovery?” The same principle is being put into action in regard to First-Aid Lectures during the present crisis. Medical men along with the community in general are offering themselves and their money for the common good, but they are once more being imposed upon. Their services are asked for as instructors in First-Aid, without reward or price. In Ireland these classes obtain a grant under certain conditions from the Department of Agriculture and Technical Instruction; the committees forming the classes are often composed of wealthy people, and the pupils themselves are many of them well-to-do. Some feel that the medical man is paid—else he be not too diffident—more often he is not. We, therefore, welcome the pronouncement of the Irish Medical Association that “The Irish Medical Association consider that it is contrary to the dignity and interests of the profession for
medical men to give ambulance and First-Aid Lec-
tures without reasonable remuneration, especially
as committees forming such classes can obtain a
grant from the Department of Agriculture and
Technical Instruction.” It would be a good thing
if our charitable ladies and philanthropic gentle-
men were to remember that giving lectures is not
analogous to knitting socks, nor is the time spent
in teaching the principles of surgery to igno-
ostics comparable to the labour involved in writing
to the daily papers.

Dead Tired.
A CORRESPONDENT of the New York American,
who is also a medical man, recently pointed out
some interesting facts he observed in the Brussels
hospitals before that city fell into the hands of the
Germans. It was in the days when Belgium was
putting up her greatest fight against the invader
and each man’s output of military energy was
working at its maximum efficiency. The two
things that most surprised him more than any
other were the number of cases which, as we have
already stated, the majority of Belgian wounded
were shot through the legs, and that a great many men were in
hospital who were not wounded at all. The first
observation was found to be the result of deliberate
intention on the part of the Germans, who were
instructed to fire low, probably with the idea that a
soldier who has lost both legs is often a dangerous
hour de combat. The second point, the
amount of unwounded sick, was due to men who fell
out through acute physical exhaustion. Three
months ago we were fond of talking about our
strenuous lives and our hashing age, and so forth,
and, in fact, cases of chronic exhaustion or over-
work were very common; but now, scarcely one
rarely sees the man who works till he drops.
Our ordered lives and the edicts of the trade unions
did away with that. But in Belgium these men
were working and fighting for two tremendous
days with hardly a respite—they went on literally
till they dropped. Their condition was interesting,
but alarming. They were semi-conscious or un-
conscious, and seemed almost dead. They were
nape, limb and cold, and the lamp of their life
burnt very dim. Under treatment recovery is
the
rule, and it is not protracted. In a few days men
laid out in this way are quite well again and longing
to go back to duty once more. War is an un-
speakable trial. It is one of those things that is an
unusual way of life. As I have said, the physical
will to live is a thing that is in a land of
beauty which has been transformed into a grim battlefield of courage and efficiency.

Sodium and Potassium.

AMONGST all the salts that find their way into
prescriptions those of sodium and potassium are
the commonest. And the potash compounds are
in more general use than those of sodium. The
carbonate, iodide and bromide of potassium occur
with unvarying frequency, while the corresponding
salts of sodium are comparatively neglected. Why
this should be we do not know. It could be
explained that Sodium and potassium salts are prescribed not for
the bases but for the effect obtained from the con-
tained radicles—bromide, iodide and so forth, and
any effect obtained from the one may be equally
well got from the other. Now, owing to the war,
there is a shortage of potassium, while the supply
of sodium is unlimited. We must remember, then,
that for every therapeutic purpose the customary
potassium salt can be replaced by the corresponding
sodium compound. Indeed, the sodium salt is
preferable. The potassium ion has some depress-
ing action on nerves and heart, while the sodium
ion is absolutely inert. The doses, too, are almost
identical for each pair of compounds, and
either could be substituted for the other without
any inconvenience. We should have used sodium
long ago, because it is better. Now we must use
it because we shall hardly be able to get the other.
Necessity will make us do what we should have
done long ago for other ends. It is often the way
that we slip into a groove without first making sure
that it is the best groove, and once in nothing but
a catalyst or a rise in price will make us budge.
Now we have both our minds are open to new
ideas and our pockets to increased expense. We
can soothe them at the same time if we remember
while prescribing that though K is a good dog, Na
is a better.

Fighting the Tsetse Flies.
The war against the tsetse fly is one of exter-
mination, and step by step science is
improving her methods of attack, witness the
recently-published evidence of the Select
Committee. Opinion is not generally agreed as
to the desirability of fencing in large tracts
of country and destroying the game therein,
though it is a well-established fact that there
is a close relation between the tsetse fly and the
infected fly. Several witnesses were in favour of
attacking the fly itself. The Glossina palpalis is
a slow breeder, in marked contrast with the common
house fly, which is a most prolific creature. Ex-
periments have been made on the Island of Prince
by making a certain number of natives wear black
clothes smeared on the back of which, in a way
that was very efficient, 95,000 flies, or over 500 a day, were caught during
the last six months of 1912. There certainly seems
good ground for conducting the experiment on
an extensive scale. Unfortunately this particular plan
appears to be less satisfactory when tried against
the Glossina morsitans of German East Africa, but
it is possible that modifications of method might
produce better results. It has been also suggested
that large numbers of fly-boys should be engaged at
a small rate of payment depending on results.
The question of immunity has yet to be worked
out. Certain animals—cattle, sheep and goats—
appear to have become trouble-free, they being
infected with trypanosomes infected with
infecting fly. Several witnesses were in favour of
the local tsetse flies. A not unpromising field of
"treatment by serum or vaccines may be opened up
in that direction.

The Dangers of the Drug Habit.

A HIGHLY necessary warning as to the dangers
incurred through the habit of promiscuous drug
taking was uttered by Dr. Robert Armstrong-Jones
in the last issue of the Medical Journal of
Irish. The causes, or as it is now more
fashionable to say, the contributory factors or
adjuvants, of the vice secret drug taking are
many and varied. Present-day observations go
to show that since the war began there has been a
marked increase in the number of cases of in-
feriority amongst young men, and in the
feeling of distress and partly to the fact that more money has
been available for this purpose. The general love
of pleasure and the natural desire to drown
the cares and anxieties of the present crisis are also, no
doubt, largely responsible for the growth of the
habit. It cannot be denied either that the great
ease with which narcotic and stimulating drugs are
obtainable and the growing practice of flying to
these "helps" for every trivial disorder without
medical advice are likewise characteristic of the
present age. The casual self-prescriber of morphine or cocaine never dreams that his one act of self-indulgence may ultimately cost him his mental independence and even his sanity, and yet the records of medical men and of the coroners' courts show only too plainly how such is the case. The downward path is pursued with an altogether unexpected swiftness, while the destructive effect upon the morale of the victim is complete. Unfortunately the habit has not infrequently been directly acquired as the result of a medical prescription, and, what is worse still, medical men, dentists and nurses who are commonly handling these drugs occasionally become habituees themselves. The best brain workers among the community, including the most cultured and artistic, also figure largely among the victims. As Dr. Armstrong-Jones pointed out, further restrictions of the sale of dangerous drugs is urgently needed in the interests of the public, and when the present crisis has passed it is to be hoped that the attention of the Privy Council may be directed to this important matter.

The Prevention of Post-Operative Discomfort.
For a surgical operation to find acceptance with the patient and his friends it must not only fulfil the purpose for which it was undertaken, but it should also cause the minimum amount of pain and inconvenience in the course of the after-treatment. It may be urged that this is largely dependent upon the skill shown by the nurse in charge of the case, and medical men will be the first to acknowledge the importance of this factor. At the same time there are many ways in which the surgeon himself, both prior to the operation and also at his subsequent visits to the patient, may be the means of preventing much discomfort, if not actual suffering. These were outlined the other day by Mr. Aslett Baldwin, F.R.C.S., in his presidential address delivered before the West London Medico-Chirurgical Society and published in the West London Medical Journal. The most important method of preventing discomfort after an operation is the abolition, as far as possible, of shock. This can be carried out by the systematic blocking of nervous impulses by local infiltration-anesthesia, after the manner devised and elaborated by Crile, whose principles of anoci-association are now well known to the medical profession. The preparation of the wound, once a truly formidable proceeding, is now reduced to the simplest proportions, a preliminary painting with iodine being frequently all that is necessary. Thirst after abdominal operations may be prevented by filling the abdomen with warm normal saline solution. Dressings are fixed with collodion at a short distance from the wound, instead of over the wound itself. A far greater latitude of posture and bandaging of parts may also be permitted as compared with the practice adopted by surgeons fifteen or twenty years ago. In fact, it is the attention to small details that ensures a pleasant convalescence from any operation and renders the life of the patient as agreeable as possible under the circumstances.

Vitamines.
One of the most interesting applications of the "new physiology" to medicine and the cure of disease is the recognition of the fact that something more than a calculated quantity of protein, fat and carbohydrate, in addition to salts and water, is needed to preserve that perfect balance of nutrition which is characteristic of sound health. To Casimir Funk belongs the honor of having described those mysterious bodies, known as vitamins, the absence of which from an apparently ideal diet is provocative of disease. The so-called "deficiency diseases," which include beri-beri, scurvy, pellagra, and rickets, can, in the light of modern research, be traced to the absence of an essential material from the diet. In the case of beri-beri the results of experiments upon pigeons show that the birds develop polyneuritis when fed upon polished rice and recover rapidly when given the mysterious "something," or vitamin, extracted from rice bran. Dr. H. W. Bywaters, in discussing the matter in Science Progress, points out that the anti-beri-beri vitamin is also present in milk, oats, wheat, barley, maize and beans, in cabbage and other vegetables, as well as in ordinary white bread and ox brain. Chemically speaking, this vitamin is believed to be a mixture or a combination of three substances, one of which is probably allantoin. The vitamin which prevents the onset of scurvy is distinct from that which inhibits beri-beri, being less stable. Experiments upon rats by Hopkins, Osborne and Mendel suggest that an essential growth vitamin is essential for the perfect development of the young organism. Another vitamin seems to be concerned with the pathological growth of tissue, as in cancer, so that the question is raised by Funk as to whether it may not be possible to inhibit this new growth by the exclusion of the special vitamin from the diet. Evidently the fringe of an important subject in animal metabolism has been merely touched, and doubtless fresh revelations will be forthcoming that may prove of some practical value in therapeutics.

PERSONAL.

PROF. WALTER G. SMITH, M.D., F.R.C.P.I., has been elected President of the Royal Academy of Medicine in Ireland for the ensuing year.

DR. ROBERT P. DAWSON, J.P., has been selected as the new Sheriff of Newcastle-on-Tyne for the ensuing year.

MISS IDA CLARE TENGELY, M.D.Lond., has been appointed a School Medical Inspector to the Essex Education Committee.

Mr. Sydney Stephenson, D.O., has been appointed Master of the Oxford Ophthalmological Congress, Vice Mr. R. W. Doyne, nominated as Past-Master.

The following have been appointed Consulting Physicians with the Expeditionary Force—Sir John Rose Bradford, Sir Wilmot Herringham, and Sir Aubrooth Wright.

A PORTRAIT-BUST in bronze relief of the late Dr. E. F. Trevlyn, formerly Physician to the Leeds General Infirmary, who died in December, 1911, was presented to the institution the other day and was placed in the entrance hall.

Mr. T. Ascroft Ellwood, M.R.C.S., L.R.C.P., D.P.H., F.I.C., will deliver a lecture on "The Influence of the War on Medicine and Pharmacy" on Wednesday, October 25th, at 8.30, at St. Bride's Institute, Bride Lane, Ludgate Circus, E.C.

SIR ARTHUR SLOGGETT has not retired on sick leave, as erroneously reported in some quarters, but has gone abroad to co-ordinate the work of the voluntary and the military hospitals in France, a task for which his distinguished service in South Africa renders him peculiarly fitted. His post as Director-General of the Army Medical Service has been duplicated by the reappointment of Sir Alfred Keogh, K.C.B., who held the post from 1904 to 1909.
CLINICAL LECTURE

ON

THE RECOGNITION OF HÆMIC INFECTIONS OF THE URINE:
ITS CLINICAL AND EXPERIMENTAL VALUE.

By EDWARD C. HORT, F.R.C.P.Edin.,
Late Assistant Physician, Italian Hospital in London.

It is to-day generally believed, and rightly believed, that the occurrence in man or other mammal of a fever which lasts for days or weeks is in the vast majority of cases associated with the presence of infective disease. So faithful an index, in fact, of the presence of an infective agent is fever that it is, or ought to be, an immediate signal to submit—whenever practicable—every case in which continued fever occurs to a searching bacteriological investigation, and this whether physical signs other than fever are present or not.

Until this has become a routine practice, and until local laboratories presided over by expert bacteriologists are placed at the disposal of every practitioner in the country, the welfare of the individual and of the community at large is bound to suffer.

It is, of course, true that an immense amount of most valuable work in this direction is already being carried out, but it is also true that there is unlimited room for extension.

Unfortunately, one of the most serious obstacles in the way of routine bacteriological investigations of this nature is, apart from financial difficulties, the technical complexity of the subject, even in the hands of acknowledged experts. And this is particularly the case when the blood has to be examined either culturally or by immediate microscopy. And to this must be added the inconstancy of the results obtained even in the case of unquestionable infections, and the length of time required before a complete report can be given.

In the case of blood examinations, it is indeed a familiar experience that, except in grave septicemic conditions, and often even then, negative results are frequently obtained when the clinical symptoms make it practically certain that pathogenic organisms, whether as primary or secondary invaders, are circulating in the blood stream. This applies not only to diseases in which the causal organisms are known and are capable of identification, but it applies also to that large group of infections, such as measles, mumps, typhus fever, and the like, in which countless examinations of the blood in various parts of the world have so far failed to unmask with certainty the causal organisms concerned.

Examination of the blood for the presence of pathogenic organisms which can be cultivated in the laboratory is often, in fact, most disappointing, as is universally admitted, and as I can personally testify to. There are many reasons for this, but one of the chief appears to be the high bactericidal power of the blood, which prevents in all but the gravest infections (though there are many exceptions to this rule) the establishment of a blood-fast race which can be easily cultivated in the laboratory.

However this may be, I am satisfied, after study of the relative value of bacteriological examinations of the blood and urine in many hundreds of cases, that we often have in the latter an incomparably better fluid in which to look for and cultivate organisms derived from the blood stream. And this appears amongst other reasons to be largely due to the fact that the bactericidal power of the urine is relatively small. In thus drawing attention to the value of bacteriological examination of the urine, as an indicator of infections of the blood stream, I am not suggesting that it should displace examination of the blood or other body fluids. I wish only to insist that it should form an essential part of all routine examinations into the causes of infective disease whenever practicable, simply because it is an infection of the blood stream may be often missed. And in this connection I may perhaps recall the experiments I published in 1911, in collaboration with Dr. Penfield, on the relationship of microorganisms to fever, which went far to prove that continued fever is caused by the action of living organisms. Continued fever appears, in short, to be a signal that pathogenic organisms have found access to, and are therefore circulating in, the blood stream. If this be true, it is easy to understand that at any given moment the number of fever-producing organisms capable of cultivation from a sample of bactericidal blood may often be too small to allow of a growth being obtained, and yet that—assuming their ability to pass the renal barrier—the relatively non-bactericidal urine will after some hours stay in the bladder contain them in sufficiently large numbers to permit of successful cultivation in the laboratory, or even before discharge. And that this does actually occur is often seen in the bacteriurias of certain hämic infections in which blood cultures cannot be obtained.

That in severe infections primary and secondary infective agents can often be found in, or cultivated from, the urine, even in the absence of demonstrable infective lesions of the genito-urinary tract, is to-day a well attested fact. In the course, for example, of such grave diseases as miliary tuberculosis, typhoid fever, plague, ulcerative endocarditis, Malta fever and erysipelas, bacteriological study of the urine has repeatedly shown that the pathogenic organisms found or cultivated can only have come from the blood stream.

The earliest clinical observers to establish the principle of hämic infection of the urine appear to have been Kämmerberg in relapsing fever in 1880, Philipowicz in tuberculosis, erysipelas, and ulcerative endocarditis in 1885; Neumann, Karlinski and Koujajeff in typhoid fever in 1888, 1890, and 1899 respectively; the absolute identity of the B. typhosus in the urine being reserved for Horton-Smith-Hartley in 1897.

Among the earliest experimentalists to demon-
The two diseases I have selected are lobar pneumonia and typhus fever; the first because it is a type of infection in which the causes organisms are in many cases known, the second because it is a type of disease in which the infective agent has not yet been discovered.

In attempting to investigate haemorrhagic infections of the urine in any disease, it is, of course, necessary to exclude, as far as possible, contamination of this fluid with extraneous organisms, pathogenic and non-pathogenic, from the genital-urinary tract, from the genital, surfaces, from the air through which the urine is passed or collected, from irrigation or sterilised receiving vessels. This is by no means an easy matter. The urine has been obliged to carry out a large number of control observations which are now in the Press, but are too numerous to detail here. It is, however, necessary to refer to one or two general points.

For example, in the male subject, provided that there is no infective disease of the tract, including the bladder and urethra, the presence of large numbers of micro-organisms in the fresh urine is strong presumptive evidence of haemorrhagic infection. In the female the same course of the urine itself does, at any rate, always make it probable that the genital surfaces, including the vestibule have been thoroughly cleansed, and that the receiving flasks are clean and sterile. In the female, even when the urine is carefully collected with a catheter after an efficient preliminary toilet, and even when no disease of the tract is present, the existence of a marked bacteriuria gives no certain indication per se as to whether a haemorrhagic infection is present or not, though in these cases the assumption of lympathic infection of the bladder urine is easier to make than it would be when there is no bacteriuria. There is, in short, as Thiele and Embleton have shown, no evidence that infection of this kind does occur apart from actual trauma.

In all our work, therefore, we have, whenever possible, preferred to examine male specimens only.

In cases of marked continued fever it is often, we find, a mistake, if the urine is clear on passage, immediately to inoculate artificial media with samples of the urine itself or their centrifuged deposits. This particularly applies when the material is of solid media. If, for example, tubes containing nutrient agar are inoculated with small volumes of uninculated urine, or the centrifuged deposits of even considerable volumes of fresh urine, it frequently happens that haemorrhagic infection is missed. This is often due to the small number of organisms present which may easily be passed over when inverting the invisible centrifuged deposit. And in the case of inoculation of solid media with the urine itself, perhaps what usually happens that multiplication will take place in the urine, but that the agar remains unaffected unless precaution be taken to flush its surface repeatedly during incubation. In other cases, however, it sometimes happens that an organism will fail to adapt itself to a new environment, whilst it will multiply with great readiness in the urine itself if this be incubated. In all cases, therefore, in which the urine does not contain organisms in sufficient numbers to be readily recognised by the microscope immediately after discharge, as well as in cases in which large numbers are present, the use of the urine itself as the medium of growth will frequently reveal an unsuspected haemorrhagic infection. We have repeatedly found by this method, which I devised some eighteen months
ago, that in many diseases the causal organisms are present in enormous numbers after a few hours' incubation of this fluid. When once firmly established on the urine they will often, though not invariably, multiply with readiness on the ordinary artificial media, where they can be readily identified in the ordinary way. As a result of this observation I have often found that specimens of urine, rich in blood-derived organisms, can be easily obtained by allowing incubation to take place within the bladder. If, for example, a specimen be taken during the day the urine on discharge may be perfectly clear, and yet if the specimen be obtained after several hours' incubation in the bladder it is frequently turbid from the presence of the organism responsible for the fever. After 48 hours' incubation of urine it frequently happens that the organisms present undergo rapid autolysis. As a rule, therefore, incubation is not allowed to proceed for more than 12 to 24 hours.

In a series of 20 cases of lobar pneumonia of the acute type which we studied in the early spring, we found that the urine when collected was often perfectly clear. In other cases it showed varying degrees of turbidity, and in the centrifuged deposits of the fresh turbid specimens we never failed to find organisms which proved to be either capsulated pneumococci either alone, or in combination with the Gram-negative pneumobacilli of Friedlander, or the B. influenza of Pfeiffer. In the clear urines, on the other hand, in which prolonged search was necessary to show the presence of organisms, and then not always with success, incubulation of the urine for a few hours in no case failed to give us positive results. A marked tendency to the characteristic chain formation in the case of the pneumococcus was usually manifest, and the identity of the organisms mentioned was submitted to the usual laboratory tests in the ordinary way.

The identification tests for the pneumococcus are notoriously unsatisfactory, especially as regards serological and sugar reactions. We have been obliged, therefore, mainly to rely on capsulation and its fugitive nature on laboratory media, the pathogenicity of the organism on injection into mice, its recovery from mouse blood in a capsulated form, and its equivocal behaviour on inulin.

In several private cases of chronic bronchopneumonia we have also been able to demonstrate in, and cultivate from, the urine during the pyrexial period capsulated pneumococci either alone or in combination with Pfeiffer's influenza bacilli, and in these cases were also able to recover the same organisms from the blood stream and from the sputum, and to identify them after cultivation on the ordinary media. It should be noted that the pneumococcus loses its capsular urine and few hours, but again acquires it when subcultivated on blood or on serum, or in the living mouse. The bacterial deposits from our cases of lobar pneumonia were tested in many instances for virulence by injection into mice. In no case did the deposit from the incubated urine when injected directly into mice produce any apparent harmful effect if incubation was allowed for a few hours only. Yet the same organisms when injected after subcultivation in broth or on agar for one night did once fail to produce death in from 6 to 24 hours, the organisms being subsequently recovered in large numbers from the heart's blood, sometimes immediately after death. This we found also to be true if the injected dose of the subcultivated organisms was many times smaller than that of the organisms taken direct from the urine. It appears, in fact, if the urine organisms had become avirulent through a form of sensitisation which had been imposed upon them either during their passage through the blood stream in the case of fresh deposits, or in the urine itself after incubation. We therefore applied ourselves to a study of these as vaccines with most encouraging results, which will be recorded in due course, using as our medium of growth either the urine itself, or healthy human blood. In the meanwhile we wish to point out, as I showed in 1911, that organisms are profoundly modified in their antigenic behaviour if they are grown on artificial media after their recovery from the body. They are, in fact, in many cases no longer autogenous. And this has been well brought out by Rowland in the case of plague in rats. If, therefore, these observations are well founded, and our vaccine work in pneumonia and other diseases seem to show that they are, it is possible that vaccines made from organisms grown on artificial media will have to give place to vaccines made from organisms grown on the natural media of the body, to which serum is only an approximation. And there is, we find, some reason to believe that this also applies to bacterial antigen that is employed for purposes of diagnosis.

Finally, we wish to point out that the floral pictures presented by the urine in our cases of lobar pneumonia suggest that pneumococcal antigens are not the only requirements in the specific diagnosis and treatment of this disease, inasmuch as the pneumobacilli frequently appeared in the fresh urine in enormous numbers, suggesting that it was by no means an unimportant factor in its haemic infection.

(To be concluded in our next.)

NOTE.—A Clinical Lecture by a well-known teacher appears in each number of this Journal. The lecture for next week will be by Edward C. Hart, F.R.C.P. Edin., Late Assistant Physician Italian Hospital, &c. Subject: The Recognition of Haemic Infections of the Urine: Its Clinical and Experimental Value.—Con.

THE TREATMENT OF CERTAIN INJURIES AND DISEASES BY BIER'S (ARTERIAL) HYPEREMIC METHOD.

BY ARTHUR HEYS, M.B., C.M.Ed., Barnley.

A few words of explanation are necessary to explain the title of this paper. The words "arterial hyperemia" have been used in contradistinction to the "obstructive" or "venous," the former being produced by means of hot air, the latter by the elastic bandage or some similar appliance. Let me give a brief résumé of the principles of Bier's treatment. To employ artificial hyperemia means to increase the quantity of blood in and its diseased portion of the body, thereby hoping to obtain beneficial results. The task of the blood is to circulate through all the different tissues of the body and to maintain therein the different physiological functions.

The blood not only accomplishes this under
normal conditions, but tries to adapt itself to abnormal states. As soon as the body is invaded by disease or disturbing external influences, the circulatory conditions become changed. To explain further, a burn may be cited as an example. A hot iron is brought close to the surface of the body. Immediately the skin turns red. This reddening of the skin, according to Bier, represents the body’s attempt at protecting the injured part, the accelerated blood-current furnishing increased nutrition in the hour of need. With the cause persisting, the redness becomes more and more pronounced, while the arterial blood is being pressed through the production of pain, bring the danger to the notice of the brain. A large accumulation of serum, in the form of a blister, developing between the layers of the skin, is furnished by the blood as a further protection against the injurious effects of the heat. Analogous work is done by the blood-current in the cases of infectious invasion, where bacterial toxins take the place of the hot iron, as shown, e.g., in the inflammatory redness and edema of a boil, whitlow, or a skin ulcer. The same fight for the system against the foe is taking place. The spontaneous disappearance of the inflammation means the victory of the blood-current against the bacteria. Therefore, again, according to Professor Bier, an inflammation in itself ought not to be regarded as a disease, but rather as an attempt of the body to resist the attentions of an invading foe. To increase this inflammatory hyperemia, resulting from the fight of the living body against the invader, is the aim of Bier’s hyperemic treatment. There are several methods by means of which hyperemia may be produced: (1) by means of an elastic band; (2) by cupping glasses; (3) by means of hot air. I have had a fairly large experience of the last method, the results of which I should like to bring to your notice. Any part of the body brought near to a source emitting strong heat becomes bright red or hyperemic. The hyperemia, however, produced by this method is different from that caused by obstruction. The latter causes what Bier calls a “venous” hyperemia, the former represents an arterial one. Heat for the production of hyperemia has been employed as long as the art of healing has existed. It has been used in the shape of poultices, fomentations, sun-baths, sand-baths, mud-baths, and at the present time we find their sequel in electric-light baths and Turkish baths, etc. The increased supply of arterial blood to any part of the body favours the absorption of chronic oedemas, exudation, and adhesions. These chronic conditions, by the rule, however, source of more acute troubles are particularly favoured by hot-air hyperemia. This for a start is a fairly large field for operation. When one considers the number of cases of standing arthritis, for example, whether rheumatic, traumatic, or gouty, which are very often difficult to heat by the ordinary methods, one need not be very long before finding suitable cases for hot-air treatment. Again, the second class of cases that can be treated advantageously by hot-air hyperemia are neuralgias of all varieties. If, as a witty Frenchman has remarked, neuralgia be the “cry of a starved nerve for more blood,” there can be no better means of supplying its need than by subjecting it to hot-air treatment. Dry hot air permits the use of very high temperature, without injury or pain to the part to which it is applied. I have often seen the temperature register 250° Fahr., the patient himself feeling the reverse of uncomfortable—indeed, often inclined to go asleep. For practical application in surgery, hot-air ovens or chambers are used and the hot-air douche. The Holborn Surgical Instrument Company of London put up a very useful type, the funnel of which is interchangeably and the heat generated by means of a bunsen burner. They are not expensive, and after a little experience most men will say that it has been money well spent. There are several adaptations of the latter which can be arranged to suit the needs of the operator. The first is, that there must be no pain, or even annoyance, from the heat. The second, a rule I have found to work well, is: the more acute the ailment that is being treated, the lower should be the temperature for a commencement, 180° Fahr. I usually use for a first sitting. Another rule to remember is, that as the temperature of the chambers is highest in the top parts, always use an asbestos toe-cap for protecting the toes in the treatment of the lower limbs. Again, it is important to remember to turn on the gas and light it before placing it near a closed chamber, or the results might be disastrous to the patient.

Let me mention a few surgical applications where Bier’s method is useful.

The powerful effects of the hot-air bath can be made good use of in bringing exudations of blood and serum to rapid absorption.

It was whilst treating a great many football injuries, more particularly cases of blood and fluid filling the various synovial sacs, where rapid absorption was necessary in order to get the player back quickly into the team, that I found that hot-air treatment could do in almost half the time what would be done by older methods of treatment. Thus in contused limbs, traumatic synovitis due to sprains, and other causes, one gets excellent results. Let me give one example. Macaren, the Burnley player, was brought to me on Monday the 22nd December, 1913, complaining of great pain on putting the foot down. The front of the leg was swollen, tender to touch, and shiny. He had been kicked the Saturday previous in a match, and had had two restless nights. He had the hot-air treatment on the 22nd, 23rd, and 24th. He played on Saturday the 27th at Huddersfield, and was transferred from Burnley to Huddersfield the same day for a record fee.

Another type of injury which I have often had to treat, and which is at times very troublesome, is the stiff joint and oedema of hand or foot which often follows a Colles’ or Pott’s fracture—perhaps due to faulty technique, but there all the same. By subjecting to a fairly high temperature for a week or two the oedema as a rule disappears quickly, the adhesions soften and can often be broken down without the aid of chloroform. Even if the latter be necessary, there is no necessity for exudation at the horizontal force more particularly if the hot-air treatment be continued immediately after. One often meets in practice, too, obscure joint pains, where nothing abnormal may be detected, but which are there when the patient comes down heavily, say, with one foot. Perhaps “joint neuralgias” would do for want of a better term. I have these several times seen disappear after
two or three hot-air applications—and the cures have been permanent.

One often has great difficulty in successfully treating fractures involving the elbow joint. There is always great risk of stiffness and even ankylosis. By doing the hot-air treatment after a week or ten days, fixing the limb alternately in the fully flexed and fairly extended positions, and later perhaps by weighting the arm at night, allowing the weight to hang over the bed, I have had results which have been, I feel sure, better than would have been otherwise the case.

Varicose veins—more particularly those cases where the smaller veins are involved, and where ulceration has not taken place—benefit by hot-air treatment. The oedema usually present yields to the increased circulation, and the other methods of treatment, such as rest, etc., are greatly helped. Even in cases of bad ulceration the base of the ulcer cleans more rapidly and cicatisation is hastened. Care must be taken in the latter case not to use a great heat for fear of burning (160° is high enough), and to see that there are no signs of a recently formed thrombus. If the latter, hot-air is contraindicated. But it is principally in cases of subacute and chronic rheumatism that I have had particularly good results with Bier's method. True, the exact cause of same is still a question of great dispute. The fact remains that in many cases hot air has a powerful influence in causing the exudates to be absorbed. Many times have I been able to get rid of a case of rheumatism which has resisted the usual methods and has seemed to be drifting rapidly into the chronic stage. These cases demand time and confidence on the part of the patient, and patience and perseverance on the part of the doctor. Mention has already been made of the neuralgia. By using the hot-air douche (half an hour at a time) many cases of simple neuralgia can be made to yield. In sciatica, where no extraneous causes could be discovered, such as pelvic pressure, rheumatoid arthritis of the hip, etc., I have had varied results. Many have yielded after a few applications, many have gone on apparently no better.

Occasionally surprising results I have had in the treatment of chronic eczema.

In conclusion, let me add that in Bier's hot-air treatment we have a most powerful and efficient remedy. His theory that by increasing the volume of the blood alone, Nature's remedy, a cure can be often effected, is sometimes somewhat difficult to believe, but is nearly always borne out in actual practice.

Let me here acknowledge my indebtedness to Drs. Meyer and Schmieder for many little helps in the actual working of the apparatus, and for hints from their book in drawing up this paper.

THE PRESENT POSITION OF CEREBRAL SURGERY. (a)

By WILLIAM THORBURN, F.R.C.S.Eng.

Professor of Clinical Surgery in the University of Manchester, Surgeon to the Manchester Infirmary.

It is not my intention to discuss with you to-night the entire field of cerebral surgery, nor do I propose to occupy your time with a mere recital of cases, however interesting, but I shall, in response to the request of your retiring Presi-

dent, try to lay before you a slight general account of what seem to me to be present prospects of surgery in relation to one or two classes of cerebral disease. And I do so particularly for two reasons; on the one hand I have perhaps had more experience of this branch of work than have most of you, and on the other the present moment is, as I shall indicate directly, a peculiarly favourable one for taking stock of our general position. In so doing I shall altogether ignore the more well-worn topics—I shall say nothing of the treatment of head injuries nor of that of the inflammatory affections of the brain, and I shall practically confine myself to the consideration of two main diseases—epilepsy and cerebral tumours. I select these because, although we are all familiar with many published cases—some of them being very brilliant successes—few of us have access to records of any considerable number of cases, and probably few, if any, of you know what may reasonably be hoped for in dealing with them. Operations are still regarded as largely in the experimental stage, and it is only right that we should now attempt to arrive at some general conclusions as to final results and statistical probabilities.

With this object in view I have endeavoured to trace the results of my own work, and before going further I should like to thank my late house surgeon, Mr. Stewart, and my present house surgeon, Mr. Willis, for the great assistance they have given me and for the trouble they have taken in tracing out patients. With their aid, I have collected all the cases of epilepsy and cerebral tumours operated upon by myself from the beginning of the year 1900 to September, 1913, and what I have to say to-night is based upon these cases, and does not refer to any subsequent operations. I only regret that our hospital records are so bad that it is impossible for me to enter into much detail, even did I desire to do so.

EPILEPSY.

We have in surgical literature an almost complete absence of definite information as to the late results of operation for this condition, and in no branch of surgery is it more necessary to ascertain such end-results before we are justified in regarding an operation as curative. It is now perfectly well known that almost any operation may produce a temporary arrest of epilepsy, even apart from the possibility of suggestion. Some twenty years ago, Mackren of Edinburgh recorded many examples of such arrest, and I have personally seen many cases in which epilepsy has been temporarily kept in abeyance after such surgical procedures as amputations and operations for the radical cure of hernia or even after severe burns, which are not uncommon in the epileptic. Hence has arisen much confusion and false deduction, and we have at times had the most various operations vaunted as curative. We must, therefore, first be very certain that when a direct attack upon the possible foci of the disease appears to have cured it, we are not misled by a mere lull in the symptoms and that we have really done more than has been done in the past by ophthalmotomy, ligation of the carotid arteries, or excision of the cervical sympathetic, each of which have in turn had their day as apparent remedies. The only statistical records of which I am aware

(a) An address delivered before the Manchester Medical Society, 1914.
are those of Cushing and of Batte Rawling. Cushing operated upon 38 cases of traumatic epilepsy, and obtained 12 recoveries (20.7 per cent.), and 30 (52 per cent.) which showed more or less improvement, but the longest records were for periods of five years and some had only been traced for twelve months, so that the evidence is inconclusive as to late results. Rawling refers to 20 cases, all of which were also traumatic in origin, and has obtained the following results:

**Cured** . . . . . 2, or 10 per cent.
Markedly improved . . . . 14, or 70 per cent.
Not improved . . . . . 4, or 20 per cent.

But in his cases the duration is not stated, and again we are without reliable information upon the important question of possible recurrence.

 Personally, I have in the last 13 years performed 39 operations for various types of epilepsy other than those connected with such gross lesions as tumors and abscesses, and the results are arranged in the following table:

**Table I.**

<table>
<thead>
<tr>
<th>Total cases—39. Died, 1; Untraced, 14; Traced to date, 24.</th>
<th>Over two years, 19; Under two years, 5.</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Result</strong></td>
<td>in cases of over two years' duration.</td>
</tr>
<tr>
<td><strong>Cured</strong></td>
<td>. . . . . 5 (12, 11, 3, 3, 2).</td>
</tr>
<tr>
<td><strong>Greatly improved</strong></td>
<td>. . . . 6 (14, 11, 7, 4, 4, 4).</td>
</tr>
<tr>
<td><strong>Improved</strong></td>
<td>. . . . 2 (8, 6).</td>
</tr>
<tr>
<td><strong>Not improved</strong></td>
<td>. . . . 6 (10, 3, 2, 2, 1, and suicide).</td>
</tr>
</tbody>
</table>

In considering this table I should like to refer first to the death. I have no recollection of the case, which was operated upon some 12 years ago, and no notes beyond the simple record that a man, aged 48, died on the 6th day after operation, but I am now emphasizing it because it illustrates the very low mortality which attends a modern operation upon the cranium and cerebral meninges, and I think we may now safely say that exposure of the cortex cerebi is, and ought to be, at least as safe as laparotomy. Even that when in a few minutes we shall have to deal with very high death rates, these are certainly not due to defects in the technique of the operation, but arise either from the serious nature of the disease or from manipulations in the depth of the brain.

Omitting this fatal case, we have 38 other cases to consider. Of these, 14 have not been traced to date and are of no value to us for the purposes of the present investigation, as the information that a patient has left the hospital "cured" or "recovered" proves nothing. Thus, then, there remain 24 cases in which alone we have perfectly definite information up to September last.

Of the 24 "traced" cases I propose to ignore five in which the operation has been performed within the last two years: of these five, one reports himself as cured, two as greatly improved, one as improved, and one as not improved, but I regard the period as altogether too short, and shall now consider only the 19 which remain and in which operation has been performed more than two years ago.

Of these 19 cases we find, then, that five are quite cured, six are greatly improved, two are only described as improved, and six have derived no benefit. In this table I have given in brackets the number of years which have now elapsed since the operation, including among those not improved one who committed suicide twelve months afterwards on the probable ground that he did so in despair.

If we take this table at its face value we should be able to say that the results are on the whole very good, as, in round numbers, one-fourth are completely cured and another fourth are very greatly improved, but I can hardly hold out quite such good hopes, as I suspect, although I do not know, that among the 14 untraced cases we might find a smaller proportion of cures. On the other hand, we certainly cannot be exaggerating the case if we say that of the total of 39 operations at least one-eighth have been complete successes and at least another eighth are so much improved that the sufferers themselves regard the result as a success. Briefly, then, in over a quarter (28 per cent.) we have had good results, and I must confess that these figures are more hopeful than I had anticipated when I commenced this investigation.

We have now to consider in what type of case we may hope for such improvement and what kind and nature of operation is likely to produce it. The cases have only been partially selected; that is to say, I have not throughout the last thirteen years always imposed upon myself the same restrictions as I now do, and a good many have been cases of idiopathic epilepsy, some of them with very ill-defined local symptoms. At the present time I never advise operation for such cases, but in my earlier work this was not an invariable rule. It is, however, not always easy to be absolutely certain whether a case of epilepsy is or is not of traumatic origin, and inasmuch as I believe that this disease more almost than of any other the patient and his friends are prone to search for and discover a history of injury. Epilepsy is also a condition in which we are often strongly urged to operate even against our better judgment, and as long as there is the faintest hope of discovering any lesion it is difficult to resist such solicitation. Hence our cases include those which are definitely traumatic and focal, a small group of those which are certainly idiopathic and in which the operation might be regarded as purely exploratory, and a third group in which the nature was doubtful.

It is almost entirely, if not entirely, in the first group that good results have been obtained, and I have never seen any benefit from operation for idiopathic epilepsy. Hence, I should in future absolutely limit operation to traumatic cases with a definite cranial lesion or focal symptoms, in which connection we may note that the figures given above from Cushing and Rawling relate solely to traumatic cases.

As regards the nature of the operation there has naturally in every case been some decompres- sion: this is an essential result of merely opening the skull; how far it is per se beneficial I do not know, but, if there be any truth in the view that the epileptic seizure is due to mere variations in intracranial tension, it may have an important effect. Further, I have always removed at least some bone and, with one or two exceptions, I have not in those cases adopted methods of craniotomy.

In some of the cases—I can only recall three or four—bony spicule have been discovered projecting from the inner table, and in two of them a cystic cavity surrounded the spicule, separating it from the meninges. Such pieces of bone are naturally always removed, but it is not to be supposed that they will often be found. Far more
commun is an osteitis, causing dense hardness or some thickening of the skull at the point operated upon, but how far such a condition is associated with the epilepsy I do not know. Cysts, generally between the bone and the dura, are also occasionally found and have of course been evacuated.

Far more commonly we find only adhesions either of the dura to the skull or of the cortex to the dura, and such adhesions have always been carefully separated; in the earlier cases gold foil was then inserted, but in the last few years I have used Cargile's membrane for the purpose of preventing fresh adhesions. I am, however, rather doubtful whether the absorbable membrane is quite efficacious for this purpose; unfortunately I cannot give you definite information upon this point.

When the cerebral cortex has presented definite and visible areas of degeneration these have been removed, but I have never resorted to the method of excising segments of cortex on the basis of neurological symptoms alone. There is, however, no doubt that much of the cortical surface may safely be removed, as in the case of a young man shot through the left side of the skull during the Boer war, who had previously been operated upon at both the apertures of entrance and of exit of the bullet, but whose presented a steadily increasing epilepsy with partial hemiplegia. Here the left cortex was fully exposed, by turning down the side of the skull, adhesions were separated, a blackened streak of cortex about four inches long and an inch wide was scraped away and the side of the cranium replaced. This operation was performed twelve years ago; there has been no return of epilepsy, and the paralysis has cleared up to such an extent that he is quite able to work and is earning his living.

Lastly, and before leaving the question of epilepsy, I would refer to the condition of the patient after operation. In no case has there been any trouble with the cranial defect, and I have never had to advise the use of any form of artificial covering. In one case of operation on the motor area there has followed a paralysis of the opposite hand. With this exception all the cases traced are in good general health, and the cured and "much improved" cases are all able to earn their living.

Tumours.

When we come to the consideration of prognosis after operation for cerebral tumours, we find that until very recently no extensive material has been available for judgment. A number of interesting cases have been published and some brilliant results have been recorded, but the general average, and the number of such cases have not hitherto been made known. During the last few months there have, however, appeared some valuable data. Attention was focused upon this question by the discussion of two sections of the recent International Congress of Medicine, and Howard Tooth brought before the Congress an invaluable analysis of over 250 operations performed at the National Hospital for the Paralysed and Epileptic, operations which include largely the work of Victor Horsley and therefore represent the high-water mark of this branch of British surgery. Still more recently, v. Eiselsberg has published an analysis of 168 cases operated upon in his clinic at Vienna, and thus we are now able for the first time to obtain some statistical data. My personal experience is naturally far less than that of these large clinics and amounts to only 57 cases, but I am venturing to add them to the totals as they represent work done under conditions far less favourable than those of a special hospital such as that of Queen Square.

We are thus provided from these sources with a total of 490 operations, upon which we can form some estimate of the possibilities of success. When, however, we attempt to deduce statistical results we are met by great difficulties. It is clearly impossible to state at the outset what proportion of cases die from operation or to distinguish operation mortality from disease mortality. Many of the operations have been undertaken in desperate conditions, and in such we find high death rates which in no way reflect upon the surgical treatment. All therefore that we can hope to do is to ascertain if possible how many cases are saved, and then to take one further step and try to ascertain how many of those saved have survived for so long a period that they can fairly be regarded as cured. In order to avoid details which would necessitate a recital of each individual case, I have prepared the following rough table of results:

<table>
<thead>
<tr>
<th>Total</th>
<th>490</th>
<th>186</th>
<th>139</th>
<th>116</th>
<th>49</th>
</tr>
</thead>
<tbody>
<tr>
<td>Died</td>
<td>52</td>
<td>28</td>
<td>23</td>
<td>27</td>
<td>100</td>
</tr>
<tr>
<td>Alive</td>
<td>438</td>
<td>158</td>
<td>116</td>
<td>89</td>
<td>39</td>
</tr>
</tbody>
</table>

Figures in italics represent percentages.

In such a table, which is admittedly only an approximate expression of the facts, we may then assume that, roughly speaking operation was of little or no value, or may have hastened the end in the 37.9 per cent. cases of the first column, while it has probably saved or greatly prolonged life in the 23.6 cases of the second column, its value being doubtful in the 38.3 cases of columns two and four, although doubtless in many of these decompression gave relief. If it is difficult to deduce from these figures any accurate estimate of risks and of prognosis, it would be still more difficult, even if it were necessary, to compare the results of different clinics, but it is interesting to note, that save in respect of one detail, these are so closely comparable as to strengthen the general probabilities of their accuracy. The only notable difference is that v. Eiselsberg records a higher early death rate than obtains in the British hospitals, while his ultimate "recovery" rate is also exceptionally high; possibly this may indicate a bolder policy on the part of the Vienna surgeon with a greater risk but a better ultimate result.

Omitting, however, all speculation upon minor points, we find, broadly, that somewhat less than 25 per cent. of all cases may be regarded as cured, or at least as enabled to survive a highly fatal disease for a long period. Such a figure is perhaps not encouraging, but can we reasonably expect
more? We must remember that the great majority of cerebral tumours are malignant. Many are sarcomatous or gliomatous. Some are tuberculous, which, like malignant growths, tend to recur and which are not rarely multiple. Innocent fibromata, endometrioma and cysts are comparatively rare. Now it is inconceivable that we should ever be able to deal with such growths in the radical way in which we can deal with malignant disease of, let us say, the breast and uterus, or even of the intestines and stomach. If in the case of tumours of the breast we had to limit our operation to a local excision, would many more than 25 per cent. survive for a year or two? And thus we are driven to the position that excision of cerebral tumours with the hope of radical cure must always be exceptional.

Accepting this premise we have also to consider that, as we have seen in the case of operations for epilepsy, the mere exposure of the cerebral cortex is almost free from risk, whereas our table shows only too clearly that deep operations upon the brain substance itself become very fatal. The dangers of "exploring" the cortex are at least as great when the growth is not found, and, as a matter of fact, extensive and futile incisions, which have been made under such conditions are more dangerous than the excision of a growth. Hence, then, we are almost driven to the position that, with our present resources, cerebral surgery has to aim not so much at the cure of malignant disease as at the prolongation of life, the provision of reasonable comfort, the prevention of blindness, and especially perhaps of the intense headache which accompanies so many cases. In other words, the primary object must be decompression, and anything further that may be done must be left to the opportunities of the moment in a few favourable cases. If we know where the tumour lies we must open the skull over it, and if we then find a removable growth such as an endothelioma of the meninges we may remove it either at once or after a second operation, but deep explorations must be abandoned and it will be rarely only that we shall find tumours of the cortex itself amenable to excision.

Such an a priori view is, however, apparently contradicted by carrying our statistical examination a step further than we have hitherto done. I have divided my own cases into two groups—those in which the tumour was removed and those in which it was not removed either because it was not localised beforehand, or not found on exploration, or because removal was regarded as impracticable. That is to say, we have cases of removal and cases of decompression with or without exploration, and on comparing these we obtain the following results:—

**Table III.**

<table>
<thead>
<tr>
<th>Treatment</th>
<th>Died Later</th>
<th>Total</th>
<th>Died in but within</th>
<th>Not</th>
<th>Removal</th>
<th>Decompression &amp; exploration</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Died in</td>
<td></td>
<td>8 months, 3 years.</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>Living. Traced.</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Removal</td>
<td>12</td>
<td>4</td>
<td>3</td>
<td>5</td>
<td>0</td>
<td>*</td>
</tr>
<tr>
<td>Decompression &amp;</td>
<td>*</td>
<td>*</td>
<td>*</td>
<td>*</td>
<td>*</td>
<td>*</td>
</tr>
<tr>
<td>exploration</td>
<td>45</td>
<td>20</td>
<td>11</td>
<td>5</td>
<td>9</td>
<td></td>
</tr>
</tbody>
</table>

**Figures in italics represent percentages.**

These cases are too few to yield percentages of value, but Howard Tooth's series, although somewhat what differently arranged, gives analogous results, and we are at once struck by the fact that the mortality is higher and the survival rate is lower in the case of decompression. This arises, however, from the following reasons. "Decompression" includes all cases in which there is no localisation, all cases of basal and deeply-seated tumours and all operations undertaken in patients who are already so ill that no more serious proceeding can be contemplated. Hence we find a higher death-rate at a second or a less serious operation. As regards survival, on the other hand, it does not aim at any indefinite prolongation of life; where the tumour is left to grow, death is ultimately always certain—so much is this the case, that long survival after mere decompression even casts some doubt upon the diagnosis, although in certain cases such as syphiloma, tubercle and some glioma, decompression alone may be followed by retrogression and recovery. Hence no fair statistical comparison is possible, and if we limit the expression "decompression" to decomposition pure and simple, without further exploration or vain attempts at removal, we have clearly an operation which, as regards its intrinsic risks, is comparable with operation for epilepsy, and has a mortality little if any higher than that of exploratory laparotomy.

Hence, also, we need have no hesitation in advising early decompression in every case of cerebral tumour. It is useless to wait until the patient is already blind, and the first onset of pressure symptoms should be the signal for this relief. If the operation for such relief exposes an accessible tumour so much the better, but we must not wait for its localisation. And if this be done we shall save much suffering and prolong many lives, at the cost of a surgical intervention which is almost trivial.

**THE INCIDENCE OF DIPHTHERIA IN RELATION TO DEFECTIVE DRAINAGE.**

By A. L. DYEKS, M.D.Edin., D.P.H.Lond., Assistant Medical Officer of Health of Oldham.

Before the discovery of its specific germ diphtheria was regarded as being largely dependent on insanitary conditions and fifth nuisances. As knowledge of the bacteriology of the disease has, however, become more accurate this relationship has been less emphasised. Nevertheless, there are some who continue to hold the view that defective drainage is an important factor in the spread of diphtheria, and many of the modern textbooks on hygiene contain some reference to the point. It is still the custom for public health authorities to make a close examination of the drains where diphtheria has occurred, and this has doubtless brought to light many defects which might otherwise have escaped detection. Thus the public acceptance of the view that gas from drains may cause diphtheria has been indirectly useful in improving sanitation.

Typhoid fever is essentially a disease related to defective drainage. While the introduction of more modern methods of sewage-removal has resulted in a reduced incidence of typhoid fever, that of diphtheria has not been affected, and, indeed, in many towns has definitely increased. Further, diphtheria does not appear to pick out towns where drainage nuisances are specially prevalent.

It must be remembered that diphtheria is not a disease of very high infectivity. The post-
The inspections were taken independently of infectious disease or complaints of nuisances, and it will be noted that the percentage which revealed drainage defects is much the same as where diphtheria had occurred.

From these statistics it would appear that in Oldham the relation of defective drainage to diphtheria is of an important one.

My thanks are due to Dr. Wilkinson, Medical Officer of Health of Oldham, not only for kindly allowing me to undertake this investigation, but also for placing all necessary records at my disposal.

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**CLINICAL NOTES.**

**CASE OF SUB-PREPUTIAL FOREIGN BODY.**

By CHAS. HUGHES FOLEY, Dispensary District Medical Officer and M.O.H. to Lavall, Peterswell and Ardahan.

On October 14, 1914, a man J. came to me at my dispensary, complaining of a hard, painful nodule just behind the glans. The prepuce was tight and was hard to retract, but when I did retract it, one came a grain of oats. In the bed it had lain in there was a slight spread of infection. The patient is an old man over 65, who has lost one eye and is partially blind in the other. How the grain of oats got there is a mystery. He informed me that he had not been threshing corn for upwards of eighteen months past.

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**OPERATING THEATRES.**

ST. THOMAS’S HOSPITAL.

A CASE OF ABNORMAL INVOLUTION OF THE BREAST.

—Mr. Corner said that the case upon which he was about to operate was an example of a condition which is very common, and being so needs to have a label of identification attached to it, so that it may be referred to definitely and succinctly, being at last recognised as a clinical entity. It is a condition of breast found in a woman over 35 years of age, or at some time after the birth of her last child. The breast is partially involuting. Occasionally the disease is seen in virgins—apparently involutions of the breast from prolonged inactivity. The breast is hard to the feel and presents with itself a hard lump which possesses none of the usual characters of pathological character, dimpling, retraction, etc. by which we are taught to recognise the presence of malignancy. The mass is commonly painful and tender, which characters never allow the patient to forget its presence for long. What is to be done? Non-operative treatment we know unusually cures the case even if the diagnosis is correct. So as honest men doctors can unusually descend to utilise it. In this place we cannot consider the pathological and unguent matter which minister more to the patient’s mind than to her body. Local excision of the inflammatory mass is unsatisfactory because of the subsequent appearances of other and similar lumps. Nothing less than the entire removal, and subsequent microscopic examination, of the breast will give satisfaction. The removal of the breast excites repugnance in, and at times refusal from, the patient to whom it is recommended. It requires a large amount of courage on the part of the surgeon to have this unassisted removal of the gland does not rob her of the appearance of a well-developed woman, whilst it removes her from the danger of copulating with the bad company of a lump in an involving breast, the loss of a side of the physiological value but of great danger, and allows of an opportunity of a microscopic examination being made to correct errors of diagnosis. Through such practice the knowledge has come to us that it is impossible to attain certainty in the diagnosis of the presence of malignant disease in a series of...
breast tumours. True, a good man is right in the majority of cases, but he learns in no too gentle school to beware of intracycic growth, intraglandular tumours, growths close to the skin, and in the upper and outer quadrant of the breast, and other less common clinical conditions. In fact, he learns that it is safer to leave alone no lump in a breast undergoing involution, particularly if it is painless. Mr. Corner then showed a patient on whom the operation recommended had been carried out five years before. Before the operation the breast had been removed there was a deposit of fat in its situation, so that the ‘breast’ on that side was smaller than the other. Mr. Corner said that such a result as this patient showed was too good to be true. Unfortunately, the deposition of fat in the place of the removed breast was interfered with by the skin over it becoming adherent to the pectoral muscle. The retaining of the nipple added considerably to the satisfaction of the patient and to the deposit of fat giving the appearance of the presence of a breast. Mr. Corner said that he had never, except once or twice, been called to do a similar operation on the breast of the other side, the deposit appearing less. In fact, this improvement in the pathological condition of the other side was so sure as to make its prophecy quite a reasonable thing.

The patient being anaesthetised, an incision was made round the lower and outer side of the breast, laterally and medially from the sternum well up to the axilla. Skin and fat were cut through. The operator now began to reflect the skin covering the breast: In doing this it was desirable, he said, to leave on the skin a fat as thick as could be without losing the lymphatic supply to the skin. Whenever the skin was cleaned of the fat it sloughed, leaving behind a great unsightly wound. It was no simple matter to dissect the skin and fat off the breast, particularly under the areola where the skin limit of the skin is tight. It would be noticed that as this reflection of the skin is done, the flap is held up with two artery forceps; it is not bent backward towards the chest. This is done by the operator. He was found that when skin was brought backward it was more easily “button-holed” than when it was held upward. After the reflection had exposed the upper and inner margin of the breast, the gland was seized with vulsellum forceps drawn outward and the bearing surface of the great pectoral muscle, below and internal to the breast, exposed. It was now possible to remove the gland with only a few touches of the knife, except by the axilla. This “tearing” was without any hemorrhage. Towards the axilla the glandular tissue of the breast often extends as a “tail,” and its complete removal requires care.

The next few minutes were spent in ligaturing every vessels, a vein and label by which the presence of the formation of a haematoma after the operation. Finally the skin was united by interrupted sutures of ten-day catgut, which were prevented from pressing on the skin and from marking it by glass beads. Each skin suture was where the attachment that the skin edges are turned out. Formerly, Mr. Corner said, it had been his habit to drain these wounds for 24 hours. But he had seen that this perfect drainage is entirely led to a good rapid healing in the anterior surface of the great pectoral muscle. He now put his skin sutures a little “too far” apart so as to let some of the post-operative serum drain away between them. In this way a layer of between the skin and the muscle, making for a more natural appearance of the breast. In consequence every patient should have the wound dressed 24 hours after the operation, to facilitate which proceeding it was usual to have first dress in position with an inky tail bandage, the tails coming over the shoulder. As the stitches are of ten-day catgut the patient is not put to the anticipation or pain of their removal.

It was desirable, he thought, to give all clinical entities a name and label by which the particular condition is known, its treatment, pathology, prognosis and diagnosis rendered clear. The best name for the clinical picture described here is “abnormal involution of the breast.”
Mr. Malcolm discussed the condition sometimes arising after an abdominal section in which the surgically affected parts have not moved, recovery will follow, but if the bowels will not move the patient will die. The symptoms were usually attributed to a paralysis or a paresis of the intestine and, this, in turn, was commonly believed to be due to a septic peritonitis. Mr. Malcolm expressed the opinion that in many of these cases the cause of trouble was not a septic peritonitis, but that the symptoms were due in part to a uselessness of peristaltic force, in part to some more or less definite obstruction of the bowels. He thought that this condition might be correctly described as one of acute intestinal stasis. He recalled the fact that when opium was given in full doses after every abdominal section most of the cases did well, but if no gases escaped from the anus the patient always died not later than the fifth day, and a slight spreading peritonitis was found after death. If in one of these cases a second operation was performed in the hope of finding an obstruction early on the fourth day or sooner, but when the symptoms were well developed, there was never any sign of opening peritonitis as in a typical case. Moreover, sometimes, if no second operation was undertaken, a patient immensely distended and apparently moribund would, without apparent cause, begin to pass gases from the rectum and all the symptoms would disappear completely and quickly resolved. It was argued that the peritonitis found after death, when death occurred, could not be the cause of the symptoms and that it was a consequence of the mode of death. The effect of modern treatment by substituting strong laxatives and liberal bowel and rational feeding for continuous administration of opium and starvation was pointed out and records of cases were given in support of these views.

In three cases patients seemed certain to die from complete distension respectively on the 9th, 10th, and 5th days after an abdominal section. A Paul's tube was therefore inserted into the small intestine in two cases and into the cecum in the third and immediate relief of all symptoms followed. In the first case the patient died sixteen months after the operation. In the second case the fistula was closed by operation and recovery was complete. In these three cases the bowel below the fistula resumed its functions without further surgical treatment.

In subsequent cases the fistula was closed by the second operation and the patient died. There was no post-mortem examination but there was a focus of infection from which peritonitis might have started. The writer assisted at two other operations for the resection of the five days after the primary operation and these proved fatal, one being certainly a case of septic peritonitis. In both these cases attempts to release adhesions were made.

In Mr. Malcolm's fourth case there was intense pain over the site of a colon-ostomy and general distension on the third day after the operation when complete relief was given by inserting a Paul's tube into the cecum. The fistula closed spontaneously when an ileosigmoidostomy was performed sixteen days later. In another cases the fistula was closed by operation and this cure of an operation—a cure in the ileum, once in the cecum—to keep the lower bowel quiet, with good results, the fistula being closed later by operation.

The importance of not making a fistula unnecessarily was insisted upon but the fact that this treatment would occasionally give a little relief which would otherwise be lost was shown by the records given.

The making of a fistula for the relief of distension was not likely to be successful in a case of septic peritonitis. If an early diagnosis could be made in a strong case, and if, after the primary adhesions might give the most satisfactory results, but after the third day if the patient was weak and if there were many adhesions an extensive operation would almost certainly prove fatal, whereas a simple formation of a fistula might bring about a cure.

The paper was discussed by Dr. Tate, Dr. Briggs, Dr. H. R. Roberts, Dr. Giles and Mrs. Scharlein.
medical corps. Over 60 men in the medical unit form the Field Ambulance of the Scottish Horse. About 100 have joined the Territories, while Edinburgh's new battalion and the Scottish Horse have also received their quota. Many men have joined Kitchener's new army, and one hears of men, rejected time and again for some defect, persevering until at the fourth or fifth time of asking they were accepted by the recruiting officer. The Indian students are talking of forming a medical unit for service with the Indian Army. Owing to the depletion of the staff of the Infirmary through absence of some of its members on active service, and the temporary terminations as assistant surgeons have been made: —R. C. Alexander, F.R.C.S.E., W. W. Carlow, F.R.C.S.E., J. M. Graham, F.R.C.S.E., F. L. Jardine, F.R.C.S.E., and W. R. Wood, M.D.

In most of the art classes, which opened on October 14th, the war formed the theme of the introductory lecture. Professor Sett, in the moral philosophy class, lectured on its ethical aspects, Prof. Pringle Pattison on "Nietzsche and the War," Prof. Mackinnon on its causes and the issues involved, and Professor Lodge on Britain's help in European dangers. A special graduation ceremonial took place this week, at which a number of students who had successfully passed the graduation examinations, bequeathed funds to the medical faculty to which a large proportion of the new graduates will at once go on active service.

The Medical-Chirurgical Society of Edinburgh will not meet regularly this winter, although it is hoped to have one or more clinical meetings as occasion may arise. After full consideration it was thought that in the circumstances of the time there would be much difficulty in securing either an adequate attendance of members or papers suitable for discussion.

Scottish Red Cross.

The Scottish Section of the Red Cross Field Hospital, to which Mr. Strathern (Edinburgh) is attached as Surgeon, has gone to Paris, instead of to Rouen, as was originally intended, and it is reported that in all probability it will shortly move to some locality nearer the front.

South Queensferry Emergency Hospital.

The hospital which was presented by an anonymous donor to the Admiralty at the outbreak of the war, and for which a site near Rosyth was selected, has now, after about 24 months' work, been completed. The building, which consists of a main central block 160 yards long, together with wards radiating from it, is situated at Bultlaw, S. Queensferry, near the existing Royal Naval Hospital. The operating theatre is thoroughly up to date in every respect, and there is a fully equipped X-ray department. The hospital must have been designed to have patients from the London Hospital, but it is understood that other arrangements are being made.

Dalmeny House, Lord Rosebery's principal Scottish residence, has been given over by its owner for conversion into a hospital, and the necessary alterations have been carried out. It is situated on the south bank of the Forth, between Edinburgh and Queensferry. It was Lord Rosebery who, at Mr. Asquith's request, went to France and personally described the price the nation would have to pay in this war as "a price upon the renewal of the lease" of the British Empire. His lordship has set a good example in paying his share of the fine.

GLASGOW.

Wounded in the Royal Infirmary.

The wounded arriving in Glasgow have now overflowed into the voluntary hospitals. The two military hospitals at Stobhill have received men, in various detachments, to the number of 700, but now the Glasgow Royal Infirmary has received 100. Of these there were 40 cases necessitating removal by ambulance waggons from the station upon the arrival of the train from Southampton. The other patients were accommodated in motor cars for removal to the Infirmary. Among the wounded were three private patients of the Royal Army Medical Corps.

The late Dr. Harry S. Ranken.

The late Captain Harry Sherwood Ranken, R.A.M.C., was wounded on September 19th, in the fighting near the River Aisne, and died in a base hospital in the north-east of France on September 29th. Captain Ranken was the eldest son of the late Henry Ranken, M.A., of Victoria Cross by the Colonel commanding the regiment to which he was attached. Captain Ranken was the elder son of the parish minister of Irvine, Ayrshire, and graduated at Glasgow University in 1905.

Tragic Death of Dr. J. D. Noble.

The body of Sir John W. D. Noble, who died on September 25th in a mangled condition, was found on the 24th inst. at the bottom of a cliff at Rubislaw Quarries, Aberdeen. He had evidently fallen from a height of about 100 feet. No one saw the accident, but Dr. Noble was observed walking in the vicinity of the quarries some time before the body was dressed in deceased's uniform as a Captain of the Royal Army Medical Corps, Territorial Force. Dr. Noble was a native of Mid-Lothian, and graduated in medicine at Edinburgh in 1891. He came to Aberdeen some years ago, acquiring the practice of the late Dr. McCombie. On the mobilisation of the Territorial Force Dr. Noble was unable to proceed with the troops to Redford, as he had become a victim to fainting fits. He refused to go to hospital, and the announcement of his tragic death was received with painful surprise among the local members of the profession.

At Stobhill Hospital, Glasgow.

The latest batch of wounded soldiers received at this hospital numbers 100. There is a larger proportion of medical cases than usual. The men had passed through British hospitals at St. Lazaire, Paris, and elsewhere in France, and were consequently in better condition than some of the previous contingents from the front.

Home Hospitals' Reserve.

The Earl of Dalkeith, who presided at the annual meeting of St. Andrew's Ambulance Association, held in Glasgow, said that since 1908 the Association had, at the request of the War Office, maintained a body of trained volunteers from the St. Andrew's Ambulance Corps, called the Home Hospitals' Reserve, its duty being to take over, in time of national emergency, the 12 military hospitals in Scotland and replace the regular R.A.M.C. personnel. On the outbreak of the war officers in the reserve received in 24 hours a letter saying that the reserve to be embodied, the instructions being that the non-commissioned officers and men were to proceed to their stations and there to be medically examined and enlisted for six months or the duration of the war. The necessary orders were issued to the sections of the corps, and within 48 hours officers, non-commissioned officers and men reported themselves at the various stations and took charge of the military hospitals, thus setting free the regular R.A.M.C. for duty with the Expeditionary force. The smoothness with which this mobilisation was carried out reflected great credit on the officers, non-commissioned officers and men concerned.

Pressure on Medical Profession.

The pressure which the war is putting on the profession is exemplified at Glasgow Royal Infirmary. A number of the qualified young men who had arranged to take up duty as house physicians or house surgeons have joined the navy or army. In consequence of this, the managers are asking for application for these posts either from qualified men or from those who are going up for their final examination.

BELFAST.

Royal Victoria Hospital.

The session was opened on Friday, 10th inst. There was a large attendance of members of the visiting staff and residents. The president, Dr. A. W. Elmes, M.D., in the chair, and the introductory address was given by Dr. Victor Fielden, who chose, as his subject, "Suggestion." After welcoming the students on behalf of the staff and advising them to be guided in their course of study by the registrars, he dealt with the...
therapeutic power of suggestion upon both the conscious and the subconscious mind of patients, quoting the views of Mr. S. McQuitty, who stated by him that such a wide field for research might be engaged in by some of those who were entering upon the study of medicine.

McQUITTY MEMORIAL SCHOLARSHIP.

There was a large entry for this scholarship held at the end of the year. The successful candidate was given the sum of £30, and is awarded to students in their last year for proficiency in practical clinical work.

LETTERS TO THE EDITOR.

[We do not hold ourselves responsible for the opinions expressed by our Correspondents.]

ARTHRECTOMY OF THE ANKLE.

To the Editor of The Medical Press and Circular.

Sir,—Not to prove that there is nothing new under the sun, but just to emphasise the importance of Mr. Edward C. P. Corr's remarks that appeared in the MEDICAL PRESS and CIRCULAR of September 15, 1879, on "Arthrectomy of the Ankle," I venture to recall the brief particulars of a case of my own, which was first published in the Lancet on May 24th, 1879. It formed part of a clinical lecture delivered by me to the students of Queen's College, Cork. At that date the final result of the operation had not been secured, but I subsequently referred to the case in my brochure, "Clinical and Surgical Essays." This included some observations on the elbow, knee and ankle joints.

The patient, a young girl, was admitted to the Hospital for Women and Children in September, 1877. The left ankle-joint was swollen, with the typical, soft, doughy, and feel originally described by Brodie in the case of the knee. The entire joint and the ends of the malleoli were affected. The constant dull, gnawing pain had impaired the girl's health, for she had been several years under treatment, and suffered from headache, convulsions, any examination of the joint bringing on an attack. She was treated in hospital for some time, and after a short absence returned in order to have the joint excised, or the limb amputated, as it was a question if amputation would not be the best course to take. However, in March, 1878, the whole joint then being greatly swollen, with a sinus opening at the outer side, I performed the following operation:—

I made an incision on the outside of the joint I removed the ends of the malleoli and all the tarsal bones. As the metatarsals appeared sound they were not interfered with. I saved all the sound periosteum that could be saved, and no vessel was ligatured or tied. The operation was antiseptically performed, at that time, under carbolic spray, and the cavity that was left washed out with a solution of the same. After the first fixings, with plaster of Paris and felt, various splints of different kinds were used, including Sayer's ankle splint. A sinus remained which had not closed when I published the case in 1879. Otherwise the progress was most satisfactory, and Mr. Edmund Owen showed the case for me at the surgical section in the Cork meeting of the British Medical Association in August of that year. Consolidation, with new bone deposit, converting the tarsal area into a solid mass, covered this place, and fair movement, with the partial formation of a false joint followed. There was complete control over the toes, and in 1880, when I showed the case at the local branch of the British Medical Association, the girl walked well. In 1882, when I was lecturing there was no residuum of lameness.

Years afterwards I had inquiries made as to her subsequent history, when I learnt that she was quite well and in service in America. A drawing from a photograph of the lower limbs is shown in the brochure referred to.

About the same time, from a young man of 29, I removed the greater part of the os calcis, the astragalus and the cuboid bone, with just as good a result. Before 1881 I had removed the os calcis five times, and in a few instances the entire or portions of the other tarsal bones, the most important essential being to leave no suspicious portion or shell of bone. I had a case of tarsal ulceration which remained a matter of discussion for some years, and one of which I have found most useful in many other surgical procedures. It has a strong, short blade, blunt at the end, which is curved and not pointed. I look back on those days of aseptic surgery when, in 1876, I performed my first complete antiseptic operation under carbolic spray, and can reflect on the great advances since made up to our present day thorough aseptic technique. The joint operations introverted, and in 1876 I was not bold enough to do any. I have, with all hope of a successful result were it not for the closest adherence to Listerian principles. And in no branch of surgery is the strictest asepsis more necessary than in the various artrectomies of the joints.

I am, Sir, yours truly,
MACNAUGHTON-JONES, M.D., M.Ch., F.R.C.S.I and Ed.
111 Harley Street,
London, W.

ALLYL SULPHIDE IN THE TREATMENT OF TUBERCULOSIS.

To the Editor of The Medical Press and Circular.

Sir,—Your issue of the 23rd of September contains an editorial criticism of the medical treatment of tuberculosis, which embodies the method of cure by allyl sulphide, and Dr. McDuffie's striking experience in his New York clinic of this treatment.

I have been privileged to peruse a reprint from the Interstate Medical Journal containing this celebrated physician's observations in over 1,000 cases of tuberculosis treated by fifty-five different methods, including every known drug employed in the pharmacology of the disease. After enumerating in detail as many hundred treatments, he concludes with the striking statement that of this long list only two "stand out as regards anything like specific action upon the tubercle bacillus and tubercular processes"; these are garlic and mercury. After analysing the qualities of garlic and explaining the rationale of its action, he goes on to say, "Garlic gave us our best results, and would seem equally efficacious, no matter what part of the body it affected, whether skin, bones, joints, or special parts." In proceeding to criticise the action of mercury he remarks upon its accumulative property as being a drawback when compared to garlic. It will be noted that Dr. McDuffie, in his address in September, did not mentionallyl sulphide, but referred to the marvellous virtues of allyl sulphide as an arresting factor in tuberculous decay. No other drug can claim to come within sight of it in this special province, and as a healing agent it is beyond dispute upon indisputable evidence. I have myself been accustomed to employ it both in this country and South Africa for over twelve years, and have proved it to be a veritable sheet anchor in the treatment of every form of tuberculosis. As Dr. Minchin, the original exponent of the theory of "shut away fluid," may congratulate himself upon having so eminent an authority as Dr. McDuffie confirm him in his researches upon this important surgical point, for he states that operative intervention is indicated "in all cases with continued septic temperature and all cases of abscess formations, closed cavities and fistulous fluids, from which there is septic absorption." This is the point which I feel to be the place of issue of these toxin pools seated deep within the lung tissue. Their existence explains those intractable cases of disease with high temperature and rapid pulse, hectic, and night sweats, bearing a close relationship to the systemic poisoning of fulminating appendicitis, of
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which McDuie further remarks, "with all its severity and rapidity is but a thunder compared to the lightning-like attack of acute fulminating tuberculosis of the lungs." For this condition he advises operation. There is only one treatment now recognised for the condition of abnormal "shut away fluid" known as appendix abscess, and the day will likewise come when no body will be able to accept a blast of septic pulmonary infection go to his doom without attempting the surgical elimination of the cavity by incision and drainage. Mitchell's discovery of allyl sulphide renders interference possible, and place it in the hands of the thoracic surgeon a pulmonary septicist of inestimable value.

I am, Sir, yours truly,

JAMES HAMILTON.

60 Sydney Street,
Chelsea, S.W.

October 15th, 1914.

THE RADICAL OPERATION FOR HERNIA.

To the Editor of The Medical Press and Circular.

Sir,—I fear that middle-aged and elderly men, both among medical practitioners and dispensing chemists, will not go into raptures over the effort to introduce the metric system in the new Pharmacopoeia. Instead of being a boon, it will be a mercy if many be not promised through the change. What was wrong with the old system of weights and measures which has stood the test of so many years' experience? Theoretically, it may not be quite exact, but practically it is quite enough for a century and a half at present so very popular. The big lapse from simplicity was the introducing percentage solutions instead of so many grains per oz., as the older pharmacopoeias ordered. That change necessitated what you termed mathematical genius of a Newton plus a technical literature of reference that would not disgrace a Carnegie library. Why not revert to the simpler forms?

James D. L. Robertson,
Co. Down.

October 12th, 1914.

THE METRIC SYSTEM AND THE NEW "BRITISH PHARMACOPEIA."

To the Editor of The Medical Press and Circular.

Sir,—I am, Sir, yours truly,

JAMES HAMILTON.

60 Sydney Street,
Chelsea, S.W.

October 15th, 1914.

LIBERATION OF R.A.M.C. PRISONERS.

To the Editor of The Medical Press and Circular.

Sir,—In your "Current Topics," page 505, under the heading "The Exchange of Prisoners," you refer to the exchange suggestion of Mr. C. H. Grindell, of Woolwich, "that every R.A.M.C. officer or soldier taken prisoner should at once be liberated." Your annotation, however, gives the reader the impression that the humane suggestion originated with Mr. Grindell. Its birth was at Harrow's Ferry, by a United States surgeon, Hunter H. McGnire, Medical Director of the "Stonewall" Army Corps of the Confederate States Army, in the spring of 1862, when his base hospital was at Harroir's Ferry, and was acted on throughout the Civil War. His scheme for the regulation of the liberation and exchange of medical officers and medical attendants is to be found in the first volume of the Confederate States Medical and Surgical Journal. I am, Sir, yours truly,

October 14th, 1914.

GEOGEOUE FOY.

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ANTHONY TRAILL, M.D.

We regret to announce the death, after a lingering illness, of Dr. Anthony Traill, Provost of Trinity College, Dublin. Dr. Traill obtained the degrees of M.D., and M.C. in Dublin in 1870, and at a later period was elected Honorary Fellow of both the Royal College of Physicians and the Royal College of Surgeons in Ireland. It is noteworthy that in the joint line of work he represented was the only one who took out a medical degree. Dr. Traill had been associated with Trinity College for 50 years as student, professor and provost, and had almost attained his 70th birthday. He was born in County Antrim, of which county he was a grand juror and deputy lieutenant. He had a distinguished career as a student, his class-fellows including Lecky, the historian. He took great interest in the Medical School of the College, and was President of the Bicentenary celebrations two years ago. Dr. Traill received his early education at a day school in Belfast, and entered Trinity College in July, 1855, in his seventeenth year. He was a diligent student, and won a number of important academic distinctions. He was first Science Scholar in 1858, and graduated as University Student with First Moderatorship and large gold medal in mathematics, and First Senior Moderatorship and large gold medal in experimental science. In 1864 he obtained the Middlen Prize, and became a Fellow the following year.

DR. T. HOBBS CRAMPTON.

It is our sad duty to record the death of Dr. T. Hobbs Crampton, which occurred at his residence, 30 Myddelton Square, on Tuesday, the 13th inst. His illness was comparatively short, the proximate cause of his death being pyloric poisoning, which was followed by typhoidal symptoms, on which extreme weakness and fatal syncope supervened. Dr. Crampton was the son of Mr. Wm. Crampton, of Athy, Ireland, and was in his 58th year. He received his medical education at the University of Medicine, Dublin. He was a Licentiate of the Royal Colleges of Physicians and Surgeons of Ireland, and had been in active practice in London for many years. There was no more energetic member of the Irish Medical Schools and Graduates' Association than Dr. Crampton. For many years he has been on its Council, of which body he was for some time Chairman, and he has never been absent from a single gathering of the Association, whether in London or the provinces up to the last one held in Harrogate this spring. A few years back, when he retired from the office of Treasurer, he was presented with an address in recognition of the valuable services he had rendered to the Association. He was elected President of the City Branch of the British Medical Association, in the work of which he took an active part, and had only recently retired from office. When the war started he was elected Chairman of the Fund for the British Relief Fund. What recreation he took from his busy life was given to golf, of which game he was an enthusiastic follower.

At St. John's Church, Myddelton Square, Islington, where part of the service was held, the Council of the Irish Medical Schools and Graduates' Association was largely represented, and a beautiful floral altar, with "From Erin" worked in flowers on it, was sent by the Council "as a tribute of love, respect and esteem from the members." Hobbs Crampton was one of those honest, cheery and bright souls of which the world has too few. In the gatherings he frequented there will be felt a blank by all who knew him, and in the Executive of the Association he so well served his place will be hard to fill.
MEDICAL NEWS & PASS LISTS.

Royal College of Physicians of London.
The Bissett-Hawkins Memorial Medal awarded by the Royal College of Physicians of London for distinguished conduct in the advancement of scientific knowledge and public health was presented to Major Sir Ronald Ross, Professor of Tropical Sanitation at the University of Liverpool, on Monday last at the conclusion of the Harveian Oration delivered in the College by Sir Douglas Powel.

University of Oxford.
The following degrees have been conferred:—D.M.—H. J. B., Fry, Magdalen; O. A. R., Berkeley-Hill, Trinity (in absence).

Royal Sanitary Institute.

University of Edinburgh.
The following candidates have passed the special final examination for degrees in medicine and surgery. It is understood that this examination, which, in ordinary course, would have been held in December, has been postponed in order that all men who have been called to the front may have time in order to allow men to go on service at the front, and also to supply the places vacated by men who have gone to the war:—Cedric W. Aikman, John G. Anderson, Thomas H. S. Bell, Prem N. Berry, Thomas C. Britton, Edward L. G. Brodziak, William T. Buchanan, M.A., Peter W. Carruthers, Frederick C. Chandler, James S. Crichton, John Dale, M.A., Diederik J. Dauth, Joseph Dunlop, William F. Dunlop, Harry H. Gellett, David Charteris Graham, Walter W. Hallchurch, Frederick W. Hird, Sidney C. Hildeston, Maurice P. Inglis, Leslie F. E. Jeans, Lauraz Lappin, George M. Levack, John Lofts, Egbert W. Louw, Patrick T. Macdonald, M.A., William H. MacInnes, F. R. W. Mclintock, M.D., Sidney W. W. Mcleod, John A. M. Tomory, John M. Verster, Gifford T. van der Velde, John C. van der Westhuizen, Henry W. Wier, James A. Young.

Royal College of Surgeons in Ireland.
The opening meeting of the winter session, 1914-1915, was held recently in the Royal College of Surgeons, Stephen's Green, when the prizes were distributed by the President (Mr. F. Conway Dwyer), who gave a short address. The prizes were then distributed as follows:—

Winter Session, 1913 and 1914.—Systematic Anatomy—J. F. Steele, first prize (£2) and medal; M. Briscoe, second prize (£1) and certificate. Practical Anatomy—First Year—J. J. Brennan, first prize (£2) and medal; H. J. Jenkinson, second prize (£1) and certificate. Second Year—M. Briscoe, first prize (£2) and medal; G. Dunne, second prize (£1) and certificate. Practice of Medicine—D. V. O'Connor, first prize (£2) and medal; G. M. H. McKinnon, second prize (£1) and certificate. Surgery—D. V. O'Connor, first prize (£2) and medal; B. Irison, second prize (£1) and certificate. Midwifery—J. A. Musgrave, first prize (£2) and medal; H. J. Villiers, second prize (£1) and certificate. Pathology—J. J. Brennan, first prize (£2) and medal; J. A. Fretton, second prize (£1) and certificate. Physiology—M. Briscoe, first prize (£2) and medal, no award second prize. Chemistry—J. J. Brennan, first prize (£2) and medal; Miss H. G. Ray, second prize (£1) and certificate. Physics—W. E. Cooke, first prize (£2) and medal; S. H. Healy, second prize (£1) and certificate. Dental Anatomy—P. J. Sheerin, first prize (£2) and medal.

Summer Session, 1914.—Barker Anatomical Prize—Miss E. Budd, £2 5s.; J. A. F. Chapman, special. Chemistry—B. E. F. Shipley, £1; F. W. L. Mayne Scholarship—No award. Gold Medal in Operative Surgery—M. Shipsey. Silver Medal in Operative Surgery—A. Merrin. Practical Histology—T. N. Perry. Physiology—J. A. Brennan, second prize (£1) and certificate. Practical Chemistry—G. C. O'Donnell, first prize (£2) and medal; C. E. Herbert and Miss E. Gleeson (equal), second prize (£1) and certificate. Public Health—H. S. Donelan, first prize (£2) and medal; J. F. Scale, second prize (£1) and certificate. Materia Medica—J. F. Scale, first prize (£2) and medal; second prize, no award. Biology—L. M. Leventon, first prize (£2) and medal; J. J. Brennan, second prize (£1) and certificate. Surface and Topographical Anatomy—M. J. Briscoe, first prize (£2) and medal; M. M. Price, second prize (£1) and certificate.

University College, Dublin.
The Examiners have made the following recommendations:—


Conjoint Examinations in Ireland. The following candidates have passed the examination conducted by the Royal College of Physicians and the Royal College of Surgeons, October, 1914.—Preliminary Examination—Daniel D. Bulger.
MEDICAL WAR ITEMS.

A hospital, to be called the Baltic and Corn Exchange Hospital, is to be established in France, probably in the neighbourhood of Arras, under the management of Dr. Guest.

Queen Mary's Royal Naval Hospital, Southend-on-Sea, was opened last week for the reception of 200 wounded officers and men of the Belgian forces. The immediate need (apart from money, which is always necessary) is a large supply of blankets.

Sir Arthur and Lady Markham have placed their house, Beachborough, near Sevenoaks, and the staff of invalids at the disposal of the Canadian War Contingent Association, and with the approval of the War Office, it has been organised and equipped as the "Queen's Canadian Military Hospital." Sir Arthur and Lady Markham have provided the hospital with a complete X-ray apparatus. The accommodation consists of from 50 to 60 beds, all of which are now occupied by wounded from Antwerp. The medical, surgical, and nursing arrangements are under the superintendence of Dr. Parry, R.F.R., and Miss Edith MacMahon, of Toronto, is the Superintendent, and the nursing staff consists entirely of Canadian trained nurses. Lady Markham will take an active part in the general supervision.

Two sets of Red Cross post stamps of unusual interest have been issued by the Daily Mail and Evening News. One is from designs of Mr. Frank Brangwyn, A.R.A., and graphically depicts the work of the Red Cross, and the second is a series of allegorical emblems by Mr. Edmund Dulac. Each set may be obtained for sevenpence, post free.

The War Office has issued the following through the Press Bureau:—"The Director-General of the Army Medical Corps has a report at his disposal which indicates a satisfactory state of affairs. He is satisfied that the utmost vigilance is being exerted to maintain the present position. To ensure still greater security Lord Kitchener has decided to establish at the War Office a Sanitary Committee, consisting of military and civil authorities. It is asked to learn the exact state of the health and well-being of troops at home and abroad. He is also sending the Director-General, Sir Arthur Sloggett, overseas to make a thorough inspection of the medical arrangements and to co-ordinate the work of the Army Medical Services with the St. John Ambulance and Red Cross societies, of which he will be Chief Commissioner. Sir Arthur Sloggett will be accompanied by Colonel Burtchael, Royal Army Medical Corps, as staff officer. During his absence at the seat of war Sir Alfred Keogh will act as Director-General at the War Office."

The Duke of Vendôme, brother-in-law of the King of the Belgians, last week visited St. John's Hospital, Lewisham, where some Belgium and British wounded are under treatment. He afterwards paid a visit to the London Hospital, where there are 320 wounded Belgian soldiers.

The Secretary of the London Hospital, Whitechapel, E., has prepared a list of the wounded Belgians now lying there. It is thought that among them there may be relatives of refugees who have come to this country. The hospital has a small fund and can help with the travelling expenses of those who are relatives to their wounded relatives but cannot otherwise afford to do so. A large contingent of Belgian wounded have been received into St. Bartholomew's Hospital. Six of the men are at Fairfield House, St. Peter's, Broadstairs.

MEDICAL WAR NEWS.

It is reported that the number of doses of vaccine which have been supplied by the Inoculation Department of St. Mary's Hospital from the beginning of the war to the Allied Armies is 1,476,734; this means 166 gallons. These preparations have been made by the staff of the Inoculation Department under the supervision of Captain S. R. Douglas and Drs. Fleming, Mathews, Freeman and Haden.

In regard to reports of the prevalence of lockjaw among the wounded Allies, Messrs. Michelin et Cie., the well-known French manufacturers, have offered to supply gratuitously and quicker tetanus serum for use by ambulances at the front. This patriotic offer has been gratefully accepted by the British and French War Offices.

The Local Government Board has warned every Medical Officer of Health in districts where troops are quartered that the prevalence of lockjaw, and the preparation of small-pox is not unlikely, and the prevention of the spread of the disease, if it should appear, will depend almost entirely on the efficiency of the arrangements made by the local authorities and those officered by niggers, giving water, etc., to men almost dropping from fatigue, bandaging and carrying wounded. Then a mounted bugler of the Gordon Highlanders came galloping up, and I saw that he was lying with his leg broken on the road not far from us. I took two stretcher bearers and started off to him. We made use of what cover there was, and rushed across the open spaces. It became a long road. At last a wounded officer and two men were captured. There was no doctor, so, of course, I went in. The major had a ball through his leg which had smashed the bone and made one small entrance and one big exit wound. I sent my two men back. I then called the stretcher bearers and told them that I was all right, I do not want to be posted as 'missing.' There were about a dozen wounded in the chateau beside the major. When I had fixed them all up I tried to get out, but a burst of fire haled me as I came round the corner of the house. I found that it was impossible to leave, as the Germans had planted a large gun at the door. All Tuesday morning I was out with search parties looking for and burying the dead. During the afternoon the captain's work. I took the identification discs off the men's necks, their letters, money, etc., to be sent to their relatives later on. We buried the Highlanders together in the trenches they had defended so well."
NOTICES TO CORRESPONDENTS.
Dr. Correspondents requiring a reply in this column are particularly requested to make use of a Distinctive Signature or Initial, and to avoid words such as "Reader," "Subscribed," "Old Subscriber," etc. Much confusion will be spared by attention to this rule.

Gazette. — Notices to CORRESPONDENTS. All notices should be written on one side of the paper only and must be authenticated with the name and address of the writer, not necessarily for publication, but as evidence of identity.

References.—Reports of papers appearing in this Journal can be had on a regulated scale, provided authors give notice, in the letter, not to the publisher or printer before the type has been distributed. This should be done when returning proofs.

Sir Victor E. C. (letter came to hand as we were "at press." It will appear in our next.

Dr. S. T. (London, S.E.)—The name of the institution you mention is the last sanctioned by the Local Government Board under the National Insurance Act, 1911, for the treatment of persons suffering from pulmonary tuberculosis.

THE COUNTRY DOCTOR.

Dat in, day out, life goes on.

Where snow is thick and fees are thin, He busts with his cheery grin.

To fight with life.

The drives are long, the nights are cold, He suffers hardships left unnoted.

To call upon some mother old

Across the hills.

Little he says about his pay;

Often he gives his skill away.

And that he's getting lean and gray.

His life has been an endless trial,

His motto has been self-sacrifice.

Freely he gives from every vein.

For some one's health.

The colds have cleared his head,

While life and drum and bugle play

Bravely to conquer or to slay—

That is his part.

The country doctor rides alone

Through rugged roads, ever stuck and stone,

To heal men, not to make them mean;

God bless his heart.


F.R.C.S. Eng. (Brighton).—We understand that the War Office has accepted a gift of 500 gallons of acrolav, which if it is confirmed would be a distinct advantage, fifty per cent of special treated cress, for distribution amongst the military hospitals in the United Kingdom.

Dr. E. Challenger, Bracknell.—Your letter arrived too late for insertion in the present week's issue.

The Meetings of the Societies, Lectures, &c.

THURSDAY, October 22nd.

HARVIAN SOCIETY of London (Stofford Rooms, Titchfield Street, W.C., 7:15 p.m. : Exhibition of Clinical Cases.

CENTRAL MEDICAL BOARD (Board Room, Caxton House).—2 p.m. : A special (spinal) meeting.

FRIDAY, October 23rd.

ROYAL COLLEGE OF SURGEONS of ENGLAND (Lincoln's Inn Fields, W.C.1)—Museum Demonstrations for Advanced Students and Medical Practitioners. 5 p.m. : Prof. A. Keith: Specimens illustrating Gynaecological Injuries of the Uterus.

MONDAY, October 26th.

ROYAL COLLEGE OF PHYSICIANS of London (Fall Mall East).—4 p.m. : Harrold Orton: Mr. R. Doughty Powell.

MEDICAL SOCIETY of London (11, Chandos Street Cavendish Square, W.—8:30 p.m. : Discussion on "Operative Treatment of Tumour of the Cervix and Colon," especially in relation to immediate resection, colostomy combined with secondary resection and short course, to be introduced by Mr. H. J. Waring, Mr. James Sharpe, Sir R. M. Hannay, etc. There will also be an exhibition of specimens.

Vacancies.

Abbeville Union Medical Officer and Medical Officer of Health. — Salary £200 per annum, with addition of £20 a year as M.O.H. Applications to Michael Maher, Clerk of Union.

String District Asylum, Luton, N.B.—Third Assistant Medical Officer. Salary £100 per annum, with board, etc. Applications to W. W. Moore, M.D., Medical Officer Supervising the Metropolitan Ear, Nose, and Throat Hospital (R.S.) (incorporated), Fitzroy Square, London W. — Home Surgeon (non-resident). Salary £50 per annum. Applications to John Mackenzie, Secretary. (See adv.)

Cheltenham Union Medical Officer. Salary £200 per annum and £20 a year as Medical Officer of Health, with vacation fees. Immediate application to F. King, Clerk of Union. (See adv.)

Rotherham Hospital—Assistant House-Surgeon. Salary £25 per annum, with board, lodging, and washing. Applications to the Secretary, G. W. Roberts, 8, Moor gate Street, Rotherham.

Hulme Dispensary, Dale Street, Stretford Road, Manchester,—Home Surgeon, duly registered and fully equipped. Salary £20 per annum. Annual increases £5 to £20, with apartments, attendance, coal and gas. Applications, with testimonials, to one Honorary Medical Secretary. (See adv.)

Patney Hospital (Chester Bequest), Lower Common, Patney, S.W.—Resident Medical Officer. Salary £20 per annum, with rooms, board and laundry. Applications to the Hon. Secretary of the Hospital.

Great Yarmouth Hospital—House Surgeon. Salary £140 per annum, with board, lodging, and washing. Applications to the Hon. Secretary of the Hospital.

West Suffolk General Hospital, Bury St. Edmunds,—Resident Medical Officer. Salary £200 per annum, with board, lodging, and laundry. Applications to the Secretary.

Appointments.

GEORGE, J. M., F.R.C.S.Edin., Specialist in Operative Surgery at the Military Hospital, Edinburgh.

HAWKING, W. L., F.R.C.S.Edin., Assistant Physician to the Netherdash-on-the-Sea Sanatorium, Banchory.


MACDONALD, M. H., M.R.C.S., Certifying Officer to the Factory and Workshop Acts for the Lennoxs District of the county of Fife.

REYNOLDS, W. L. M.S.S.A., Medical Officer of Health to the Luton District Council.

SCHONBERG, W. M., Ch.B.Edin., Medical Officer of Health of Sittingbourne during the absence of Dr. T. B. Heggs on Territorial Service.

Deaths.

CABOT.—On October 13th, at Richmond, Surrey, the wife of Dr. Adrian Cabot, F.R.C.S., of Calecuta, of a daughter.

FELLOWS.—On October 13th, at The Metairie House, Wool, Monthly, the wife of Charles Henry Fennell, M.D., of a daughter.

GODWIN.—On October 13th, at High, St., N. E., the wife of Arnold Saxty Good, M.R.C.S., L.R.C.P., of a daughter.

MICHIE.—On October 13th, at 71 Craven Park, Harleden, the wife of Dr. G. H. Mitchell, of a daughter.

NOTON.—On October 7th, at 8, Osberton, Caxton, Essex, the wife of Lionel Dulby Neave, B.A., M.R.C.S., L.R.C.P., of a son—Nelson Dulby.

Marriages.

SMITH—HAMILTON.—On October 17th, at St. Mary Magdalen's, Morfaile (quietly, owing to the war), Hector Smith, M.D., of H.M.S. Resolute, to Ada Maud Hamilton, youngest daughter of Dr. Hamilton, Essex House, Barnes, Surrey.


Deaths.


DREYSDALE.—On October 17th, after a short illness, at 5 Rothwell Road, Hampstead Garden Suburb, of Mrs. Clara Mary, the beloved only child of Dr. and Mrs. C. V. Dreydale, aged 14 years.

HAMILTON.—On October 14th, at Jail House, Alpore, Calcutta, Louise, wife of Major W. Gavin Hamilton, M.I.S., of Calcutta, to Ada Mary, only daughter of Sheriff John and Love Macalister, M.B., C.M.Edin., aged 45.

MAC consider.—On October 16th, at 10 Cambus, Hill Court, Aberdeen, Andrew Arthur Macfarlane, Lieut.-Col., late Army Medical Staff, to Margaret, eldest daughter of Mr. and Mrs. H. Brown, 10, Church Road, Aberdeen.

PERRY.—On October 12th, at Butley, Hants, Alfred Perry, F.R.C.S., L.R.C.P., aged 70 years.

HULME DISPENSARY.

DALE STREET, STRETFORD ROAD, MANCHESTER.

WANTED, A HOUSE SURGEON duly registered and fully qualified. Salary £15 per annum. Annual increases 10/- to 20/- for extra appointments, coal, etc. Applications, with testimonials, at once to Honorary Medical Secretary.
WEDNESDAY, OCTOBER 28, 1914.

**NOTES AND COMMENTS.**

The reported occurrence of numerous deaths from tetanus among wounded soldiers at the front reminds us that this fatal complication still baffles the skill of modern medicine. The main facts of the malady are well known and it is now many years since the specific pathogenic organism was identified. The "drum stick" form of the sporulating bacillus furnishes an attractive slide under the microscope. As an earth-dwelling organism it is specially likely to affect wounds inflicted in trenches, where the men are in close contact with freshly turned soil. Nor is it easy under fire for the surgeons to secure a thorough cleansing of wounds that have been contaminated with earth. The modern treatment with antitetanic serum, from which so much was expected, has proved disappointing. Its chief value is prophylactic, and it is of little use as a curative agent unless administered at once in full dose. As tetanus has an incubation period from about five days to three weeks, it is difficult to say in what cases it would be desirable or advantageous to give a dose of serum. In the hurry of field surgery it would be out of the question to attempt its administration, even if it were confined to those suffering from wounds obviously contaminated with earth. It seems somewhat of a reproach, however, if modern surgery, as applied by our highly trained military surgeons, should not be able to find some means of excluding tetanus from the complications of wounds inflicted in action.

The question naturally arises, Could Why not give a Prophylactic to all soldiers going to the front? Serum? There is no more risk in its administration than in ordinary vaccination against small-pox, or in anti-typhoid vaccine? If the soldier is to be protected against small-pox, which after all said and done, is a somewhat remote danger at the present day, and against enteric fever, why should he not be equally protected against the far more deadly malady, tetanus? It is a sad thing to see soldiers die an agonising death from a complication that is to some degree preventable by scientific prevention. The mere scratch is practically almost as dangerous as a deep wound so far as infection by the tetanus organism is concerned. The matter of routine protection against tetanus of all troops going to the front is worthy of the serious attention of the Army Medical Department, who have shown themselves ready in other ways to avail themselves of modern scientific methods. It would probably be out of the question to attempt any such measure with the troops actually in the field, but it would be possible to protect all reserve troops at home. As a matter of fact anti-typhoid inoculation has, we believe, been applied only to that small proportion of our soldiers in France which has been despatched to the front within the past few weeks.

**German Army Medical Loses.**

The modern battle-field, with its long range fights along an enormously extended front, must necessarily involve much loss of life in the Army Medical Service which works under fire. The British casualty list has already been heavy, and there is reason to fear that it will be considerably enlarged when the results of recent encounters are announced. On the side of the Germans it has been announced with every appearance of accuracy that their staff has lost seventy-four killed, thirty-seven wounded, thirteen missing and three prisoners. This list seems to be not improbable notwithstanding the careful editing given to all official reports from German headquarters. A similar credibility, however, cannot be accorded to the statement that the Austrian Medical Corps has lost eight killed, thirty-five wounded and one missing. Considering the vast number of soldiers engaged and the huge losses in fighting of both Russians and Serbs their medical casualty list must have been far greater, unless, indeed, it was a grossly undermanned branch of their army organisation. The German Medical Service was organised on as lavish and consummate scale of machinery as any other department of her military machinery. As the result of prolonged fighting the stress upon the army hospitals has been overwhelming, and it is not surprising that rumours are afloat as to the partial breakdown of the medical service in France and Belgium. The retreat of the Germans to their own frontier would inevitably be attended with terrible hardships to their sick and wounded.

The War Office has issued a poster calling for more men "to complete for Recruits, the second half million" for Lord Kitchener's new army. During the first rush of recruits the standard of height was raised, an act of doubtful diplomacy, as it not only excluded many useful men, but gave rise to the impression that the Government had enough recruits. The standard is now reduced to five feet four inches, a reasonable height enough for soldiers, provided they are sound in other ways. It is, of course, necessary to fix standards and to maintain them with a certain amount of firmness when recruits are plentiful and the State can afford to pick and choose. At the present moment, however, the nation is in the grip of a war greater than any it has yet been called upon to encounter. The greater part of the new army, so it is under-
stood, joins the Colours for the period of the war only, so that it is a mere counsel of perfection to insist upon a recruit coming up to any high standard as to teeth, stature, size and expansion of chest, and so on. So long as a man is organically sound and can see well enough to shoot an enemy at, say, 200 yards, it cannot much matter if he is minus half-a-dozen molaris, or has such minor defects as moderate varices or wounds, or a small expansion of the chest, provided there is no actual pulmonary disease and the air enters freely all parts of the lungs. Then, again, the arbitrary age limit of thirty-five has been raised to thirty-eight years. There might well be further elasticity in the matter, leaving exceptional cases to be dealt with, say, by a medical board. With more able, more tough and hardy, and perfectly well able to undergo the hardship of a campaign. These remarks, naturally, do not for a moment question the general principle that demands the best possible standard for our fighting men.

British Scientists and the War.

During the past week a carefully-reasoned statement has been issued by a number of eminent men of science representing various fields of intellectual activity in Great Britain as a reply to the manifestoes of several German University Professors and others representative of German "culture" and learning. The British manifesto maintains that "it is the duty of learned men to make sure of their facts," and it urges the German scientists to get access to the full correspondence regarding the origin of the war, from which it is hoped they will form an independent judgment. Among the distinguished signatories are the names of the following seventeen leaders of the medical profession:—Sir Clifford Allbutt, K.C.B., Regius Professor of Physic in the University of Cambridge; Sir Charles Ball, Bart., Regius Professor of Surgery at the University of Dublin; Sir Thomas Barlow, Bart., K.C.V.O., President of the Royal College of Physicians of London; Sir Watson Cheyne, Bart., President of the Royal College of Surgeons of England; Sir James Crichton-Browne, M.D.; Sir Kickan Godlee, Bart., K.C.V.O., Emeritus Professor of Clinical Surgery, University of London; Sir William Haldane, Oxford University; Sir Wilmot Herrick, Vene Chancellor of the University of London; Sir Donald Macalister, K.C.B., President of the General Medical Council; Sir William Mac ewen, Professor of Surgery, Glasgow University; Sir Patrick Manson, G.C.M.G.; Professor Frederick W. Mott, Royal Institution; Sir William Osler, Bart., Regius Professor of Medicine in the University of Oxford; Sir Isambard Owen, Vice-Chancellor of the University of Bristol; Sir Ronald Ross, K.C.B., Nobel Laureate; Sir William Turner, K.C.B., Principal and Vice-Chancellor of Edinburgh University; and Sir Almroth Wright, Formerly Professor of Pathology, Army Medical School, Netley.

Only one casualty, according to the war accounts, has been reported among officers of the Royal Army Medical Corps since our last issue, Capt. R. E. Porter, R.A.M.C., being among the wounded in the Expeditionary Force. The Secretary of the Admiralty announces that Staff-Surgeon Louis L. Greig, M.B., R.N., of the Royal Naval Division, is a prisoner of war in Germany. The following officers are unofficially reported prisoners of war:—Capt. D. M. Corbett, R.A.M.C., Capt. G. H. Rees, R.A.M.C. (previously reported missing), and private information has been received that Lieut. T. E. Hepper, R.A.M.C., is a prisoner of war at Torgau.

THE "DR." MILLER SENTENCE AND ITS MORAL.

At the Old Bailey last week the notorious American faith-healer, Orlando Edgar Miller, of the Miller Institute, Isleworth, was sentenced to three months imprisonment in the second division. The indictment on which he was found guilty was that of the manslaughter of Miss Scott, who entered the Institute suffering from a form of paralysis, for which she was treated by accused with hyoscine. After five days under his care this unhappy lady died, and was seen by a qualified medical man only a short time before death. The man Miller has figured in various Coroners' Courts, but has hitherto escaped prosecution. He proclaims himself to be an exponent of "Higher Thought and Faith Healing"—whatever that jargon may mean, and at the trial he declared he had at one time charge of all the cases of delirium tremens in Chicago. It is not stated why he threw up what must have been an extremely lucrative practice in that great American centre, but from our own point of view what was Chicago's gain was London's loss. The case with which American charlatans exploit the British public throws a lurid light upon the extreme laxity of our laws against medical impostors. Of late the United States have strengthened legislation against quacks and quackery with the result of an increasing exodus of that particular form of knavery across the Atlantic. Among recent offenders the memory of the notorious "Dr." Crippen is still comparatively green, and it may be recalled that he, too, used hyoscine, one of the most potent drugs known to medical science. The mere fact that several years after Crippen's execution another medically unqualified American should be found to be freely administering hyoscine to Englishmen, shows once again how slow the legislature is to take action where poisonous drugs and quackery are concerned. Giving evidence on his own behalf, defendant said he thoroughly understood the drug in question and had treated more patients with it than any physician on earth. This characteristic touch of rhododendron is not probably without some basis of truth, inasmuch as the use of hyoscine in legitimate medical practice is practically confined to the treatment of certain forms of maniacal violence. He added the statement that he came to this country at the invitation of the Duke and Duchess of Manchester. The fact that his pretensions were thus supported illustrates the lamentable fact that high social position with its connote knowledge and education of the world affords no protection against the wiles of the charlatan. It may be hoped that the sentence passed upon Miller last week will serve as a warning to others of our nobility who may be inclined to accept so great a responsibility as that incurred by the Duke and Duchess of Manchester, in importing a medically unqualified American to treat inebriety and other diseases in England. Amongst other
maladies which Miller professed to cure was that of consumption, a disease that furnishes a happy hunting ground to adventurers of his kidney. For the present he has escaped with the extremely lenient sentence of three months' imprisonment in the second division. The learned judge, Mr. Justice Rowlatt, excused this ludicrously inadequate punishment by expressing a hope that it would show to all others, with no knowledge or a little knowledge of medical matters, the risk of using dangerous poisons. He would not punish the prisoner severely because he hoped this conviction would check the practice, but he warned others that next time the sentence would be heavier. The time-honoured tradition of leniency towards medical charlatans that has become a tradition in British Courts has thus been again upheld. The Miller sentence is adequate neither from a punitive nor a deterrent point of view. It shows the need for drastic revision of British law with regard to unqualified medical practice, and emphasises the urgent need of a Government enquiry as the plain and simple corollary of the recent Select Committee upon proprietary remedies.

**CURRENT TOPICS.**

**The Medical Register.**

Once again the General Medical Council calls attention to the fact that technically no man is a "legally qualified medical practitioner" unless his name appears upon the Register. As our names of medical men who cannot be traced are "reluctantly" erased from the official list, it follows that carelessness may saddle a reputable medical man with the disabilities and inconveniences attached to disregistration. If a medical man not on the Register signs any one of a large number of certificates, the document may be impugned and the treatment involved in a court of law. The full meaning of that statement may be gathered when it is realised that rejection may await such documents as certificates, notifications, reports, and so on, under the statutes relating to births, deaths, or disposal of the dead; lunacy; vaccination; factory acts; education; public health; workers' compensation; insurance; old age pensions; merchant service; for excusing attendance in law courts, etc., etc. Medical practitioners who are not on the Register, or whose names have been removed owing to neglect in notifying change of address, should at once communicate with the Registrar of the General Medical Council, whose correspondence column may be commended to the attention of readers.

**Drill Corps Dangers.**

Since the beginning of the war there has been an epidemic of uncustomed exercise among certain sections of the community. We are not referring to the organised and proper system of drill-training of the new Army and the Reservists, but to the more amateur efforts of enthusiastic civilians who have resolved themselves into the various drill and home defence corps that now abound. The men who make up the personnel of these bodies are of all ages, from the military age upwards. The fate of the younger members need not trouble us; they are able to look after themselves. Many of them ultimately enlist, and are no more seen in their native drill-hall. At any rate, a little extra physical work will do them no harm. The members whom we are most immediately concerned with—and for—are the older ones, the men, say, from 45 to 60, many of whom have hitherto led lives sedentary in the extreme, and whose only physical exertion has been the bi-weekly round of games. Unaccustomed and strenuous cases of mental exertion have some effect on those. Their motives in drilling are three-fold. Some think the exercise good for them and find the novelty amusing, and they have vague ideas that they may some time be wanted. They reduce their waist measurement and increase their efficiency in the same way. Then there is the desire of the sake of example to the rising generation, and the third class consists of patriots who are convinced that by learning to turn smartly to the right when told to do so they are really helping to maintain the Empire. It is this last division that gives us in our professional capacity the most misgiving. Enthusiasm plus excessive exercise plus a notion that means trouble. The fitter men are finding themselves better than they ever were before. Dyspepsia and coprostasis are on the wane. But the older hearts are falling. The spur of patriotism and the obligations of the sergeant allow no respite. The penalty will be paid in dilution. We believe in drill, and think there is some benefit in military training. But some men are too old to begin now. And these men are the most energetic. They are so keen on showing the world their physical prowess that they never say die. If they do not take care Nature, which knows no trifling with her laws, will take the word out of their mouths.

**Insanity and Political Feeling.**

As interesting subject of study which has not yet received its due attention would be the influence which current events exercise on the occurrence of insanity and the forms it takes. In his annual report on the Down District Asylum, Dr. M. J. Nolan, the resident medical superintendent, has some remarks to this effect. He begins by saying that during the past year, in the opinion of the medical director, the political excitement of the past year or two in Ulster was in some cases undeniably "the exciting cause of the break-down; in others it unquestionably shaped the form of the attack which would have occurred in any event. It appears, therefore, that a certain number of cases of mental instability excessive political religious excitement may drive the individual across the border-line into actual insanity. The influence of political fervor in the form of insanity is no less interesting. Instead of the "voices," "vague fears," and "unknown enemies," which were previously the complaint in the majority of cases of delusional insanity, Dr. Nolan now finds that the "voices" have become the definite commands of opposing factions in political and sectarian strife, the "vague fears" are the acute terrors of civil war, and the "unknown enemies" have taken definite shape as Orangemen or Hibernians as the case may be. We may expect within the near future that the war which now occupies so much of our thoughts, will exert a similar influence on the minds of the mentally unstable among us.

**The Vaccination Order. 1914.**

A CIRCULAR letter has recently been addressed to boards of guardians by the Local Government Board advertising to the inscription of vaccination orders contained in the Vaccination Orders, under which it is the duty of the vaccination officer in
certain circumstances to give notice and to make inquiry in the Form Q, set forth in the schedule to the Vaccination Order, 1910. It has been found in some cases that this form has been read as implying that a statutory declaration under Section 1 of the Vaccination Act, 1907, is valid if made within seven days after the child is four months old. This is not the case. The Act requires that the declaration shall be made within four days from the birth of the child, and that it shall be delivered or sent by post to the vaccination officer of the district within seven days thereafter. The Board have now issued an Order rescinding the Order of 1910, and substituting a new Form Q for the Form which was prescribed by that Order. A paragraph has been added requiring that the parent or guardian of the child shall inform the vaccination officer if he proposes to have the child vaccinated by some doctor other than the public vaccinator. In cases where the request is complied with, the vaccination officer should add a footnote to Form H, informing the public vaccinator of the fact, so that the public vaccinator in arranging his visits may be aware of the expressed intention of the parent, and may be able to defer his visit to those parents if for the convenience of his practice he should desire to do so. The clerks of boards of guardians have been supplied with copies of the Order and of the covering circular for distribution amongst all public vaccinators and vaccination officers in their unions.

A Study of Snake Bites.

A very comprehensive account of the mechanism and treatment of snake-bite has been published in the Indian Journal of Medical Research by Captain Hugh W. Acott, I.M.S., and Captain R. Knowles, I.M.S., Directors of the Pasteur Institute of India. These observers have prosecuted their researches into the efficacy of some two hundred vaunted remedies for snake-bite, including such well-known substances as permanganate of potash, gold chloride, iodine trichloride, antivenenes, etc. In spite of all the wiles of the professional charmer, the handling of poisonous snakes requires as much skill as is demanded from a trainer in breaking in a horse. When once the reptile is secured, it is made to bite through a rubber diaphragm stretched over a venom glass, and when the fangs are anchored into the rubber, the operator proceeds to "milk" the poison glands by pressure. The common cobra is, par-excellence the poisonous snake of India, though the venom of the hamadryad is more toxic. The common krait has also a very deadly bite, but it is a sluggish reptile. The venom of the Russell's viper shows a marked tendency to produce gangrene in such cases as escape death from hemorrhage, while that of the Echis carinata possesses this property to a less extent. The bite of the common green pit viper and probably the bites of all the Indian species of venomous snakes do not, as a rule, lead to death if ever not to man. The value of local remedies is limited to those cases in which they are applied before the minimum lethal dose has been absorbed into the circulation, and they can only counteract whatever poison happens to remain in the wound. The favorable cases by incision and the burbling in of poison are very rare. It is likely that in certain cases it can only be effective when the case is seen immediately. Immediate amputation in poisoning by cobraines and viperines may be necessary to save life. Several factors tend to reduce the mortality from snake-bite, such as blind strikes, rubbing, and other factors due to the snake itself, and also interposition of clothing and dislodgment of the reptile by the person attacked before the snake has had time to close its jaws. The excellent photographic illustrations of the manipulations of poisonous snakes and the many charts and tables in this valuable paper are full of interest to those practitioners who have much to do with the treatment of snake bites.

The German Birth-Rate.

Amongst all the excellencies and perfections of Germany which we have been brought up on, and which we are now out to dispel once and for all, the splendours of her birth-rate have been most prominent. France, we have been told, is dwindling rapidly to extinction, and England is fairly on the way to follow her example, while Germany, with a more than Machiavellian policy of frightfulness, was preparing to swamp and replace the other nations of the earth by the sheer force of her prolific population. It was indeed a fearful prospect, but it was untrue. Like so many others Teutonic illusions emanating from official and other sources, the fear of the figures is doomed. Our misgivings are out of date. It is quite true that the thirty years following the Franco-Prussian War saw Germany with an enormously increasing population, with numbers of Franco-Foreign births; but the progress ceased with the nineteenth century. Dr. von Gruber refers to the subject in the Münchener Medizinische Wochenschrift, and points out that while the marriage-rate remained fairly constant (80 per 10,000 inhabitants) during the period 1890-1910, the birth-rate sank from 370 to 310. This decrease was, as usual, most marked in the cities. In Berlin the decrease per 10,000 inhabitants is from 149 in 1876 to 93 in 1912, but the country districts show a like result. Von Gruber places the responsibility for the decrease on the usual causes, which may be summed up in a word as civilisation—but perhaps a less interested observer might not have been so sure of his ground. At any rate, we are gradually reducing our old illusions about Teutonic omnipotence to something nearer the earth. We are not yet swamped by a decadence that only existed in our introspections. As a nation we are keeping our place on the population chart as well as the rest. Germany is still the leading nation in Europe, in many others, she is not really so much our marvellous superior as we were given to thinking.

The Relationship of Food to the Composition of the Urine.

The normal acidity of human urine, as is well known, is due to the presence of acid sodium phosphate. It is possible to influence the degree of this acidity by diet, and this fact is largely taken advantage of in the therapeutics of certain affections of the urinary tract. A comprehensive study of the urine in health and disease has been undertaken by Dr. N. R. Blatherwick, of New Haven, Conn., (a) who has conducted a series of experiments upon the living subjects. He has found that, as was to be expected, those foods which yield an alkaline ash decrease the urinary acidity, while those giving an acid-kaolin residue increase this factor. Certain vegetables and fruits, on account of their preponderance in basic elements, lead to the formation of less acid urines, such as potatoes, oranges, raisins, apples and bananas. On the other hand, prunes, plums and cranberries cause an increased acid production, and this is attributed to the quantity of benzoic acid which they contain, and this leads to the formation of hippuric acid. Rice and whole-

(a) Archives of Internal Med., No. 3, 1914.
meal bread increase the urinary acidity. If the acid theory of Fischer be correct—namely, that the presence of acid favours the solution of the renal colloids, thus giving rise to albuminuria, then the treatment indicated is the introduction of bases in order to overcome this increased acidity. The administration of the alkaline salts, such as citrates and bicarbonates, has much the same effect upon the urinary composition as taking the appropriate fruits and vegetables, but the latter course is more pleasant. The value of such diets in the treatment of persons subject to uric acid calculi is thus apparent.

**Eugenics and the War.**

The consequences of the depletion of the male element of the population, owing to the war, must be viewed with some apprehension, not only by the belligerent nations themselves, but also by impartial scientific observers in all lands. It is premature to speculate upon the numerical proportions that will exist between the sexes at the conclusion of the present strife, so far as this country is concerned, but it must strike the most indifferent that the progress of race development from the purely eugenic standpoint will hardly be advanced in the years that are to come. In our own country, as the *Eugenics Review* tritely remarks, the sample of those killed will not be the average of the race, but the best type of the race. If it be true that the cream of the race will be taken and only the skimmed milk left, then the ultimate effect upon the nation must be injurious. A certain amount of the cream is, we venture to think, still left behind. While not wholly sharing our contemporaries' pessimism, we freely admit that there exists a great need at the present time to safeguard the physical interests of the rising generation as well as those of that yet unborn. Under these circumstances no restrictions should, therefore, be placed in the way of those who desire to marry before leaving this country, but at the same time there must be a reasonable guarantee for the well-being of the wife in her husband's absence. In the case of the middle classes, as well as among the poorer section of the community, adequate provision must be made for the wives and young families of those who have sacrificed so much for the defence of their country. It is so to be hoped that the Government may feel their responsibility in connection with the care of maternity in time of war. The proposed formation of local relief committees under Government support will go some way towards meeting the present necessity, and we may look forward, doubtless, to a more comprehensive scheme in the near future.

**The Value of Expectorants.**

An expectorant drug is usually defined as one which facilitates the excretion of mucus from the bronchial tubes, rendering this more fluid and so assisting in its removal from the air passages. The chief agent in the latter process is the action of the cilia which line the mucous membrane of the lower portion of the respiratory tract, whereby an upward current is continually set up conveying mucus and any minute foreign body which it happens to contain towards the upper air passages. From these regions it is disposed of by expectoration or by the act of swallowing. The amount of clinical and experimental work that has been done in connection with the estimation of the true value of expectorants is not extensive, a list of recent researches into the subject by Dr. Joseph L. Miller, of Chicago, (a) may be studied with interest and profit. Ammonium carbonate, one of the most widely used, perhaps, of all the expectorants, was injected into the duodenum of dogs and the increase in weight in a piece of rolled filter paper placed in close contact with the tracheal mucous membrane was noted after a certain period of time. Ipecacuanha and apomorphine were employed in a similar manner, eucin hydrogen chloride being given in the former case. It was found that ammonium carbonate and chloride and the emetic group of expectorants such as ipecacuanha and apomorphine, when given in sufficiently large doses to animals, increase the bronchial secretion. Anthimny, the iodides, senega and squill, in addition, are known to stimulate the secretion of bronchial mucus. It is believed that some of these drugs may excite the bronchial gland centre, which, in its activity, shows a certain parallelism with the salivary centre. Phlogcrin, on the other hand, stimulates the bronchial glands directly.

**PERSONAL.**

**DR. E. MACD. COSGRAVE, M.D., F.R.C.P.I.,** has been elected President of the Royal College of Physicians of Ireland.

**MR. J. W. B. HODSPDN, F.R.C.S.Edin.,** has been elected President of the Royal College of Surgeons, Edinburgh, for the ensuing year.

**MR. G. M. GRAHAM, F.R.C.S.Edin.,** has been appointed Surgeon to the Craigleigh Hospital.

**DR. EDMUND HOBHOUSE, of Hove, has been placed on the commission of the peace for that borough.**

**MR. MEREDITH TOWNSEND, M.R.C.S., L.S.A.,** has been elected Master of the Society of Apothecaries.

Among the justices of the peace sworn in at Gateshead Police Court the other day were Drs. F. S. Leach and John Todd.

**DR. HERBERT JONES, D.P.H.,** has been elected President of the Society of Medical Officers of Health for the ensuing year.

**MR. F. E. BURGHAIRD, M.S., F.R.C.S.,** Surgeon to King's College Hospital, London, has been appointed Consulting Surgeon with the British Forces overseas, and has already left for France.

**DR. NESTOR TIRARD, M.D., F.R.C.P.,** will deliver the Bradshaw Lecture before the Royal College of Physicians of London on Tuesday, November 3rd, at 5 p.m., on "Some Clinical Contributions to the Study of Glycosuria."

**DR. NORMAN MOORE, M.D., F.R.C.P.Lond.,** Honorary Fellow of St. Catherine's College, Cambridge, will deliver the Rede Lecture in the Senate House of the University of Cambridge on Thursday, November 12th, at 5 p.m., on "St. Bartholomew's Hospital in Peace and War."

**DRS. H. J. CARDALE and J. Fletcher Porter will introduce a discussion on "The Certification of Invalidity under the National Insurance Act" at the next meeting of the Life Assurance Medical Officers' Association to be held on Wednesday, November 4th, at 5:30 p.m. in the rooms of the Royal Society of Medicine.**

CLINICAL LECTURE

ON

THE RECOGNITION OF HÄMIC INFECTIONS OF THE URINE: ITS CLINICAL AND EXPERIMENTAL VALUE.

By EDWARD C. HORT, F.R.C.P.Edin.,

Late Assistant Physician, Italian Hospital in London.

(Concluded from page 422.)

I come now to hæmic infections of the urine in typhus fever, though in order to make clear the points we wish to make it is first necessary briefly to review the present bacteriological status of this disease.

In typhus fever, as is well known, a great deal of attention has been paid in recent years to the bacteriology of the blood in man, in the hope of discovering therein the causal organism. In spite, however, of this, the infective agent is still unknown. It is true that in a large number of cases coccal and bacillary organisms of considerable size, varying from 1 to 3 microns or more in their greatest diameter, have been seen in fresh films and have been cultivated from typhus blood by many different observers, some of whom have believed them to be responsible for the disease.

We have, for example, the Diplococcus exanthematicus of Dubieff and Bruhl in 1804, the bacillus of Hlava of Prague in the preceding year, the large dumb-bell organisms of Mott and Flor, and the Diplococcus and Diplobacillus of Wilson of Belfast in 1910, which he believed to be secondary organisms only. We have, in addition, the Diplobacillus exanthematicus of Marcus Rabinovitch, which has been also independently described by Miller, by Fuerht, by Predjetschensky, and finally, by Plotz at the beginning of this year.

So far as we can discover, however, in the case of none of these organisms was the test applied of reproduction of the disease in monkeys by injection of the organisms in question, and it appears to be generally admitted that the pathological relationship of these different claimants has not been established.

In 22 recent cases of the disease occurring in Ireland, in Dublin, and County Clare, we have examined the blood both by immediate film preparations and by cultivation, and have without difficulty obtained and identified the so-called diplococcal and diplobacillary organisms described by many of the authors mentioned. We have indeed gone further and have found that injection of cultures of these organisms in citrated human blood, on which growth is readily obtained, has in no case produced any observable pathogenic effects in the series of bonnet monkeys selected for experiment. We conclude, therefore, that these large organisms are not themselves responsible for the production of the disease, and that they are either secondary invaders, perhaps from the bowel, as has been suggested by many authors, or that they represent harmless phases in the life-history of some previously undescribed organism.

The fact, however, that they produce no fever when injected into monkeys, and the constancy with which they may be cultivated from typhus blood, makes the theory of secondary invasion somewhat difficult to support.

The well-known work on the transmission of typhus by Nicholle, Conseil and Conor, and of Anderson and Goldberger, clearly established the infectivity of human typhus blood when injected into healthy monkeys. But these observers do not appear to have fully studied the bacteriology of the typhus blood they injected. The result is that it has been till now quite impossible to say whether the continued fever that can readily be induced in bonnet monkeys by the injection of human typhus blood is caused by the large organisms referred to, or by some other infective agent hitherto undescribed which may or may not be the cause of typhus fever. In other words, no evidence has as yet been brought forward that the so-called "typhus classique" of the monkey described by the French observers is in actual fact typhus fever, beyond the production in the monkey—after the lapse of an incubation period—of a continued fever which is but rarely accompanied by a rash. And this also applies to the work so far published on the transmission of the disease from man to monkey, and from monkey to monkey by the body louse, though the fact of transmission of the disease from man to man by this agent can hardly now be questioned.

The fact, however, that we have been unable to produce fever in bonnet monkeys by injection of the large organisms referred to supports to some extent the view of the French and American workers that they have been able to reproduce the disease in monkeys.

And this view is further supported by the following abstract of our work, which will be published, with all the necessary protocols, in a short time.

In recent bacteriological work on typhus little or no attention appears to have been paid to the urine.

We therefore carefully examined the urine, by immediate examination of fresh specimens and by cultivation, in all of the 30 cases that were placed at our disposal.

In the great majority of these the fresh urine during the period of fever was found to be turbid from the presence of micro-organisms, and in many cases the degree of turbidity was extreme, even apart from deposits of urates or phosphates. Slight traces of albumen were found in a few cases, but in none was there any evidence of pus or of blood, and in no case was there any clinical evidence of disease of the genito-urinary tract. Both in catheter specimens in the two sexes and in non-catheter specimens the bacteriological findings in films made from the fresh centrifuged urine were strikingly similar, and were in fact so constant as to establish a valuable aid to rapid diagnosis of the disease. In all of the urines examined before the crisis great numbers of the large cocci and bacillary organisms morphologically similar to those found in the blood were observed, and
their identity was in many cases established by their behaviour on cultivation and on sugars. In each case there were also present in the deposits of the fresh urine minute organisms which occurred singly, or in pairs, or in clusters. These could most easily be recognised as micro-organisms if they were examined with a 1/12th oil immersion Fluorite lens, or, better still, by a 1.5 m.m. apochromatic. The organisms that occurred singly or in pairs required, as a rule, prolonged search before they could be demonstrated. When in clusters, as well as when occurring free, they were more readily examined in some bacillary, and often it was impossible to determine whether they were coccal or bacillary. They were both Gram-positive and Gram-negative in the same clusters, they had no apparent capsules, and they were non-motile. They varied in size from about 0.1 or 0.2 of a micron to about 0.3 micron in their greatest diameters when in pairs, and when occurring singly their greatest diameter was proportionately smaller.

They rapidly disappeared from the urine when this was inoculated, and after a few hours the larger cocco-bacillary forms only could be found, and these readily multiplied both in urine and in, or on, the ordinary laboratory media.

Injection of these cultures into bonnet monkeys produced no apparent pathogenic effect, as we had also found to be the case with cultures of the same organisms from the blood.

After filtration of the urine through tested Berkefeld candles we were able in many cases to show, by immediate examination of the filtrate, the small cocco-bacillary forms freed from admixture with the larger non-pathogenic organisms. When, however, the filtrate was incubated they quickly disappeared, their place being taken by large coccal and bacillar forms, and which also proved, on injection into bonnet monkeys, to be non-pathogenic. And in the case of cultures on the ordinary laboratory media which had been inoculated with the fresh filtrated urine the small cocco-bacilli did not survive, only the larger non-pathogenic organisms being found.

Numerous attempts were then made by plating, and by the method of dilution, in the case of filtered and unfiltered urine, to separate the small coccal forms from the small bacillary forms, but always without success, though in some colonies the coccal form predominated and in others the bacillar. The medium employed in this set of experiments was human blood agar.

The urine of bonnet monkeys successfully inoculated with human typhus blood contained, when looked for, the same number of bacilli as the urine of the monkeys. On injection of the blood and cerebrospinal fluid into the blood agar the procedure has in several bonnet monkeys been followed by high continued fever after a well marked latent period.

These monkeys will presently be tested for immunity by injection of fresh typhus blood. It should, however, not be forgotten that the monkey appears often to be naturally immune to injection of human typhus blood, even when collected at suitable times, both in our experiment and that of many other observers. Too much reliance, therefore, cannot be placed on immunity experiments of this nature.

This briefly is an outline of some of our experiments on the aetiology of typhus fever, experiments which were the direct outcome of a study of the haemic infections of urine.

We are fully aware that the pleomorphism of the filter-passing infective cocco-bacillus referred to, as well as its apparent mutation into larger cocco-bacillary forms which are non-infective, is not an easy matter to prove. And, indeed, the obvious criticism that we are dealing with contaminations—in the broad sense of the word—is easier to make than to refute. If, however, this mutation be eventually proved, and we make no dogmatic statements as to this, or as to the aetiological relationship of the organism to typhus fever, it...
will be a satisfaction to know that much of the
previous work on the subject can be brought into
line.
Whatever the verdict of the future in these
respects, we venture to think, however, that a
study of the hemic infections of urine, quite apart
from the numerous carrier problems it suggests,
with which we have no time to deal here, is one
that deserves a fuller attention on the part of
clinicians and experimentalists than it at present
receives, both in diseases in which the causal
organism is known, as well as in those in which it
is not.

Table of 20 Cases of Lobar Pneumonia Showing
Results of Study of Hemic Infection of
The Urine.

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<tr>
<th>Case</th>
<th>Temp. F.</th>
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<th>Turbidity.</th>
<th>Reaction</th>
<th>Organism.</th>
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We are greatly indebted to Dr. F. Keates,
Superintendent of the Camberwell Infirmary, for
permission to study these cases, and for the
generous assistance placed at our disposal.

Table of 20 Cases of Typhus Fever Showing
Results of Study (of Hemic Infection)
Of the Fresh Urine.

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<th>Case</th>
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<th>Turbidity.</th>
<th>Reaction</th>
<th>Organism.</th>
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* Just after crisis. † Some days after crisis.

Note.—A Clinical Lecture by a well-known teacher
appears in each number of this Journal. The lecture
for next week will be by H. L. McKisack, M.D.,
M.R.C.P.Lond., Physician to the Royal Victoria
Hospital, Belfast. Subject: "A Case of Pernicious
Anemia."

Original papers.

Some cases of femoral hernia
And the inguinal operation
For this condition.

By G. C. E. Simpson, B.A., F.R.C.S.Eng.,
Hon. Surgeon, David Lewis Northern Hospital, Liverpool.

Femoral hernia is a subject presenting many
points of interest to the surgeon, and the following
cases illustrate some of the questions:—

Two years ago (a) a girl aged 26, was admitted
to my wards with double inguinal and double
femoral hernia. She had a general weakness of
her abdominal muscles, due to anemia, and
her work as a housemaid, and in addition to
the definite hernia there was a definite bulging in
both thighs on coughing, beneath the outer half
of Poupart's ligament. After opening the inguinal
canal it occurred to me that a femoral hernia had
been approached from this aspect, and with a
view to saving time and incisions I retracted
the margins of the wound and found it easy to
excise both femoral and inguinal sacs and to
suture both rings from the one incision on each
side. Though the route was adopted primarily for
the purpose of shortening the necessary duration
of anaesthesia, the free exposure of the parts
(in comparison with the femoral route), the ease
with which the neck of the sac could be closed at
a high level, and the freedom from the femoral
ring and complete closure it rendered possible,
were so striking that I have since utilised this
route for practically all femoral herniae.

The next case I met with was a strangulated femoral
hernia in a man, aged 62, and in this case I avoided
the inguinal route, as I was afraid of the loss of
time required for closure of the inguinal canal.
(1) His hernia is quite firm after a lapse of twenty
months, though his work is fairly heavy.

Before giving a detailed description of the
operation it will be of advantage to consider the
prognosis of femoral hernia and the principles
of operations for herniae in general. All surgeons

(a) Liverpool Medical-Chirurgical Journal, July, 1914.
are agreed that in an operation for hernia it is necessary to obliterate the sac at a high level; this is attained in inguinal hernia by various methods—in small children forcible traction on the sac and ligature as high as possible as a rule suffices without opening the inguinal canal; in Bassini's operation in adults high access to the neck of the sac is attained by opening the inguinal canal; in Kocher's method high obliteration is obtained by inversion and transposition of the sac.

Most surgeons, in addition, consider it right to attempt to close this weak place in the abdominal wall by the closure of muscles and fascia, and this is especially necessary in the abnormal rings caused by large herniae, and in patients with weak abdominal muscles, which usually means the combination of wide rings and prolapse of visera on to the weak parts.

Now with the usual femoral incision for femoral hernia, especially in obese patients, there is difficulty in obtaining high exposure of the neck of the sac for ligature, and even greater difficulty in gaining that clear exposure requisite for tying the fascial curve, desirable for satisfactory closure, as is shown by the multiplicity of operations that have been devised. The inguinal incision gives a far better exposure in both cases.

Before utilising a new operation it is, however, necessary to consider how the results of the old operations have stood the test of time. As a rule, one would have said that the multiple operations described for femoral hernia were a sign of unsatisfactory after-results, but there is a very wide divergence of opinion.

On one hand, Murray (1) recorded thirteen cases in females, twelve traced; five in males, four traced, with no recurrences; and he states that since then he has traced many more cases and found no relapse at all. Murphy (2) and Ochsner, (3) also using simple ligature of the sac and removal of the fat from the ring without suture of any fascial structures, state that recurrence is unknown (thirty cases traced), and others (4) give similar results.

On the contrary, I understand that recurrent femoral hernias are a fairly common condition at the London Truss Society, and the following large series confirm this view:

Breschet (5) collected 232 cases without closure of the ring, 29 per cent. recurrences; 163 cases with closure of the ring, 8.6 per cent. recurrences.

Pott (6) collected 422 cases: 36.7 per cent. of recurrences when the ring was not sutured; 28.4 per cent. of recurrences when the ring was sutured.

The inguinal route was first described by Lotheissen (1868), and again by Battle (1901), and an excellent account of their technique is given in Jacobson's Operative Surgery (7). Moschowitz (8) described another method in 1907, and there is a recent paper by Seelig and Tuholske (8) laying special stress on the anatomy of the parts.

The procedure is that for inguinal hernia until the inguinal canal is opened; the conjoint tendon is retracted upwards (and the cord drawn up in the male), and a little blunt dissection along the inner part of Poupart's ligament shows Gimbernat's ligament and enables the margins of the femoral ring and the neck of the sac to be clearly defined. The transversalis fascia is seen closing the internal inguinal ring, and (except in the smaller hernia) it is necessary to divide this fascia parallel to Poupart's ligament before proceeding further. In small hernia the whole sac can often be drawn out of the ring and converted into an inguinal hernia; but in most cases the peritoneal cavity is opened on the abdominal side of the neck of the sac, the contents are reduced, and the sac is then drawn up and cut away, the opening being sutured well on the peritoneal side of the neck, which is usually broad; the transversalis fascia is also resutured.

Now, having dealt with these structures, the femoral ring is closed: Gimbernat's ligament and Poupart's ligament are identified, as is also Cooper's pubic ligament, a strong fascial band along the ilio-pectineal line, formed of reflected fibres from Gimbernat's and Collen's ligaments, from the conjoint tendon, the linea alba, and in some measure from all the tendinous structures in the neighbourhood; the femoral vein being protected, three or four strong sutures are passed through the Cooper's ligament and Poupart's ligament, and the femoral in addition, and on tying these the femoral ring is firmly closed. The conjoint tendon is then sutured to Poupart's ligament, as in Bassini's operation for inguinal hernia, and the external oblique aponeurosis resutured. In many cases it will be found more convenient to pick up with the inner deep sutures, the conjoint tendon, Cooper's ligament and Poupart's ligament, so combining the methods of Lotheissen and Moschowitz.

In this operation difficulties may arise in dealing with the sac—in one of my cases the omentum was so adherent to the sac and the apex of the sac so adherent in the groin, that I ligatured the omentum and sac on the abdominal side, and then cut away as much as possible of the rest, leaving the apex still adherent in Scarpa's triangle. In two cases of strangulated hernia it was necessary to nick Gimbernat's ligament, and this can be done readily with the point in full view, so that an abnormal obturator artery could readily be dealt with. In two cases the bladder was on the sac, and in one it was separated for so much as three inches in order to ligature the sac high up; this case certainly might have been distinctly awkward if approached from below Poupart, but in my opinion both these cases showed the advantage of the route for high ligature of the sac.

In one case of strangulation the lower margin of the skin incision was retracted downwards and the sac opened in the groin and the fluid intraperitoneal was therefore reduced; in this case resection was considered, but was not found necessary—should it have been required it could have been readily performed without any additional incision.

In very stout patients it is necessary to take a specially deep grip of the pubic ligament with the hernia needle, as otherwise the sutures may cut through.

I have now utilised this method in nine cases, including four of strangulated hernia; in only three has a sufficiently long time elapsed to consider the cure as established.

The first of these (double inguinal and femoral) was quite sound two years after operation, and the bulging on coughing over the outer part of the thigh is less marked, though she has had a child
in the interval; a second, a strangulated hernia, at 61, is quite firm eighteen months after operation, says she can go long walks and bathe without trouble, and indeed is thankful that the onset of strangulation made an operation necessary and relieved her of her truss; the third, a woman, at 29, is quite sound after twenty months. Two of the cases, both over seventy years of age, and with symptoms of obstruction of five and six days’ duration, died of cardiac failure some hours after operation—the relatives of one case had been some time previously warned by a physician that the condition of her heart was so bad that sudden death might occur at any time. Another lady, at 68, with a strangulated hernia five inches across and the skin over it red and edematous, made an uneventful recovery till the time came to get up, when a series of faints made us afraid that she would never be able to leave the hospital—though there was no obvious lesion of the heart, it appeared that she had been subject to such attacks for some years.

I regret that I have not more after-results to show, but the experience of those who have utilised this method has been very satisfactory, and I can only express the opinion that the inguinal route will, in time, be the route for operations on femoral hernia—its advantages over the old method cannot fail to be apparent to all who see cases.


Case IV.—Woman, at 73. 8.11.12. L.F.H. Five days strangulated. Inguinal incision. Richter’s hernia, small gangrenous patch at point of constriction required inversion. Died 5 hours later. (Mitral disease.)


Case VI.—Woman, at 50. 27.8.13. R.F.H. (6 inches by 6 inches). Many years’ standing; had refused operation during attack of strangulation ten days previously. Irreducible. Double mitral and aortic disease: spinal anaesthetic. Combined route, Poupart’s ligament being divided; intestines universally adherent to each other and sac. Secondary union (an ulcer was present on the sac wall). Cure.


Case VIII.—Woman, at 72. L.F.H. Strangulated 6 days; fecal vomiting. Inguinal incision; gangrenous line on bowel opposite Gimbertand’s ligament (which required division) inverted. Died 5 hours after operation.


Case XI.—Woman, at 98. R.F.H. 13.4.14. Strangulated 12 days attached by 3 inches. Inguinal incision; sac opened above Poupart and also in thigh after retracting skin. Sac contents irrigated with saline. Gimbertand’s ligament freely divided from above. Intestine very congested, but viable reduced. Conjoint and Poupart sutured to pubic ligament, which is soft and fatty. Primary union. Cure. (Patient subject to severe fainting attacks.)


BACTERIAL MUTATIONS: SOME RECENT OBSERVATIONS AND SUGGESTIONS AS TO THEIR EFFECT ON CURRENT MEDICAL THEORIES. (a)

By G. D. MAYNARD, F.R.C.S.E.,
8. Africa Institute for Medical Research.

It is generally accepted that some microorganisms must be regarded as the causal agent of each of the so-called infectious diseases; and further, it has been almost an axiom in medicine that every organism producing a disease must of necessity have had a progenitor with similar characters. That is to say, there is a continuity of the species; and thus, when any case of an infective disease occurs we postulate some previous case as mediate or immediate cause. Elsewhere, I have discussed the question of the meaning which should be attached to the terms infectious and infective from the practical point of view, and it is unnecessary here to touch on this aspect of the problem.

Let me formulate a concrete proposition which may still represent the views of many medical men, and will in any case serve as the text for the discussion in this paper:—That the microorganisms of specific diseases do not arise de novo, and whenever such organisms are met with, they are the descendants of organisms with similar characters, some of their ancestors at least have given rise to a similar disease.

(a) Read before the Public Health Section of the South African Medical Congress, August, 1914.
In support of this hypothesis the following facts might be urged:

Firstly, that in both the animal and vegetable kingdoms any one species is not found to vary in character from generation to generation except within narrow limits, and we may, therefore, by analogy anticipate that the same stability of character will be true for micro-organisms.

That the acquirement or loss of pathogenic properties is a large variation. Recent observations, first brought into prominence by the work of de Vries, have shown that mutations are not unknown even amongst highly organised structures, and we have learnt to recognise that a new character may appear suddenly, and that subsequent generations may continue to bear this character. It appears to me reasonable to assume that the more slowly organised a plant or animal may be, the more probable such mutations would be; but whether or not such a hypothesis be correct, it will, I think, be admitted that variations are more probable among animal than plant types than where both male and female gametes are concerned in the production of the zygote. Unless we assume a special creation for each type of organism, changes in character must clearly have occurred at some time or other, in which case the phenomenon is not a new one. Arguments as to whether the egg or the hen appeared first are doubtless futile; nor have we the right to assume that because one type of organism arose from some allied type the process will necessarily be repeated, unless we know what the antecedent conditions were, and whether they are being, or are capable of being, repeated. At the same time such a possibility should not be excluded, because, unless the supposition of special creation be correct, we are postulating no new principle nor anything intrinsically impossible.

Secondly, it may be urged that practical experience supports the suggestion that the types of micro-organisms are stable. Dominic on the contrary has repeatedly shown that the same case of scarlet fever will give rise to a second; the carrier of the typhoid organism will spread the same disease to others; and so on. Having observed these and similar phenomena to be true in many diseases, or at least to be a common occurrence in many diseases, it has been assumed to be an invariable rule, and to apply to all diseases due to micro-organisms. This assumption having been accepted, apparent exceptions are simply dismissed as cases in which sufficient information is not available, and the literature has been filled with records of the examples which supported the hypothesis. It is hardly necessary to remind the members of this section of the many cases of diphtheria and enteric fever which arise in the most unexpected and improbable places, where no carrier or previous case would have been postulated unless it had been assumed that such a case was a necessity. How, for instance, are we to explain rationally the annual appearance at definite times of the enormous sporadic cases of typhoid fever which usually usher in the enteric season? Are we to assume that no carriers were about during the foregoing period, or that they have certain "off seasons" in which they cannot spread the disease? Moreover, local outbreaks due to carriers may occur at any season, and the number of potential carriers which would be required to explain adequately the seasonal outbreaks would be quite out of keeping with anything observed at other times. Or, again, are we to assume that at a certain season of the year typhoid organisms are latent in soil or water, and become active at others? This suggestion loses much of its attractiveness when we compare the seasonal epidemiology of enteric fever in the different countries of the world.

On what, then, do we base our ideas of uniformity of type? On observations in regard to the similarity of symptoms combined with uniformity of cultural and morphological characters? Much recent work shows that in respect to many micro-organisms neither the cultural, morphological, nor serological, characters are necessarily stable; and if, therefore, the assumption of uniformity of type is based on such evidence it will be well to reconsider our creed.

Clinically we have ample evidence of changes within a species, changes that is, of character if not of kind. Animal experiments have demonstrated how virulence can be reduced to a vanishing point or greatly enhanced. Study of the history of epidemics shows how variable is the virulence from time to time. The decrease in virulence with length of time since the commencement of the outbreak of an epidemic is frequently noticed; but the explanation often advanced, namely, that this is due to the attack of the more susceptible in the early stages, does not appear to me entirely satisfactory, even if the reverse phenomenon were unknown.

Let us briefly review some of the recent observations on changes or mutations of bacteria. The term mutation has been freely used in connection with these changes. If we merely use the term to imply an alteration in a character no objection to the word can be raised, but if we use it in its more limited biological sense implying a sudden change in, or acquisition of, a character which shall remain unaltered for all the progeny of the organism, then possibly the term may be correct for special cases, but in general environment plays the part of gradually eliminating those organisms most unfit for the new condition, until a race with altered characters is established, the biological use of the word mutation for such a phenomenon is misleading. It is no doubt true that changes in character often arise with apparent suddenness in laboratory experiments, but it must not be forgotten that tens of generations can be produced in a few hours, and what appears to us a short time may represent many generations of bacteria. It is fairly doubtful whether, at present, there is sufficient evidence available to enable us to classify properly the biological processes concerned in the production of the observed changes.

One of the groups of organisms on which much work in this connection has been done is the colon-typhoid group. Medical literature contains numerous accounts of alterations in character, especially in regard to the sugar fermentations, of lactic acid bacteria. For instance, it has for a long time been known that an organism which, when first isolated, gave all the fermentative reactions of a para-typhoid bacillus, may by cultivation on suitable media lose its characteristic properties, and become indistinguishable from a colon bacillus. Further than this, both Revis and Penfold have described cases in which a colon bacillus has, after cultivation on special media,
given rise to an organism which apparently does not belong to the colon group; in Revis' own words, "which is neither physiologically, morphologically, nor culturally a colon bacillus."

A good account of the mutations of bacteria in this group, the colon-typhoid, is given by Clifford Dobell in an article entitled "Mutations in Bacteria," appearing in the Journal of Genetics, Vol. 11., No. 4. W. J. Penfold, who has done a great deal of work on bacterial mutations, writing in the Journal of Hygiene, Vol. 11., No. 4, says: "It is very little doubt about the variation process described by Revis, as it bears a strong resemblance to the one described in the previous communication I made on this subject, and in that case the identity was determined by serum tests as well as by standard cultural tests. Moreover, other organisms varied similarly in the same environment."

Dr. Penfold finds that the mutations among members of the colon group are remarkably constant under given conditions, and in this respect they differ from the observations made when dealing with some of the other groups. To quote his own words: "It will be noticed that the above examples of varying degrees of specificity of variation process are taken from the intestinal group of organisms. They are, therefore, not at variance with, though very distinct from, the haphazard variations that have been described in the case of the Streptococci."

The group of organisms just discussed are a class we are accustomed to regard as pathogenic, or potentially pathogenic, and although certain forms are associated with specific diseases, it may be held that the so-called mutations are possibly merely small variations, which do not constitute a fundamental change of character such as would permit us to classify the new organism as a different species. Or possibly a believer in the theory of the inheritance of acquired characteristics might be satisfied to assume that the old organism had but acquired a new character, and there was no real alteration in type. Neither of these views appears to me satisfactory, but then if we accept the latter we shall have to admit that a non-pathogenic organism may acquire pathogenic properties, and thus to all intents and purposes become, from the medical point of view, a new species.

Turning now to another group of organisms, the experiments of Thiele and Embleton are of exceptional interest and importance. They have shown that organisms which are non-pathogenic may, if the host be previously sensitised, become pathogenic, not alone to the sensitised host, but thereafter to normal animals. Their experiments were conducted with the bacillus mycoides (a soil organism, superficially resembling the anthrax bacillus, but ordinarily incapable of growth at body temperature, and possessing flagella) and two members of the acid-fast group, the smegma and the timothy grass bacillus. After having sensitised a host with these bacilli, mycoides by an inoculation with 20 milligrams dry weight of these organisms, an intraperitoneal inoculation of an agar slope of mycoides grown at 37° Centigrade produced death in sixty hours. They state, "The post-mortem appearances were thus indistinguishable from those of anthrax."

Similar experiments were carried out with smegma and timothy grass bacillus, and to quote again their own words: "The post-mortem appearances were thus indistinguishable from those due to an intraperitoneal injection of tubercle bacilli." They further conclude: "Thus an organism by passage may become so altered that it is able to infect and multiply in an animal in which there is no specific ferment. The mycoides could only become pathogenic in the first instance on inoculation into a sensitised animal."

The passage this organism is capable of producing disease in a normal animal is, . . . The passed smegma and phlegm are similar.

In these experiments we have examples of non-pathogenic organisms, or possible we should say, organisms previously supposed to be non-pathogenic, which, under experimental conditions, give rise to a race of organisms indistinguishable in the pathogenic lesions which they produce from the anthrax bacillus on the one hand, and the tubercle bacillus on the other. But the reverse of the proposition is not apparently true. Dr. Hermann Döderlein claims to have produced from the tubercle bacillus by laboratory treatment an organism which is non-acid-fast and non-pathogenic. Mme. Victor Henri, working in Dr. Roux's laboratory, has transformed the anthrax bacillus into a coccus under the influence of ultra-violet rays. The author of a note in the June, 1914, number of the Journal of Tropical Medicine and Hygiene writes: "We are getting accustomed to the idea that the apparent specific differences of genera are but stages in development, starting from some common source, and that soon the present-day divisions founded upon shapes, etc., will become obsolete as a basis of classification."

(To be concluded in our next.)

ANTIMONY IN SYPHILIS. (a)

By JAS. C. McWALTER, M.D., LL.D., F.R.P.P. and S.

The true antisyphtillic drugs, according to Neisser, are those which have the power of killing spirochetes. These are mercury, arsenical compounds, including salvarsan, and antimony. Concerning antimony, Neisser does not think there is any evidence yet of its efficacy in human syphilis, but he states it has a destructive action on the spirillosis of animals.

Neisser's view of the ideal drug is one which would combine arsenic, as in salvarsan, with mercury, and he considers it would be made still more powerful by the addition of antimony. The whole world is now drenched with salvarsan given mostly in heroic doses, and a reaction has set in. Instead of the "Therapia magna sterilisans" of Ehrlich, Neisser advocates a combination of drugs, in moderate doses, continued for over a year. He states that while a nontoxic dose of each drug may be given, the combined effect is powerful. 2. Some spirochetes are affected more by mercury, some by arsenic, some are probably more affected by antimony. 3. Mercury and arsenic destroy spirochetes in different ways. More modern views seem to suggest that the treatment of syphilis must consist, not only in killing the treponemes, but in rendering the blood unfavourable to their reproductive functions, and resistant to the life cycle of the infective organisms. The seed, the
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OPERATING THEATRES.

PUTNEY HOSPITAL.

MALFORMATION AND HYSTEROPSIS OF THE RIGHT COSTAL CARTILAGE, CAUSING SWELLING AND PAIN—OPERATION.—Mr. Sampson has operated on a young married woman, about 30, who had been admitted to the Putney Hospital for severe localised pain in the region of the fourth right costal cartilage, which she complained was felt and was so severe that it kept her awake at night. The lump had been noticed for a month. There was definite tenderness over the right fourth costal cartilage, which was much broader than the left one and more prominent, the prominence extending to the adjoining end of the fourth rib. The X-ray examination was negative. It was thought that the swelling was tuberculous, with reservations in favour of sarcoma or gumma.

He cut down on the swelling by an incision on the line of the fourth costal cartilage and found a curious condition. The cartilage appeared quite normal in colour and condition. It was much broader than normal and showed partial dichotomy; that is to say, a small independent button left its upper margin about the mid point of the cartilage and ran obliquely upwards and inwards to articulate separately with the sternum near the third costo-sternal articulation. A small triangular area of pressure, bounded by the button, by the edge of the sternum, and by the upper edge of the fourth cartilage. In addition to being abnormally broad, the cartilage and adjoining part of the fourth rib were unduly prominent. It was thought that this depended upon an abnormal increase in the length of the costal cartilage, and about half an inch of the cartilage was carefully resected. The interval thus formed immediately closed up, the prominence of the rib and cartilage disappeared, and no swelling could any longer be felt. The button was also removed and the incision was sewn up.

Mr. Handley said that this case prior to operation was thought to be one of tubercle of the rib. The case was unique in his experience, nor was he aware of any similar one in surgical literature. The deformity of the costal cartilage must have been of congenital origin, but the overgrowth of the cartilage had evidently continued during adult life and had only recently been sufficiently marked to cause pain. The pain was apparently due to abnormal stresses in the thoracic wall set up by the elongation of the arch formed by the fourth rib and its cartilage. The patient made a good recovery and her pain was relieved.

TRANSACTIONS OF SOCIETIES.

THE NEW LONDON DERMATOLOGICAL SOCIETY.

MEETING HELD THURSDAY, OCTOBER 5TH, 1874.

Dr. G. Norman Meachen in the Chair.

The following cases were exhibited:—

Dr. Meachen showed (1) a case of alopecia areata with arsenical keratoses in a middle-aged man, who had suffered from the affection for many years on the eyebrows and scalp. He attended a skin hospital eight years ago, and received during admission arsenic and thiocyanine, which he took, intermittingly, for two years. The hair returned almost completely, but during the last six months it began to fall out again. The keratoses was chiefly seen on the lower extremities, though the same condition was seen in the upper border of the soles of the feet. There was a small patch of pigmentation upon the back. The exhibitor considered that the condition of the palms was due to arsenic.

Dr. C. G. Mack said that the case interested those of them who were general practitioners most, because...
of its relation to the time occupied in effecting a cure of the alopecia areata. If a case of alopecia were not cured within three months, it often happened that the practitioner in charge of the case was not undertaken, and that it had always been a puzzle as to what was the best form of treatment to adopt in such cases. The treatment of chronic alopecia had not advanced in the same rate of development as had done, and so it was as treatment was concerned, they were very much in the same position as they had occupied for a long time past.

Mr. T. P. Beddoes said that two years of arsenical treatment was ample in which to give keratosis. In this instance, not only was there keratosis but also pigmentation, although not the characteristic punctate, round, hard follicles. There was distinct pigmentation and involved in one spot.

Dr. G. W. Sequeira pointed out that keratosis was not always accompanied with other manifestations of arsenical toxicaxia. One could get keratosis with out the so-called arsenical symptoms. The practical point in this case was to drop the arsenic. If he (the speaker) had keratosis in his palms and was taking arsenic, he would certainly drop the arsenic, because he knew what was likely to happen and it persisted.

Mr. Dennis Vinrace said that he did not think the case was really made out to their satisfaction as one or arsenical poisoning. Obviously, the feverish circulation and the changes in the skin might be due to various causes. If the signs of arsenical poisoning were absent. There was no irritation of the eyes, no pain in the stomach, and nothing very definite at any point which indicated arsenical poisoning. The symptoms which he had been given. They ought to be expressed on the general public that there were certain things which could not be cured in a hurry. He would like to know how Dr. Mack applied the blistering in his cases of alopecia areata. Did he use blistering third. He (the speaker) had made treated cases of alopecia areata by applying an oil consisting of cantharides, croton oil, and almond oil in varying proportions.

Dr. Mack, in reply to Dr. Middelton's question, said that he awaited the patient's convenience as to blistering; fresh applications depended upon the time taken by previous blisters to heal up.

Dr. T. G. Aldrich said that he had never seen any benefit from the use of blistering in alopecia areata. It was true that the hair came back after the blistering, but in cases in which this happened the hair would probably have come back even if the blister had not been applied, and in the present instance blistering did not do any good whatever. In some of these cases Dr. Sibley had obtained good results by means of ionisation with perchloride of mercury and chlorid and sulphate of zinc.

Dr. Mack said that from the discussion of this case, said that there were two quite distinct points of interest connected with it. In the first place, was the keratosis on the palms arsenical? Arsenic had cured cases of psoriasis, but it had not been stopped the effect went on, and the bruising it might fail on the skin only. As to blistering, etc., whatever drug was employed, persistence was the keynote of success. If one particular remedy did not answer a change must be made. He did not know if he was unwise to pin one's faith absolutely to one remedy.

(a) A woman, at 71, with a scarring lesion on the centre of the nose, and a small cutaneous horn of the upper lip. The condition was said to be of six months' duration. The question which occurred to him was whether the lesion might be of the nature of a rodent nicter. There was an old scar in the palate and a history of a nasal discharge, but no other evidence of syphilis was obtained.

Dr. T. P. Beddoes urged that the patient should first be given iodide, and then have a Wassermann test performed. Somehow it happened that there were cases of Wassermann which were positive, but the patient did not respond to iodide, and cases in which the Wassermann was negative and which did respond to iodide, and cases in which the Wassermann was negative and which did respond to iodide. One should not be entirely guided by the Wassermann, but should safeguard the patient by iodide. If anyone with a Wassermann in mind, one ought to know the diagnosis of hydrocortis was a very good remedy of American introduction now official in the new Pharmacopoeia. One might see how that acted. It had been suggested that in the old theory, it was not treating the whole knowledge of the trouble on the palate, but there was some ground for believing that she attributed the former trouble to the nose and not to the palate.

(b) A case. Leucoderma with canities in a girl, at 12, with many patches of leucoderma on the body, but the most obvious thing was the band-like form of leucoderma on the forehead, extending right round by the ears and into the nape of the neck. The girl had also quite a number of grey hairs coming. The duration of the case was six months. There was no chorea; the child had not been subject to bilious attacks, and there was no concomitant illness.

Mr. Dennis Vinrace said that he had got nine cases of band alopecia which seemed to simulate this in distribution to a certain extent. In this case there was also the case of true leucoderma which was not only limited to the forehead but extended down the back, which might say that he had seen the converse of this taking place recently. The patient, who was elderly, had had canities naturally, and also alopecia, for which treatment was given by means of liquor potassa. In the places where the use of liquor potassa was brought to bear (the back), the child might have been brought to bear (the back), the patient had strange to say, developed dark brown hair. He had never seen such a phenomenon before.

Mr. T. P. Beddoes said that in this case not only was there leucoderma in the same form which there was band leucoderma around the forehead. No explanation of this was forthcoming. There was an extremely good paper by H. S. Stannus in Bio-metricus, October, 1913, on the question of leucoderma to which reference might be made. The whole question was extremely interesting, and they were always pleased to see a case. The development of dark hair in the case cited by Mr. Tinrace might have been due to the staining with liquor potassa. Mr. Vintance gave the image of a dirty, but liquor potassa a sunny brown, very much resembling, but a darker tint than peroxide.

Dr. Mack referred to a case which he had shown at one of the first meeting of the Society, which had been brought forward in the case of Addison's disease, but the opinion of the members was that there was melanoderma. He watched that case steadily for some three years, and the whole of the skin under suprarenal extract had cleared up, but the patient said he had developed these white hairs. Her eyelashes also were becoming white. She was still subject to the attacks of violent headache, sickness, and diarrhoea with rapid pulse. She put it down to disease of the suprarenal bodies. The white hair had developed since she had been off the thyroid extract. Her skin was generally normal, save that there were faint traces of slight pigmentation in the back.

Dr. H. C. Samuel cited a (1) a case of Parapsoriasis of Brocq which had been exhibited at a previous meeting of the Society, but there had now occurred some fresh
lesions which demonstrated the condition in its simple state. When the patient came before them last time, the effect of recent treatment with the Kromayer lamp had rather masked the appearance. The case differed from the cases ordinarily described owing to the subjective sensation of itching, which was not a feature of this variety of parapsoriasis as described by Brocq. One section of it was described by the Dermatological Section of the Royal Society of Medicine. Very little was to be made out at all except an slight proliferation of the lining of the artery. There was nothing at all characteristic, and that, indeed, was the feature of the parapsoriasis, that there was nothing very characteristic about the section.

Dr. MEACHEN said that parapsoriasis was a rare disease, and they seldom had the opportunity of seeing it. The case described by the organiser was of a type characteristic of the parapsoriasis as described by Brocq. The whole subject was discussed at the June meeting of the Society, and a full account of it would be found in the transactions.

(4) A CASE FOR DIAGNOSIS.

The patient was a young woman who had a furuncular-looking lesion on the outer side of the right thigh, and to all appearance also an enlargement in the groin. He wished to know whether members thought it was a furuncle, or whether there was any alternative suggestion. The lesion had been there for six months. It exuded a little serum from the surface, and a smear of some of this serum had been made, and was being examined for septic elements.

Mr. VINACE asked whether anything had been done to the lesion of a traumatic nature. It looked as if it had been incised or cut in some way. It was quite possible that it was a staphylococcic infection. There were cases on record in which secondary lesions had not shown themselves within six months.

Mr. T. P. BEDDOES said that there seemed to be no induration, and the lesion had been present for six months, which possibly might account for the disappearance of the induration. If it was a small chancre, it was the only one present, it was raised, and there was not much inflammation around it. The whole case was considered to be remarkable.

Dr. MEACHEN remarked that the case looked remarkably like a primary lesion, but they must wait until they got the result of the examination of the serum. Spiroptosis might also be considered.

Dr. D. SAMUEL, in reply, said that nothing had happened of a traumatic nature so far as he was aware. With regard to the suggestion that it was a staphylococcic infection, it was strange that the patient should not have had a similar affection in another part. Still, such infection was a possibility. He agreed with Dr. Meachen that they could not exclude primary syphilis. The gland in the groin was certainly suggestive. The fact that there was no surrounding inflammation was a point very much in favour of a chancre. There was no px exud.; on the surface there was just clear serum.

CORRESPONDENCE.
FROM OUR SPECIAL CORRESPONDENTS AT HOME.

SCOTLAND.

EDINBURGH LORD RECTORSHIP.

The formal election of Lord Kitchener as Lord Rector of the University took place on Saturday, the 24th inst. Principal Sir William Turner presided, and he was accompanied by Provost, Noel Felix, Antwerp. Lord Kitchener was nominated by the University, and the election was conducted by Prof. James Weir. He said that they had never met in an atmosphere so unique and historic. A rectorial election without rhetoric, unvillified by rotten eggs and yellow ochre, was very unusual. But the Empire looked to him who would have the farthest part in the contest were now participating in the great international drama. In proposing Lord Kitchener's name, they desired to do honour to an organiser of victory, who was at this moment the man on whose skill, courage, and sanity the whole future of the Empire depended. The nomination was carried unanimously with the greatest enthusiasm. Sir William Grant said that this was the third occasion on which a Lord Rector had been chosen without opposition. The first was when Mr. Gladstone had been chosen for a second period, the second when the Marquis of Lothian was returned. He congratulated the students on having raised at this time of great stress. They had a special responsibility resting on them in their choice of a Lord Rector, because there was no university in the British Islands which so far represented the feelings of the Empire as theirs did. He would imagine that their students were drawn from all parts of the Empire, and in electing Lord Kitchener he thought they expressed the will of the Empire as to the type of man that ought to represent them at this time. Lord Kitchener was a man of few words, but of great deeds, and the country had the fullest confidence in him. He was the right man in the right place as Secretary for War, and an ex-President Sir William, "May God defend the right."

In the afternoon the following telegram from Lord Kitchener was received at the University—

"I am very grateful and feel much honoured by the unanimous expression on the part of the University that even in the press of the work at the War Office, I shall not be unmindful of its interests.—Kitchener."

GLASGOW UNIVERSITY LORD RECTORSHIP.

The political changes for the Lord Rectorship having signified their willingness to withdraw, the Executive of the Liberal and Unionist Clubs have announced that M. Raymond Poincaré, President of the French Republic, has accepted their joint nomination for that office. The present circumstances constitute a unique opportunity of paying a tribute both to our ally, the French nation, and its distinguished and honoured President. A letter of invitation was sent to M. Poincaré through the French Ambassador, and the following was the reply—"Dear Sirs,—I did not fail to forward to the President of the French Republic the letter in which you asked him to accept the title of Lord Rector of Glasgow University. M. Poincaré has just answered me that he appreciates greatly the honour bestowed upon him, and accepts very willingly to be elected as Lord Rector of your University.—Believe me, dear Sirs, yours faithfully, PAUL CAMBOD."

SICK AND WOUNDED BELGIAN SOLDIERS.

The largest consignment of sick and wounded hitherto received in Glasgow arrived at Stobhill Hospital on 17th inst. The party consisted of about 270 Belgian soldiers. These had been transferred from the military hospitals in Belgium. They had spent varying periods until the German advance necessitated their removal across the Channel. The wounded are not seriously injured. The majority of the other patients are suffering from rheumatic affections due to exposure in the trenches.

THE LATE DR. JOHN MACPHERSON GRANT.

The late Dr. Grant, of Inverness, who died on 20th inst. from heart failure, was one of the best-known practitioners in the North of Scotland. He graduated at Edinburgh University in 1882. Being a lieutenant in H.M. Field Ambulance, Territorials, he volunteered for active service after the outbreak of the war. However, he was asked to take up special work in the Highlands, and when the 3rd Highlanders, of which he was a major, became attached to the 4th Expeditionary Force, he was made the commanding officer of the ambulance corps at the time of his death. Dr. Grant was a young man and was exceedingly popular with all classes of the community. He leaves a widow and infant daughter.

DAMNLEY HOUSE AS AN HOSPITAL.

The Earl of Rosebery having placed Dalmeny House at the disposal of the War Office, eighty sick and wounded soldiers of Scottish regiments have been accommodated in it. This mansion-house, of course, exceedingly comfortable and pleasant quarters for the patients.

MARRIATIONAT GLASGOW UNIVERSITY.

The number of male students who have matriculated...
for the winter session being 1,667, as compared with 1,951 for last winter, the large diminution due to the war and other causes. Loss, however, is not so great as might have been expected. The Officers' Training Corps is at present depleted almost to zero, but the authorities are appealing to the students to join and make themselves at least capable of home defence.

As regards women students, the number in the University this being only 11 short of the number last year. The total of matriculated students is, therefore, 2,475, as against 2,410 last year.

The Late Dr. Haldane, Stirlingshire.

Dr. William Haldane, Viewforth, Bridge of Allan, who died on Oct. 20th, studied at Edinburgh and Glasgow Universities and graduated B.C.M. at the latter in 1872, adding the degree of M.D. in 1876. In the same year he became F.F.P.S.G. and in 1891 F.R.C.S.Ed. He long resided and practised at Bridge of Allan, of which place, regarded as a health resort, he wrote and published an account. Dr. Haldane became Consulting Physician of Stirling Royal Infirmary and Medical Officer of the Parish of Logie. For a time he was also chairman of the School Board. Local public bodies, everywhere at the funeral, and among the chief mourners were Dr. W. Halliday Welsh, Edinburgh, and Dr. J. Crawford Renton, Glasgow.

Convalescent Belgians at Perth.

One hundred Belgian wounded soldiers arrived in Perth on Saturday last, and were accommodated in the old infirmary, which is under the charge of the Red Cross Society. Nearly all were in a state of convalescence, having been removed from Glasgow in order to make room for other patients.

LETTERS TO THE EDITOR.

[We do not hold ourselves responsible for the opinions expressed by our Correspondents.]

THE PATHOLOGY AND TREATMENT OF EXOPHTHALMIC GOITRE.

To the Editor of The Medical Press and Circular.

Sir,—Dr. Crookshank's brilliant and suggestive contribution to your columns on this subject (September 30th) will, I am sure, dwell long in the minds of those who had the privilege of perusing it.

In your issue for October 7th, Dr. Middleton refers to one of the many interesting points raised by Dr. Crookshank's classification of Graves' disease. I propose to call it, Parry's disease with certain types of arthritis. Some eight or ten years ago I reported in the British Medical Journal fourteen examples of the complete type of exophthalmic goitre and didactic exophthalmic goitre (the complete type existing side by side with rheumatoid arthritis). I came to the conclusion that the relationship between these two diseases was not merely one of affinity, but that they might actually overlap in one and the same patient. In the fourteen examples of the complete variety the subjects were all females, and their average age was 29.9, the oldest being 52 and the youngest 18. The previous history was of its last varied character, in one case there was a history of abscess from her fourteenth confinement, in four the cause assigned was influenza, and in these one in addition had suffered from two attacks of "rheumatism," and another from anemia. Of the rest, two gave a history of tonsillitis and rheumatism, one gastric ulcer and hematemesis, one scarlet fever, one sore throat, anemia and oozing, one again anemia, one again rheumatism, one anemia, indigestion, and sore throat, one sick with smallpox.

In two cases the symptoms of exophthalmic goitre had preceded by some years the development of rheumatoid arthritis. In the majority the two diseases apparently arose contemporaneously, but in one or two instances arthritis appeared abruptly, as it were, engraven upon a previously existing rheumatoid arthritis. At the time they came under my observation the joint troubles had existed for varying periods, the minimum being three months, and the maximum two years in duration.

In ten out of the fourteen cases there were present in addition varying degrees of local syncope and local asphyxia of the fingers.

This condition of Parry's disease and rheumatoid arthritis suggests much food for thought. Thus, it will be recollected that a rapid pulse has long been regarded as very typical of rheumatoid arthritis. But from my observations this quickened pulse rate, though frequently present in a condition which is not a bursitis, tends to manifest itself in an erratic manner in cases of rheumatoid arthritis. This raises the possibility that in some instances it may be a larval manifestation of Parry's disease.

Much interest, and possibly some profound significance, attaches to the fact that many so-called secondary features of Graves' disease occur in the subjects of rheumatoid arthritis, and this in instances presenting no symptoms of the cardinal symptoms of the former disease. Among these may be mentioned localised sweatings and fleeting oedemas of angioneurotic type, and in addition certain skin affections, such as leucoderma and scleroderma. Muscular cramps, too, simulating closely those of tetany have been observed in both diseases, likewise transitory glycosuria, while gastro-intestinal derangements and uterine disorders are common in both.

Further consideration of the overlapping nature of the two conditions might be cited, but enough has been said to indicate the need for further observations regarding the obscure kinship that appears to prevail between these two entities.

Dr. Crookshank draws attention in his paper to the association of Parry's disease with the infective types of arthritis. This I have also observed myself, and it may not be out of place to indicate the distinctions that may be drawn between rheumatoid or undifferentiated arthritis and infective arthritis, many examples of which are of undifferentiated character.

In the lack of positive bacteriological evidence we can comprehend the difficulty of affording much help is afforded us by consideration of the age incidence of rheumatoid arthritis and infective arthritis, but something may be gathered from the marked predilection of the former for the female sex. On the other hand, the recent occurrence of some infective arthritis is known to be followed occasionally by non-purulent arthritis, such as dysentery, typhoid fever, and pneumonia, will constitute presumptive evidence of an infective arthritis. Similar inferences may be drawn from the presence of any local source of infection—viz., pyorrhoea alveolaris, otorrhea, and so forth. Where such is not forthcoming, reliance must be placed on the following characters which appear to distinguish infective arthritis from rheumatoid arthritis. Thus, in infective arthritis the general symptoms are often much more acute, temperature of higher grade, enlargement of the lymphatic glands in certain cases, with or without, is almost invariable, the spleen is also more commonly enlarged, while leucocytosis and a secondary anaemia are usually present.

Regarding the articular lesions, though all, or nearly all, of the joints may be involved in any given case of infective arthritis, yet such widespread invasion is by no means the rule. What happens in the majority of instances is that at the onset the disease attains rapidly the one joint, or the few joints, which have been so done so shows no tendency to involve others, even after weeks or months have elapsed, during which the temperature may be more or less continuous of septic or irregular type. Again, the distribution of the arthritis lesions differs in the two. In infective arthritis the larger joints have the preference, but the penchant of rheumatoid arthritis is for the smaller joints, the hands and fingers. Moreover, the former disease is distributed in a symmetrical fashion, while the tendency in rheumatoid arthritis is towards symmetrical involvement of the joints.

The shape of the joint swellings in both disorders is identical—nODULES, and the outline of infection in infective arthritis presents a definite red blush in most cases, whereas in rheumatoid arthritis it is unnaturally white or bluish in colour.

Again, widespread inflammatory oedema of the affected limbs is more common in infective arthritis.
Finally, in rheumatoid arthritis, as opposed to infective arthritis, we find an abundance of collaretic phenomena. Thus, in those instances in which rheumatoid arthritis remains for some time confined to the small or local joints, the possibility of confusion with infective arthritis by this asymmetrical distribution the presence of vasomotor phenomena, neuralgic pains, or muscular cramps in the opposite hand with some in favour of its being rheumatoid in origin. This affinity on the part of exophthalmic goitre for associating itself not only with rheumatoid arthritis, but also with those infective forms of arthritis yet unclassified to any particular generic name, is strong presumptive evidence that in all probability both Parry's disease and these two forms of arthritis are alike of infective origin.

I am, Sir, yours truly,

JEWELLYN JONES LLEWELLYN.

41 Gay Street, Bath,
October 22nd, 1914.

THE MEDICAL REGISTER—LEGAL QUALIFICATION.

To the Editor of The Medical Press and Circular.

Sir,—May I once more ask you for your valuable assistance in reminding members of the profession that unless their names appear in the Medical Register they are not legally qualified medical practitioners. (Medical Act, 1858, Section 1914), and that the duty of notifying changes of address rests with them.

No person can "hold any appointment as a physician, surgeon, or other medical officer either in the military or naval services, or in an emigrant or other vessel, or in any hospital, infirmary, dispensary, or lying-in hospital, not supported wholly by voluntary contributions, or in any lunatic asylum, gaol, penitentiary, house of correction, house of industry, reformatory, or house of correction or other public establishment, body, or institution, or to any friendly or other society for affording mutual relief in sickness, infirmity, or old age, or as a medical officer's servant, unless he be registered," (Section 30) and "no certificate required by any Act now in force, or that may hereafter be passed, from any physician, surgeon, licentiate in medicine and surgery, or other medical practitioner, shall be valid unless the person signing the same be registered." (Section 37.)

The Medical Register is the only official publication, and should not be confused with any of the various directories or other so-called official circulars. No one who is not familiar with the work of this office would believe the amount of trouble which is taken in touch with practitioners, and to find them when touch has been lost; but, unless we are assisted by members of the profession ourselves, our efforts are often fruitless.

In consequence of cases which have recently occurred, it becomes increasingly important every year that the Registrar should carry out his work and upon him under section 14 of removing from the Register the names of practitioners with whom he cannot communicate. It is done with reluctance, but only by means can the public be properly protected, and by remaining in communication the duty is performed on the Register. No doubt cases of hardship do sometimes arise in consequence of this removal of names, but every possible source of information is made use of to save practitioners from the results of their carelessly omitted duty, and are inadvisable by finding that their names are off the Register, the blame does not rest with this office.

Perhaps I may add that, by a recent regulation, practitioners possessing particular acquaintance, the Dental Register (Medical Act), may register in the Dentists' Register (or vice versa) for a reduced fee of £2 18s., instead of £5 18s. I should also like to take the opportunity of drawing the attention of those already under the superintendence of the Dental Register (or vice versa) for the reduced fee of £2 18s., instead of £5 18s.

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DR. H. CRICHTON MILLER ON INSOMNIA.

To the Editor of The Medical Press and Circular.

Sir,—If only to express my personal thanks and admiration, I trust you will give me a few lines for comment on Dr. H. Crichton Miller's super-excellent lecture on "Insomnia." Since the long series began it has been my custom to cut out of your pages those of the lectures that seemed worth preserving for future reference, and to classify them in portfolios. This year I have been doing with Dr. Crichton Miller. It forms the best concise epitome of the subject that I am at present acquainted with; and although I may not be able to write literary English myself, I am quite able to recognise that quality in the lecture that makes it a "superior." The lecture brings out one of the foremost points of the topic most clearly—the difference between true insomnia and mere restlessness or sleeplessness due to some merely physical and often trivial cause. I am treating such a case now. The patient is a highly intellectual man, 72 years old. He is suffering from high blood-pressure with arterial degeneracy, and a constant sensation of a modified vertigo, following a severe attack a year ago. For some time there was added to these what was termed "insomnia." The patient, on going to bed at about 10.30, was kept awake through great part of the night by slight colic and much flatulence. It was found that the whole mischief was due to the fact...
that the patient was incapable of digesting any form of vegetable fibre, cooked or uncooked. He was making his principal meal in the middle of the day, and including in fair quantity of lettuce and cucumber, which were, however, fresh from his own garden. He has now been restricted to a small quantity of ripe fruit, without rind or seed, at breakfast, and to cooked vegetable portions, and a daily mixture of vegetables, and thoroughly braised uninfused parts of celery and lettuce at his midday dinner. His evening meal includes no vegetable. His bowels are, of course, properly regulated. He is always hungry, but takes no more than a refreshing night's sleep. He sleeps also for a short time after his midday meal. His condition has vastly improved, the "insomnia," no longer torments him, and he has ceased to worry over and magnify constantly the troubles of life, including the war. The war, by the way, is giving sleepless nights to many loving souls anxious about their kin at the front. For these I know no cure. Occupation and preoccupation in helpful work brings them little solace and no peace of mind.

I am, Sir, yours truly,

An OBSERC PRACIEER.

October 15th, 1914.

FORCIBLE FEEDING.

To the Editor of The Medical Press and Circular.

SIR,—Let me once more point out to Dr. Sers, that my object is to clear our profession from the disgrace of being the executioners in our prisons of a form of torture which it is now admitted is not medical treatment, but a means of terrorising prisoners.

That forcible feeding, like the Cat and Mouse Act, has failed to crush down the desire of women to be not slaves but free citizens of their own country for which they have done so much, and who are more in this war-time, is, of course, only natural. Such failure is the inevitable end of despotie reaction, which, as all history shows, is reduced to employing such haustes means as physical torture when it is resisting a movement for political enfranchisement. Dr. Sers does too much honour to the Cat and Mouse Act by calling it a "weapon." If he would only study and analyse it, he would find (as I showed in my letter to you dated 12th September last year) it violates all principles of British law from Magna Charta onwards. It is a monumental piece of folly as an act of legislation, and, as I pointed out at Leicester a year ago, it was also for medicinal reasons bound to fail. To this our present moment I have already shown (August 20th, 1914) our prison Medical Officers are in a dual capacity viz., firstly as members of an honourable profession, whose duty is the relief of disease and pain; and, secondly, as members of the police force, whose duty may be the infliction of pain as executioners.

I again appeal to Dr. Sers to help in removing this stain on our name and on our honour.

I am, Sir, yours truly,

VICTOR HORSLEY.

London.

October 20th, 1914.

[This correspondence must now be considered at an end.'—Ed. M. P. AND Cj]

THE NATIONAL MEDICAL UNION AND THE £900,000 WINDBLOWN TO PANEL DOCTORS.

To the Editor of The Medical Press and Circular.

Sirs,—In the interest of the general public and the medical profession, the Council of the National Medical Union have deemed it expedient to lodge with the Insurance Commissioners a protest against the allotment of their £900,000 medical benefit surplus. This surplus has accrued because nearly a quarter of a million insured persons would not elect a panel doctor to attend them during illness, and because the authorities entrusted with the fulfilment of the

National Health Insurance Act did not distribute these insured persons severally amongst the panel doctors, and did thus disregard Section 15 (2) (d) of the Act, which provides for such system as will secure "the distribution amongst, and, so far as practicable, under arrangements made by, the several practitioners whose names are on the lists, of the insured persons who after due notice have failed to make any selection, or who have been refused by the practitioner whom they have selected."

Moreover, according to Section 14 (1) of the Act, it is provided that the lists shall be in all cases administered by and through the Insurance Committees and not by the Commissioners.

I am, Sir, yours truly,

VIVIAN T. GREENEYER.

Chairman of Council of National Medical Union.

346 Strand, London, W.C.

WHEATMEAL OR OATMEAL BISCUITS FOR THE TROOPS IN WINTER.

To the Editor of The Medical Press and Circular.

Sirs,—Will you allow me to suggest the above biscuits as being far more nutritious and supporting for our soldiers on active service than the white biscuits which they now have in France, from which most of the nutritive ingredients are extracted by the steel mills.

Wheatmeal bread is vastly superior to the white bread in general use, for, besides containing 30 per cent, more flesh-forming material, Liebig states that it has 200 per cent. more phosphatic salts to nourish the brain, nerves and tissues, and form strong bones and teeth. Its use cannot, therefore, be too highly recommended for both rich and poor, but it is especially necessary during the period of development and growth, when the bones and tissues require very active repair. One shilling's worth of wheatmeal bread contains three times more flesh-forming material, seventy times more heat-producing material, and three times more bone-forming material than a shilling's worth of beef. Hence the wisdom of adopting wholesome or brown bread in place of white as an article of diet.

I am, Sir, yours truly,

Bishop's Waltham.

October 21st, 1914.

PRISONERS OF WAR—A CORRECTION.

To the Editor of The Medical Press and Circular.

Sirs,—In your issue for October 14, among the list of those R.A.M.C. officers unofficially reported prisoners of war appears the name "Captain R. J. Coghill, R.M.C."

I may add that he and Capt. W. J. Thompson, nephew of Dr. Thompson, of Omaha, Ex-M.P., are prisoners of war at Paderborn, some 60 miles from Hanover. Both were in excellent health on October 1st, when the last news came through.

I am, Sir, yours truly,

FRANCIS KENNEDY CAHILL, F.R.C.S.I.

Dublin.

October 21st, 1914.

OBITUARY.

DR. A. H. H. MUMTRY.

We regret to announce the death of Dr. Alexander Hay Hill Mumtrty, who passed away on the 15th inst. at his residence, Cumlin Road, Belfast. The deceased, who had been ill for about three months, was born at Ballyvare in 1843, and at the age of seventeen he entered Queen's College, where he had a very successful career. He graduated as doctor of medicine with second-class honours in 1867, and as master of surgery in the following year. Dr. Mumtrty commenced practice on his own account in North Street, and almost the whole of his professional life
was spent in Belfast. He built up a very large practice, chiefly among the working classes. On two occasions his patients showed their gratitude and appreciation by making him the recipient of handsome presents. At college he acquired a strong love of Latin and Greek, and later he made a study of Hebrew, French, German, and Italian. His linguistic abilities were put to good use, and enabled him to make some very clear and capable translations from French to English. He was an ardent temperance reformer, and was indefatigable in his efforts to secure a drastic amendment of the licensing laws and to bring about a change in public opinion. He was a member of the Temperance League, for twenty years, and edited its monthly journal from 1889 to 1893; while he had the distinction of being one of the founders of the Independent Order of Good Templars. In recognition of his real and services in the causes, in 1890 he was awarded a diploma and a "Medaille d'Honneur" by the "Société Nationale d'Encouragement an Bien," whose tribute he highly valued. The deceased did not take any part in politics; temperance reform was his one great passion, and at election times he was wont to give his support to the candidate who proved himself most in accord with his views on that question. He is survived by his widow and a family of one son and three daughters, with whom much sympathy will be felt in their sad bereavement.

MEDICAL NEWS AND PASS LISTS.

Royal College of Surgeons of England.

The annual meeting of Fellows and Members will be held at the College on Thursday, Nov. 19th, at 3 o'clock p.m., when a report from the Council will be laid before the meeting.

Fellows and Members can obtain copies of the report upon application to the Secretary, and can, if they desire, have their names placed on the list of those to whom the report is sent annually.

Motions to be brought forward at the meeting must be signed by the mover, or by the mover and other Fellows and Members, and must be received by the Secretary not later than Nov. 9th.

St. John Ambulance Brigade in Ireland.

It has been announced that the War Office has made Ireland an official District (No. 12) of the St. John Ambulance Brigade, with headquarters at 4 Fitzwilliam Place. Dr. Lumsden will act as Deputy Commissioner, Dr. Pringle as District Superintendant, Dr. Ella Webb as District Lady Superintendant, Captain Stevenson as District Surgeon, Miss Blundford as District Secretary, Dr. Geo. Cope as District Treasurer, Dr. Wynne as District Inspector of Stores, and Miss the Hon. Dorothy Holmes, who was in charge of the Irish hospital in the South African war, as Lady Corps Superintendant.

University of Cambridge.

The following degrees have been conferred:—

M.D.—R. F. Higgins, Cairns.
M.A.—E. H. Strugnell, Trinity; E. F. Tozer, St. John's; J. Christi; M.B. and B.C.—L. E. S. Sharp, Trinity; C. G. H. Moore, Cairns.

Society of Apothecaries of London.

The following candidates passed the necessary examinations, October, 1914, and have been awarded the L.S.A., diploma of the Society entitling them to practice as chemists in surgery and midwifery:—P. H. Burton and J. Stephenson.

Trinity College, Dublin.


University College, Cork.

The following candidates have passed the Autumn examinations, 1914:—


Chemistry and Physics.—Thomas J. Coakley, James Cuddigan, Denis Sheahan.

Botany and Zoology.—William H. Kelleher, Edward G. O'Gorman.


Second Dental.—William F. Foley.


M.D. Degree.—First Class Honours: Thomas P. O.B. Magnier.

University College, Galway.

The following are the recommendations of the Examiners at the Autumn Examinations, 1914:—


D.Sc. Degree.—The Examiners recommend the following candidates for the degree of D.Sc., for published work on Chemistry:—Rosalind Clarke, B.A., Arthur J. W. Compton, B.A., B.C.H., B.C.O., Frederick Sheppard, B.Sc.


First Medical Examination.—Pass: James Drury, Edmund J. Keenan.

Pass in Part II (Biology).—Patrick J. Clancy, Patrick J. MacAllon.

University of Glasgow.

In the Second Professional Examination (Old or New Ordinance) and Third Professional Examination (New Ordinance), the following candidates have passed in the subjects indicated (A. anatomy: F. physiology; M. materia medica and therapeutics):—

William Adams (A.P.), John Ashforth (A.P.), George W. Allan (A.P.), John Ashforth (A.P.), Alexander


In the Third Professional Examination (Old or New Ordinance) and Fourth Professional Examination (New Ordinance) the following candidates have passed in the subjects indicated (P.: Pathology; M.: Medical Jurisprudence; B.: Biochemistry; H.: Hygiene)

William D. Allan (P.), William Baird (P.), Joseph F. Bannen (P.), Thomas Blackwood (P.), Archibald C. Brown (P.), Henry D. Brown (P.), John A. Buchanan (P.), Stuart E. A. Buckley (P.), Duncan Cameron (P.), David M. Callender (P.), William G. B. E. B. B. (P.), Dugald S. Campbell (M.), William Campbell (P.), Michael W. Campbell (P.), Joseph Chalmers (P.), David Clyde (P.), William K. Connell (P.), Alexander I. Cook (P.), Archibald S. Cook (P.), Walter G. Cook (P.), John C. Crawford (P.), Alexander Curle (P.), John M. M. Caillou (P.), Robert Cunningham (P.), Alexander Dick (M.), Ronald S. Dickie (P.), William Donald (M.), Samuel N. Dykes (P.), Lewis L. Fotheringham (P.), Matthew M. Frew (P.), David C. Gardiner (M.), Robert Gibson, B.Sc., M.B., F.R.C.S. (P.), Samuel H. Henderson (P.), Stewart Johnstone (P.), George Kirkhope (P.), John C. Knox, B.Sc. (M.), Robert Kyle (P.), James A. Leiper (P.), Robert Lindsay, M.A. (P.), Hugh L. McCormack (P.), Donald K. MacDougall (P.),

David M'Farlane (M.), James W. Macfarlane (P.), John M. Macfie (M.), John MacInnes (P.), James M. MacKay (P.), Keith S. Macy (P.), Alexander P. McCullough (P.), David M. Neil, B.Sc. (M.), M. E. J. MacPhail (P.), Noah Morris, B.Sc. (P.), Alexander M. Morton (P.), John H. Murray (M.), William O'Brien (P.), Arthur W. Panton (P.), Thomas S. Paterson (M.), James H. Paul, M.A., B.Sc. (P.), William J. Poole (M.), W. V. Pringle (M.), Joseph R. O'Hara, B.Sc. (M.), James Richardson (P.), Robert Rodger (P.), George W. Ronaldson (P.), Alexander F. Ross (P.), Kenneth M. Ross (P.), Angus M. Scott (P.), William F. Shanks (M.), James Steel (P.), John Steele (P.), Archibald Sim (P.), John Eggber (P.), John Stirling, B.Sc. (M.), George C. Swanson (P.), Robert Taylor (P.), Herbert W. Torrance (P.), John D. Watson (P.), William J. C. Watt (P.), Robert J. Wilson (P.), M.A.

Women—Mildred A. Buchanan (P.), Maud C. Cairney (P.), Ann K. Cormack (M.), Winifred J. Crawford (P.), Jane B. Davidson (P.), Jessie C. Gilchrist (P.), Jean L. Hamilton (P.), Janet F. Henderson (M.), Helen and Kitty (A.), Frederic H. M. Logan.

At the Royal College of Surgeons of Edinburgh, on October 21st, 1914, the following gentlemen, having passed the requisite examinations, between July 6th and 11th, 1914, were admitted Fellows:


Royal College of Surgeons of Edinburgh.

At a meeting of the College held on October 21st, the following gentlemen, having passed the requisite examinations, between July 6th and 11th, 1914, were admitted Fellows:


The Right Hon. Christopher John Nixon, first baronet, P.C., M.D., LL.D., aged 61, of 2, Merrion Square North, Dublin, and of Roebeek Grove, Milltown, Co. Dublin, D.L., a former President of the Royal College of Physicians in Ireland, left personal estate in the United Kingdom valued at £41,637.
MEDICAL WAR ITEMS.

The following interesting article, under the title "Among the Wounded," by L. Haden Guest, M.R.C.S., appeared in Reynolds's Newspaper for the 25th inst.

"I have just returned from France, where one sees the horrors of war at close quarters. By the time this article appears I shall have returned again to France. On September 29th we set out—surgeons, anaesthetists and nurses—to establish hospital units at Limoges.

Ten tents were sent on by the Marquis of Bucquoy, and the remainder followed us a couple of days later. One of our party, Sister Beatrice, returned to tell of the state of affairs in Limoges. We have seen something of the terror of war, and none of it is a little of its glory—bodies that are infected, and spirits pass through it untroubled, or strengthened.

"At Limoges, General Pefelec, commanding the Twelfth Region, placed at our disposal an art school and the Musée Ceramique de Bouchée. Expeditionally we made the necessary alterations, completing them in four days. On the third day we commenced to admit wounded, and in a week we had 150 of them. The French authorities, whose courtesy we have not been gratified, placed at our disposal a body of soldiers and two military inter- preters. One of these latter is a volunteer. He had just been appointed Professor of Languages at Lille University, and has volunteered to give service. The other, also a University man, is a reservist who had already been wounded at the front. We had a military motor car placed at our disposal, driven, by the way, the Marquis of de la Motte. He also is a full private. Once in working order, our unit soon made itselffelt. It was surely no bad compliment to us that the French authorities released for service at the front ten of their surgeons who had been working at Limoges.

"That our work is a necessary one admits of no doubt. For so many wounded the French Red Cross arrangements are not at this time time enough. The state affairs tend definitely to improve as far as the treatment of wounded is concerned, but the numbers are, of course, increasing, and with them the need. The morale of the organisation is improving, and we are getting a hold on things.

"The kind of wounds we have to deal with is an exceedingly severe one, of which inflicted by shrapnel under artillery fire are the worst. The men are wounded in many places, and combined treatments of bone and flesh. The modern pointed bullet, too, is an extremely destructive thing. It doesn't go straight through, but turns and produces a lacerated wound. This must not be confused with the much-discussed 'dum-dum' bullet, and so, unfortunately, I personally have seen no evidence of these having been used, but I have seen very large wounds undoubtedly caused by the pointed bullet. The worst feature of the wounds arises from the fact that the patients usually reach us some days after the first field dressing. In the interval the men are travelling in railway trucks, and there is no fresh dressing. The result is that they are in an exceedingly septic condition. Gaseous gangrene is very common, and sometimes rapidly fatal. The fighting takes place on cultivated ground, which has been manured for generations, and where the drainage is thick. This is precisely the sort of ground in which the term of gaseous gangrene has its origin. The rapid development of the former complaint is astonishing. I have seen the case of a man wounded on a Monday, whose arm by the following Thursday was black, hot and gaseous. There was no evidence of any lactic injection, and the wound was not a hole in the case of tetanus, and since we have been using the serum in the hospital we have had no cases of this complaint. But the supply is short.

"I have referred to our Marquis-chansoaneur. The rally of all our party with this common service is one of the most striking and pleasing features of our work. Some of the best-known people in European society visit us. Here is an incident which serves to indicate the extent to which 'it's all the same to-day.' I asked one of our bearers what was the price of electric light in Paris. He paused in the work of looking after bedding to assure me that he didn't know. His valet always paid his electric bill.

"'Gruesome sights?' Of course there are plenty. Some with which I shall not gratuitously horrify my readers. When we removed the bandages from a patient at Montreuil, we found that all his face had gone, save the upper half of the jaw. The.-jaw. The vocal cord was visible. One night we had the eerie experience of a bass voice calling pitifully for 'Mummy.' A soldier, shot in the head, had become insane, literally, an idiot crying in the night. We had seven deaths in one night in twenty-five beds.

"We have now two units—one at Paris, under the Union des Femmes de France, and one at the Hospital Militaire Anglais at Lons-le-Saunier. For the military authorities, I have the money to establish two others, and there are many places in which this work could be done. I have visited Bordeaux, and have had offers of several agree to give similar facilities to officers, soldiers, and sailors injured in hospital. The Buxton Council has resolved that officers, soldiers, and sailors of the Allied Forces erned to Buxton shall receive the Buxton mineral water treatment free of cost. The proprietors of the Detricich and Brine Bath have agreed to give similar facilities to officers, soldiers, and sailors injured in hospital.

"The committee of the Allied Forces Base Hospital, of which the Duchess of Roxburghe is president and Sir S tarr Jameson chairman, is making arrangements for the additional hospital, which is fully equipped, is installed at the Hotel Christol, Boulogne, close to the railway station, where the trains with wounded from the front arrive. Six motor-ambulances have been given to the hospital, and a special railway line can be run from the firing line and treated as efficiently as they could be in London.

"The Metropolitan Asylums Board have placed the Park Hospital, Hither Green, at the disposal of the Refugees Committee as a temporary home. The institution is undergoing preparation for being utilised again as a fever hospital, and the children patients which have hitherto been treated there had left. The other day 600 fugitives of all descriptions, who had been traitors or others who were not medical aid, who had reached Folkestone during the morning, arrived with their families and were received by Dr. Birdwood, the Medical Superintendent.

"A medical and surgical unit will leave Southampton to-morrow en route to Malta. Salomons of Liverpool are arranging to send the Serbian Relief Fund, aided by the Order of St. John of Jerusalem, for the assistance of the sick and wounded of Serbia. Prof. Morrison, F.R.C.S., Senior Surgeon of the Queen's Hospital, Birmingham, is Surgeon-in-Chief of the expedition, which consists of our fifty persons.

"Dr. Barty King will give a lecture, illustrated by the epidiascope, on 'Germany in War Time,' with an account of his experiences amongst the German wounded, to the nurses of the Trenchmen's Hospital of the Royal Hospital for Diseases of the Chest, City Road, in the lecture theatre, on Tuesday, Nov. 3rd.
Intravenous Ether Anesthesia.—Kummell (Surg., Gyn. and Obst., xix., 3) used this method in 250 cases, and considers intravenous anesthesia especially fitting for operations in the lower abdomen, hence on the lower limbs and neck, as it gets over the trouble of the anaesthetist being in the way and delay in operation by incomplete anesthesia. The method has turned out surprisingly well in 30 cases of tumour of the jaw. In the case of patients who were weak the method had advantages, and the anesthetic could be given in conjunction with saline solution. Such patients often leave the operation with stronger and better heart action. Vomiting and nausea after laparotomies were never noticed. Thromboses at the site of the injection were frequent in the early cases. In those cases of carcinoma which died soon after operation, it was found that when the ether and salt solution was allowed to stand in the vein for a while, the vein became thick, hard, thrombosed partially, and partially closing the collateral vessels. In a later group by an improved method, and where the stream was continuous, there was no case of thrombosis. One case of pulmonary tuberculosis was prevented from being made worse, and in a case of amyloid kidney there was an increase of albumin in the urine for a few days. No change could be demonstrated in the blood. The anesthetic has been given for 140 minutes, during which time 1,700 c.c. of the ether solution was used, equal to 8 gm. of ether. Before continuous injections were started, there were two cases that became cyanotic, and one that required artificial respiration. The practice should be adopted in 1 per cent. solution of isosor is considered a good supplement in inducing intravenous ether anesthesia.

The Levator Ani Muscle in Perineorrhaphy.—Jellett (Surg., Gyn. and Obst., xix., 3), dealing with the suturing of the levator ani in perineorrhaphy, shows that this is not difficult and is not followed by any risk. The practice should be adopted in all operations for the repair of the perineum, and is an essential part of successful operations. The method has been adopted in 356 cases without any unpleasant after results. The essential feature of the operation is the careful dissection of the necessary amount of vaginal mucous membrane from the rectum, the exposure and suture of the separated levator ani muscle, the careful approximation of the cut edges of the vaginal mucous membrane, in such a manner as to leave no projection or redundancy. The operation is fully described. In conclusion, it is stated that routine suture of the levator ani is always practicable, except when the muscle is wanting owing to atrophy after injury. Such absence is very rare, and when it occurs it is impossible to reconstruct the perineum satisfactorily. The exposure and suture of the levator ani is neither difficult nor dangerous.

Mastitis Lactantia.—Keves (Surg., Gyn. and Obst., xix., 3) classifies the inflammations that may occur in the mammary gland during nursing into supra-mammary by infection gaining the superficial skin adhesion outside the nipple area; true mammary infections which are either primarily intraductal and intra-acinous or extra-acinous from infection of the stroma lymphatics by contiguity—from a primary infection of the breasts; and infections of the mammary gland periphery, and haematogenous, as in mumps. The care of the breast before and during lactation is considered, and diagrams included to illustrate the various sites of abscess formation, and the treatment of inflammation discussed.

Complete Prolapse of the Uterus.—Novak (Surg., Gyn. and Obst., xix., 3), dealing with the surgical treatment of this condition, says that no other operation offers as great a probability of permanent cure, does the Watkins-Schauta operation. It is decidedly a major one. Unless the uterus is very small and atrophic, so that it offers no support to the bladder, it is useless to try. In an atrophic uterus it is better to retain it. The cervix should be amputated only when long and hypertrophic, or when eroded. A well-done perineorrhaphy is essential for success. Some cases are briefly noted in which there is a subsequent falling of the uterus after operation, and from the description given it appears they are true cases of uterine prolapse, while the successful cases are either vaginal prolapse or partial uterine prolapse, and the failures are due to neglect of the necessary support of the cervix at a proper level at the same time as the interposition operation is performed.

Syphilis of the Lung.—Burnham (Boston Med. and Surg. Jnl., September 10th, 1914) considers that syphilis of the lung, though admittedly of intrequent occurrence, deserves much more attention than it is at present given to it. He records the case of a patient who, presenting symptoms of lung trouble, was believed to have tuberculosis of the lungs. In spite of the fact that no tubercle bacilli were found in the sputum, she was admitted to a sanatorium, which, however, she left after one month's residence, against the advice of the medical officer. Her disease was at that time diagnosed as advanced tuberculosis. She was subsequently seen by two practitioners at different times, each of whom made a diagnosis. Seven months after she left the sanatorium she came under the care of Dr. Burnham, who, owing to the absence of tubercle bacilli in the sputum, and the presence of a strongly positive Wassermann reaction, decided that she was suffering from syphilis of the lung. Her condition rapidly improved on antisyphilitic treatment, and within a month all symptoms of lung trouble had disappeared. Burnham concludes that syphilis produces in the lung pathological changes, which in turn produce symptoms and physical signs that are identical with those produced by pulmonary tuberculosis. So much is this the case that the two conditions are confounded. The most skilful diagnosticians, and great injustice is done to the patient and great suffering inflicted on his family by sending him to a tuberculosis sanatorium. Patients who present the symptoms of tuberculosis of the lungs with open lesions, yet in whose sputum tubercle bacilli cannot be found, should be very carefully examined for any evidence of syphilitic infection.

A Second Infection with Syphilis.—Corbus (New York Med. Jnl., September 5th, 1914) records the case of a man, aged 25, who in January, 1911, presented himself for treatment with well-marked secondary syphilis. During the year 1911 he was given four injections of 0.6 gm. of salvarsan, and in the intervals between the injections he used continuous, vigorous mercury rubbings. Repeated Wassermann examinations were made from the time he came under observation, till the result was obtained after May, 1911, some three months after the second dose of salvarsan. The patient remained quite well till February of this year when he was again submitted to the injection of syphilis, but was soon after found to have a sore which was followed by secondary symptoms some six weeks later. A Wassermann examination of the blood made at this time was found to be strongly positive, though the reaction in the cerebro-spinal fluid was negative.
Syphilis of the Nervous System.—Mitchell (New York Med. Jnl., September 26th, 1914) reviews the recent developments in our understanding of syphilis of the central nervous system. He believes that our present knowledge of syphilis of the nervous system justifies special emphasis being laid on the following points. The so-called parasympathics in the earlier stages of syphilis may be late specific lesions due to the presence of Treponema pallidum in the affected tissues, and hence the concept of parasympathetic disease is no longer tenable. A small percentage of parasympathics is clearly understood, manifest types of cerebro-spinal syphilis which have always been specially resistant to any known treatment. Thorough and intensive treatment, aiming to destroy the last spirochete in the early stages, offer the best known preventive. The efficacy of such treatment can be determined only by the use of laboratory methods, which should be employed in all cases of syphilis. Study of the cerebro-spinal fluid is implicity demanded in the diagnosis of syphilis of the nervous system. Intraspinal treatment offers some hope of checking the disease, and is the only route by which "spirochaetidal" agents can be brought directly in contact with the whole cerebro-spinal fluid. More general application of this measure and longer observation of the patients thus treated are needed for the final estimation of its therapeutic value.

K.

REVIEWS OF BOOKS.

MORRISONS DAVIES’ MINOR SURGERY. (a)

The present is a fitting time for the appearance of a new edition of Morrissont Davies’ well-known little manual of minor surgery and bandaging. Any practical or newly qualified man undertaking Army or Red Cross work could have no handier companion in his kit for general reference. Modern surgery is so rapid in its advances that it becomes absolutely necessary for the medical man to immerse himself in recent methods from time to time. The book contains a large amount of information not given in the formal treatises on surgery, and its perusal will impart a good deal of knowledge that could otherwise be acquired only as the result of a great expenditure of time and labour. The author’s treatment of the subject is eminently practical, witness the first two chapters, in which he deals with asepsis, preparation for operating, and the routine of a preliminary examination of the patient. It seems with practical hints that might easily elude recognition or escape the memory, as, for instance, the fact mentioned that if iron is employed by cautery, and if iodine dressings are to be used, they must be moistened with spirit, but that the glove should be drawn over the lower end of the surgeon’s sleeve, so that any loose water may be absorbed, and so on and so forth. The whole of the text dealing with the simpler operations is of special value in a book of this kind under notice. Needless to say, the safety of the patient may be determined by that after-care which is rarely given in the hands of the surgeon. The relief of thirst by giving the patient plenty of water is advocated, and the old idea of allowing only occasional sips of water is very properly condemned. Under constipation we note that no mention is made of the use of olive oil, which might be used with advantage to replace olive oil in enemata, as a more effectual and less costly lubricant. A useful warning is given against poisoning by antiseptics, a complication that is sometimes overlooked. A clear description is given of transfusion and infusion. Transfusion has now become a fairly perfect operation, thanks to the work of Crete, Carrell and others. The need of scientific exactitude in its performance is abundantly indicated in the description of the method of drawing the blood of the donor must be tested with that of the recipient to ensure the existence of affinity between them, else the former will haemolyse the latter, and the recipient will die. During the transfusion the recipient’s arm is bandaged above and below the injected arm. The Wassermann test of the donor’s blood must of course be negative. It is obvious that under these circumstances transfusion is not an operation for an emergency, as a day or two must elapse for the application of the blood tests. The technique of intravenous infusion is described, with the usual exposure of veins and ligatures. It might be noted, as a tip of the tongue, that the use of a syringe, of which is injected into the distended vein, as in the administration of salvarsan. With a little management several syringes might be thus introduced. The old good-fashioned leech is mentioned, but it is added that “a much cleaner way of abstracting blood is Heurtoups artificial leech.” There is no need to go into detail over the rest of the chapters, because there is a large number, with the large variety of special subjects included under the head of minor surgery. The smaller surgical operations are well described, and there is a capital section on fractures and dislocations. It would be difficult to name a better book of the kind of the medical man contemplating or actually engaged in active service.

ORGANIC CHEMISTRY. (a)

The chief value of this book lies in the very comprehensive expositions of formule which the author supplies. It is intended for use among candidates for the examination of the lower examination in the Board of Education Examinations in Science and Technology. It is also intended for the use of candidates for the medical examinations in organic chemistry. The subject is handled in an elementary manner which renders it easily studied by anyone who possesses a modicum of knowledge in inorganic chemistry. Dr. Clarke in his introductory chapter already clears away many of the difficulties which might be attached to mastering the subject, and is accompanied by many illustrative, and in spite of the fact that this popular little manual has attained the dignity of a fifteenth edition, it has been kept within a modest compass. It would be difficult to name a better book of the kind for the medical man contemplating or actually engaged in active service.

NOTICES TO CORRESPONDENTS, &c.

For Correspondents requiring a reply in this column a particular request is made to state the name of the paper or journal, and to avoid the practice of signing themselves “Reader,” “Subscriber,” “Old Subscriber,” etc. Such confusion will be spared as much as possible to the reader. The reader will also be spared the trouble of forwarding communications on behalf of others. Terms must be prepaid, no thanks being given at home or abroad. Foreign subscriptions must be paid in advance. For India, Messrs. Thacker, Spink & Co., Messrs. Blackwood & Sons are our special agents for Canada. For South Africa, the Messrs. Purnell & Sons act as our agents. For Australia, the Messrs. Geo. Robertson and Co., of Sydney and Melbourne, are our special agents for Australia.

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Small announcements of Practices, Accommodations, Vacancies, Books, etc.—Seven lines or under (70 words), 4s. 6d. per line, and paid in advance.

PRINTER.—Reprints of articles appearing in this Journal can be had, providing authors give notice to the publisher or printer before the type has been distributed. This should be done when returning proofs.

THE POLYCLINIC.

Our readers, together with all friends and supporters of the Medical Graduates' College and Polyclinic, Chesham Place, Grosvenor Place, London, will learn with regret that its work came to an end last week. The attempt to keep it in support, carried by the absorbing interest naturally taken in the war, has been found impossible, owing to the work of the institution. It is earnestly to be hoped that some means may be found in the future of perpetuating the memory of its illustrious founder, Sir Joseph Lister, who so nobly established a kind of post-graduate scheme, even though upon a smaller scale.

J. K. tetings can be had for examinations. This series of meetings has been advertised in the newspapers for three months offering an increasing salary from £180 upwards, with furnished rooms, etc., with no success, yet in times of peace this post yielding excellent remuneration is not supposed to be sought for. Certainly, the war has benefited the profession indirectly.

Observer (Glasgow).—Your letter is held over on account of pressure on our space this week.

L.R.C.P., M.R.C.S. (London).—See reply to "Observer.”

Meetings of the Societies, Lectures, &c.

WEDNESDAY, October 24th.
HUNTERIAN SOCIETY (Barber's Hall, Monkwell Street, E.C.).—10 p.m.: Presidential Address.—Dr. T. G. Lyon: The Barber-Surgeons and their work.

ROYAL COLLEGE OF SURGONS OF ENGLAND (Lincoln's Inn Fields).—W.C.: Museum Demonstrations for Advanced Students and Medical Practitioners.—5.30 p.m.: Professor W. Colyer, Specimens of Deutsofthicle Acousis and Dyceal Dent.

ROYAL COLLEGE OF SURGONS OF ENGLAND (Lincoln's Inn Fields).—W.C.: Museum Demonstrations for Advanced Students and Medical Practitioners.—5 p.m.: Prof. A. Keith, Gunshot Injuries of the Throat and Abdomen.

TUESDAY, November 3rd.
ROSENBERG SOCIETY (at the Institution of Electrical Engineers) —8.15 p.m.: Presidential Address.

Vacancies.

BIRMINGHAM GENERAL HOSPITAL.—Junior Assistant Medical Officer, Salary £200 per annum, with furnished apartments, board, laundry, etc. Applications to the Medical Superintendent.

NOTTINGHAM GENERAL HOSPITAL.—Senior House Physician. Salary £150 per annum, with furnished room in the medical building, free use of the hospital. Applications to the Secretary.

HUME DISPENSARY, Dale Street, Stretford Road, Manchester.—House Surgeon, duly registered and fully qualified salary £100 per annum. Annual increase £20 to £200, with apartments, board and lodging. Applications to the Secretary.

COUNTY AND CITY ASYLUM, FETCHWORTH, WORCESTERSHIRE.—Junior Assistant Medical Officer. Salary £200 per annum, board, lodging, and washing. Applications to the Medical Superintendent as above.

STRETFORD HOSPITAL.—General House Surgeon. Salary £200 per annum, board, lodging, and washing. Applications to the Hon. Secretary, the Hospital, Stroud.

Young, James, M.B.Edin., Clinical Tutor in the Edinburgh Royal Infirmary.

Deaths.

ACREY—On October 29th, at Hoyton, Herts, the wife of Harold Ackroyd, M.D., of a son.

BARTON—On October 22nd, at Keswick, West End Avenue, Gosforth, Newcastle-on-Tyne, the wife of Dr. J. Frank Barton, M.B., of a daughter.

DAILY—On October 29th, at 19, Wimpole Street W., the wife of J. F. Halls Daily, M.D., M.R.C.P., of a daughter.

FENTON—On October 24th at 69, Woodfield Road, Ealing, W., the wife of W. M. Arthur Fenton, M.D., of a daughter.

FINCH—On October 30th, at The Bridge House, Horfield, the wife of Capt. D. O. Fincham, M.D., of a daughter.

HENDERSON—On October 22nd, at Alvany, Amersham, Bucks, the wife of H. J. Henderson, M.B., B.B. C., of a son.

LINDSAY—On October 24th, at Quorn, Leics, the wife of the Rev. Dr. H. D. Macdonald, Vicar, of a daughter.

SMYTH—On October 25th, at 69, Queen Anne Street, W., the wife of Francis E. Shipway, M.A., M.D., of a daughter.

Marriages.

CHALLENOR—THOMSON—On October 29th, in the presence of the Rev. J. H. W. Challenor, C.M., of the Church of England, at Miss Ann Collis, 3, Clarendon Lodge, Yatton, Sussex, to Marie Adele, eldest daughter of Mr. and Mrs. William Gordon Merrick, of 12, Melville Road, Barns, S.W.

FALON—HURSTON—On Tuesday, October 26th, at All Souls, Langley, the Hon. Eric Alfred Charles Fazan, M.A., of the Royal Northern Hospital, to Miss Emily H. Leppington, daughter of Rev. Dr. Leppington, of the Park, Hall, very quietly on account of the war.

KEMPSLEY—MILLER—On October 25th, at Greenwich, Captain William Davis Keyworth, I.M.S., eldest son of Mr. and Mrs. Evelyn Keyworth, of King's Lynn, Norfolk, to Mary Louisa, second daughter of Mr. and Mrs. William Miller, of Riverdene, Richmond, Surrey. (By cable.)

LEAPINGWELL—FELLOWS—On October 30th, at Marylebone, Dr. Arthur Edward Leapingwell, eldest son of Colonel A. H. Leapingwell, I.M.S., to Edith Elise, younger daughter of C. E. Fuller, of Worthing.

MACNAB—BREWER—On October 17th, at St. Cuthbert's Church, Edinburgh, H. H. MacNab, M.D., of Manchester, to Annie Emily, second daughter of Mr. Brewer, of Innes, Roxburgh.


Appointments.

DICKIE, J. K. Milne, M.D.Edin., Clinical Tutor in the Edinburgh Royal Infirmary.

GRACE, M. F. M. Edin., Surgeon to the Crescent Hospital.

Jebb, W. X. Edin., Clinical Tutor in the Edinburgh Royal Infirmary.

MACHIN, J. H. M., Ch. Edin., Clinical Assistant in the Edinburgh Royal Infirmary.


Ritchie, R., Ch. Edin., Clinical Tutor in the Edinburgh Royal Infirmary.

BULME DISPENSARY.

Dale Street, Stretford Road, Manchester, WANTED, A HOUSE SURGEON duly registered, and fully qualified. Salary £200 per annum, with apartments, board and gas. Applications, with testimonials, at once to Honorary Medical Secretary.
NOTES AND COMMENTS.

Edinburgh University and the War.

The half-yearly report of the Business Committee of Edinburgh University contains an interesting statement as to the effect of the great war upon the students. No fewer than twelve members of the staff—lecturers and assistants—are serving with His Majesty’s Forces. Of matriculated students there are 700 less than at the corresponding date of last year, and of that number it may safely be assumed nearly all are serving with the naval or military forces of the Crown. It is known that between 300 and 400 of the members—past and present—of the University Contingent of the Officers’ Training Corps have received commissions. Many graduates of the University are also under arms, but it is impossible in the meantime to arrive at any accurate estimate of their number. This decrease of students, of course, entails a large monetary loss to the University, but, on the other hand, the Alma Mater has the proud satisfaction of knowing that her sons will worthily maintain her ancient reputation for patriotism. The Committee express a hope that the University Court will arrange to have published in due season a Roll of Honour of those engaged in the war.

At Cambridge the falling off in the number of medical students amounts to nearly fifty per cent. The precise figures as regards entries are 64 in comparison to 116 last year, 110 in 1912, and 114 in 1911. One college specially favoured by medical students had 32 entered on its roll, but of these 17 only have come into residence. Cambridge is one of the small schools, so that the shortage is all the more conspicuous. It seems somewhat undesirable that students should interrupt the course of their studies in order to act in a subordinate capacity of dressers at the war, unless, indeed, the absolute necessity of such service is established. There could hardly be a more unsettling episode in a young man than that of an arduous campaign, in which he can hardly expect to add to his professional experience anything likely to be of service in his future professional life. Operative surgery for the most part falls to his seniors, and work of that kind is of comparatively little value in private civilian practice. It is not likely that more than a small proportion of the medical men now on active service at home and abroad will be retained permanently in the Military and Naval Medical Service. On the whole, then, medical students will be well advised to consider the whole facts of the case before they volunteer for service—that is to say, under present circumstances. Should the War Office find the help of medical students necessary to the proper care of wounded British soldiers, at home and abroad, then by all means let our students obey the call of duty and sustain the traditions of the profession to which they are attached. It is well to speak out in such a matter, and many of our readers will endorse the view advanced by the Cambridge Review, 28th, March, 1917, that there are many who have advanced any way in their medical careers are strongly advised to adopt the harder task of staying at home and getting qualified. That it is the harder path there can be no doubt: and we shall be glad when busy-bodies cease to speak as though anyone’s, especially a medical’s, presence in Cambridge this year means shirking.”

As a small nation that has bravely Serbia’s Offer sustained the cause of the Allies, Serbia deserves the gratitude of the British nation. It has been known for some time that her Army Medical Service is altogether inadequate to meet the needs of the situation and that in consequence the brave Serbian soldiers have had to undergo a vast amount of unnecessary suffering and death from wounds and disease. The Serbian Red Cross is sadly hampered for lack of funds, in spite of the humane efforts of Lady Paget and those interested in the country. It has been announced again and again that surgeons are wanted urgently by Serbia, but inquiry has shown that it is proposed to pay traveling and living expenses only, the services of the medical men being purely honorary. With the present shortage of medical men in the United Kingdom it is unlikely that more than a few volunteers will respond to the invitation, especially as the conditions of warfare in Serbia are more than usually arduous. The British Army Medical Department pays twenty-four shillings a day and all expenses to medical men who have, many of them, only recently obtained their qualifications. Serbia, therefore, or any other nation or organisation wanting English doctors must be prepared to offer sums for young and inexperienced men, and still more for the infinitely more valuable services of older men of special experience. Recognising these conditions it is interesting to note that Serbia has asked for a certain number of bacteriologists and physicians experienced in epidemic diseases. The salary offered to these highly-skilled men is too francs per month (with expenses)—that is to say, actually less than is offered in England to the youth who has just managed to scrape through his examinations with a standard lowered for war purposes. Under these circumstances it is to be feared that Serbia will have some difficulty in engaging volunteers in our own country. Serbia is a poor country, but it would be a wise economy...
LEADING ARTICLES.

THE TRIUMPH OF TEMPERANCE.

The great war at present raging on the Continent of Europe will undoubtedly influence more or less profoundly the future destinies, not only of the combatant nations, but of nations in other parts of the globe. The economic issues at stake are stupendous in their magnitude, and these alone must in the long run determine many social problems. In the history of a people it is a sound proposition that the power of the purse is greater than that of the sword. There are other important contributory factors, however, in national supremacy, applying that term to the conquests of peace as well as to the dominion that is maintained by a policy of blood and iron.

One of the immediate results of the war, for instance, has been a general impulse to the cause of alcoholic temperance. Early in its course the appeal by Lord Kitchener to the British nation for recruits to form a new army insisted upon the necessity of avoiding stimulants in order to keep physically strong and capable. As a matter of fact, the majority of the soldiers of the new army abstain from alcohol, a self-denying ordinance which is also generally adopted by the army on active service. This salutary reform is reflected in various parts of the kingdom by the adoption of further restrictions upon the sale of liquor, notably in the curtailment of hours of sale. In the metropolis, for example, public-houses are closed nightly at ten o'clock, and it is seriously mooted that they should not be opened before ten o'clock next morning. The social effects of the early closing have been remarkable. It seems likely that the late hours into which city populations have gradually drifted are more or less closely related to the legal hours of business imposed by the legislature on publicans. Another significant fact is that similar restrictions have been imposed upon the sale of alcoholic beverages in clubs, whereby the thin end of the wedge of another social reform has been introduced. Looking abroad we find no less striking changes adopted by two nations that have not hitherto shown any leaning towards temperance. The prohibition of the sale of vodka in Russia signalises a startling transformation of national habit. Hardly less significant is the issue by the German Emperor of an order forbidding the use of alcohol by his army.

Germany probably consumes more alcohol per head of the community than any other nation in Europe. Her conduct of the present war has been charac-
terised by excesses of a brutal kind, and many of them, it is to be feared, have been conceived or committed under the influence of alcohol. A general survey of the position reveals the encouraging fact that the nations of Europe are enforcing the discipline of temperance upon their soldiers. In the light of past experience it will be well to utter a word of caution to temperance enthusiasts in our midst. If in their zeal the reformers advocate extreme measures they are likely to defeat their own object. "Everything comes to him who waits" is a sound generalisation, but one that is not recognised at its full value by would-be reformers. This train of thought is suggested by the action of a London magistrate, who last week seriously entertained the proposition that during the war public-houses should be closed against women. That there has been a recent increase of drinking amongst that sex seems not improbable if we realise the fact that alcohol affords to persons of certain temperaments, more especially, perhaps, to those of limited intellectual resources, a means of assuaging mental grief and anxiety such as that experienced by women whose men-folk have left their homes to face the perils and privations of war. To adopt a sex disqualification of the kind suggested would in the present state of public opinion upon sex legislation be extremely unwise. It would involve, moreover, a complete misconception of the meaning of temperance progress, which, in our opinion, has arisen from a better understanding of the laws of healthy life, and is due to collective action on the part of an enlightened public rather than that of the legislature.

If women as a class are bent upon drinking more alcohol during the war than they consume in times of peace it is hardly likely that their exclusion from public houses will thwart them. In a broad sense the curtailment of opportunity by limiting the use of licensed premises will bring about a certain reduction in the consumption of alcohol. The diminution, however, will be amongst those that drink habitually more than is good for them rather than amongst the moderate drinkers. In the long run the man in the street will determine the nature of the restrictions to be placed upon the liquor trade. If that fundamental principle of government by consent be accepted, it follows that we must look for future progress in temperance to the general standard of education and enlightenment rather than to legislation, which experience has shown to be a broken reed in the matter of not a few social reforms.

THE SOLDIER'S HEART.

Among the consequences of prolonged physical exertion few are so remarkable as the peculiar disorder of cardiac action known as "irritable heart." The special phenomenon of irritability, as affecting the heart, is seen in individuals who have suffered from over-exertion or upon whose cardiac functional capacity some great demand has been made. Generally speaking, the symptoms are those of cardiac overstrain—namely, giddiness and palpitation, associated with a rapid, often tumultuous, action of the heart. Such a condition has been termed the "soldier's heart," because it is not infrequently observed in men who are discharged as unfit for active service. In former times the weighty and ill-adjusted accoutrements of the soldier in the field were responsible for much needless strain. The findings of the Pack Commission and an increased knowledge of applied physiology led to the introduction of a more hygienic equipment, so that, at the present day, the element of weight can be neglected as a contributory factor in the production of soldier's heart. Former pathologists were fond of demonstrating the existence of a white spot, known as "the soldier's spot," upon the external surface of the heart due to friction, with which there was generally some degree of cardiac hypertrophy. Though the subject was referred to by Deputy Inspector-General Maclean, M.D., in 1867, when reviewing the causes of admission into the Netley Hospital, it was Dr. J. M. Da Costa, of Philadelphia, (a) who first called attention to the condition and gave it the name of "irritable heart." In a critical study of some three hundred cases observed among soldiers subsequent to the Peninsular Campaign, Dr. Da Costa analysed all the symptoms and physical signs of this disorder, which is of special interest at the present moment. It may be noted that murmurs obscuring or replacing the cardiac sounds are comparatively seldom met with. Even after grave derangement of the heart's action recovery is possible, and in several cases men have been able to rejoin the ranks after undergoing a period of rest and treatment in hospital. A point of considerable practical importance is that when once the heart has become irritable from excitement and over-exertion disordered innervation will tend to keep up the condition and put back recovery. If intemperance has been an additional contributory factor the prognosis must also be considered as doubtful.

Recent advances in cardiology go to show that many instances of over-strain of the heart are due to the sudden inception of auricular fibrillation or other abnormal action. It is probable, however, that some affection of the myocardium has existed in many of the cases and the increased exertion, as Dr. James Mackenzie has pointed out, has merely served as a stimulating factor in the production of an abnormal rhythm in an already diseased heart. Every medical examiner of recruits can bear testimony to the frequency with which functional or organic heart affections serve as causes of rejection. In the course of an address on the "Soldiers' Heart," delivered the other day at the Institute of Hygiene, Dr. Strickland Goodall remarked that cardiac disease was the cause of the greatest number of breakdowns among soldiers during their first three months of training, while in forced marches a certain number of men always fell out from heart

failure. The effect of rest in the horizontal position in reducing the palpitation and ameliorating other symptoms is sometimes little short of miraculous, but in most cases the exhibition of some cardiac tonic, followed later by baths and regulated movements, will be necessary to restore a healthy action in an organ that has not become seriously diseased.

CURRENT TOPICS.

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A Terrible rumour has reached our contemporary The Hospital, last week's number of which states that the vogue of the operation is declining. Such news must shake our daily life to its foundations, although it certainly postulates increased freedom from disturbance for some of our fellow-men. To think that the illimitable incursions of our scalpel-prone visitors are in any way affected by such a thing as fashion is bad enough. Yet the bearers of the bistouries almost admitted that themselves when they began to undo last season's gastro-enterostomies. But it is the idea that the number of operations is declining that gives us pause. The war, of course, is blamed. But we can hardly claim that the class of man serving or about to serve at the front is that from which our surgeons drew their clientele. Nor is the decrease likely to be due to economy. The swift, sure diagnosis of the expert abdominalist allows of little reflection on the part of himself or of others. Nothing must stand between him and the peneant appendix. Financial difficulties are not allowed to check him more than do the superficial structures of the abdominal wall. The surgeon is like a revolver—people hope they won't want him, but when he is needed the need is imperative. Like a tram-car, he must have his way. We all know that there is a type of hypochondriac who is never so happy as when in a dolce far niente of ether anaesthesia and exploratory laparotomy, but her numbers are negligible. And it cannot be that there are not enough surgeons. No, we fear it is true that operation sometimes becomes a fashion. “When in doubt, look and see,” is a very plausible precept, but perhaps we have had too much of it. Of course, there is always a certain amount of more or less decorative surgery that can be easily postponed in times of crisis, but, all the same, we are inclined to agree that surgery, like other things in the world, is subject to fashion, and that the heretofore obsessed operator is to-day somewhat staying his scalpel.

Antiseptic Inhalations.
The idea of combating certain specific infections by means of antiseptic inhalations is by no means new. Many disinfectants, such as creosote, have been successfully employed in this manner, not only for removing the feter of such conditions as bronchiectasis and chronic phthisis, but also for attacking the organisms responsible for them, as it were, in situ. Inhalers, to be of any practical use, must be worn persistently day and night except when actually taking food. An interesting series of experiments has been carried out by Messrs. C. T. Kingett, F.I.C., F.C.S., and R. C. Woolcock, F.I.C., F.C.S., with regard to the destructive effect of certain disinfectants upon cultures of typhoid bacilli. In the Journal of Clinical Research these observers describe the effects of placing strips of filter paper carrying the germ cultures at the top of a closed tin, beneath which were placed layers of cotton wool impregnated with sanitas oil, Russian turpentine and eucalyptus oil. In another set of experiments air was drawn by means of a water pump through flasks containing a small quantity of the medicaments mentioned above and then through a U-tube containing strips of paper moistened with a broth culture of the several germs. When respirators and inhalers are employed the difficulty is always to get the patient to use them continuously. Moreover, the nature of the disinfectant with which the inhaler is charged makes a considerable difference, not only to the patient's comfort, but also in respect of the length of time necessary to destroy pathogenic organisms, if, indeed, such can be killed by inhalations alone. The experiments undertaken above appear to show the superiority of sanitas oil over creosote, carbolic acid and tincture of iodine, all powerful disinfectants. If similar good results can be obtained clinically, a further stimulus may be given to the method of treating pulmonary diseases by continuous antiseptic inhalations.

The Dum-Dum Allegation.
It is one of the commonplaces of war for one side to accuse the other of breaking all the rules, and we must allow for it. The talk about dum-dum or expanding bullets is an example. Early in the war each side accused the other of breach of international law in this respect and produced instances in support of its case. The modern high velocity bullet is usually made of a hard metal casing filled with some softer material such as lead. If the end of the nickel casing be cut off the lead flows out when the bullet strikes its mark and the “mushroom” casing is left creating a greater and more ragged wound than that made by an unarmed bullet. A bullet so treated is called a “dum-dum,” and it is these that are said to have been used. The diagnosis is made either by observing the resultant wound or the extracted bullet or both. It is liable to error. The modern bullet only acts as we expect it to act—that is, by puncturing a clean hole—at a medium range. At two points in its career, immediately after leaving the rifle and again when its velocity is diminishing, it wobbles. The first time is before settling down to its steady spin, and the second when it is losing its initial speed. A hit at either of those times will not be clean, as the bullet is flying most straight or least sideways. Again, when a high velocity bullet strikes an organ filled with fluid, like the bladder, or semi-fluid, like the skull, it causes a burst. The effect on the organ is as if an explosion has taken place within it. Similarly when a hard bone is struck it may be shattered to fragments, each of which becomes a projectile in its turn. The nickel covering of the bullet may be torn by a bone and the lead may flow out, so giving rise to the impression that dum-dums were used. All these facts have been long known, but with the increase of the use of expanding bullets the finding them undischarged. So far we are glad to say we have not heard of any such discovery.
The After-Histories of Consumptives.

An interesting report upon the after-histories of patients discharged from the Brompton Hospital Sanatorium at Frimley, in Surrey, during the years 1905-1910, has been compiled by Drs. S. H. Habershon, F. J. Wethered, P. Horton-Smith Hartley, J. J. Perkins and W. O. Meek (Medical Superintendent). The great majority of the patients in the Sanatorium have first passed through the wards of the Brompton Hospital, whence, if found suitable after a period of observation, they have been drafted on to Frimley. Each patient undergoes a course of graduated exercises and labour, and on its completion he should be in a condition to return to work, if all goes well. The report is based upon a consideration of the after-history of 1,074 cases, out of whom tubercle bacilli were found in 1,176. The remainder, numbering 498, either had no sputum, or else no bacilli could be found. A further sub-division was made into "Full Time" and "Short Time" cases, the former numbering 1,057 and the latter 167. Among the numerous tables in the report the most instructive are those which deal with the after-histories of all "full-time" cases of pulmonary tuberculosis which could be traced for a period of (a) five years and (b) four years subsequent to discharge. From a study of these it is seen that of 690 patients, 55.9 per cent. were well and able to work at the end of the fourth year following that in which they were discharged; or 44.5 per cent. if only those are taken in whose sputum tubercle bacilli could be found. At the end of the fifth year (of 292 patients) the corresponding figures were 48.4 and 38.3 respectively. Seeing that the cases are carefully selected for treatment at the sanatorium, it was hoped that a larger percentage would have retained their health, but it must be remembered that in many cases patients have been compelled to return to unsatisfactory home conditions and insufficient food, with consequent relapse. The best results from sanatorium treatment can only be obtained by an intelligent following up of the cases after their discharge. Another point is brought out by the statistics—namely, that lasting benefit is more likely to accrue when the patient comes under treatment in an early stage of the disease.

PERSONAL.

Dr. Richard Whittington has been elected a member of the Brighton Town Council.


Prof. C. S. Sherrington, F.R.S., has been elected to a professional seat upon the Hebdomadal Council of the University of Oxford.

Dr. Walter Hill has been appointed Medical Officer to the Sportsmen's Battalion, the base hospital of which is at Chertsey, Surrey.

Dr. John Gordon-Muny, proprietor of the Heigha n Hall Asylum, has consented to serve as Lord Mayor of Norwich for the ensuing year.

Dr. W. Male Smith, M.D., M.R.C.P.Edin., has been appointed Medical Superintendent to the West Bromwich and Walsall Joint Unions.

Dr. Louis MacPherson, M.D.Edin., has been appointed Tuberculosis Officer for the counties of Mid- and West Lothian and Peeblesshire.

Dr. Robert A. MacLaverty has been elected Master of the Coombe Hospital, Dublin, in succession to Dr. M. A. Gibson, whose term of office expires in December.

Dr. J. A. Manton, for thirteen years a member of the Sheffield City Council, has been installed as W.M. of the St. Leonard Lodge, No. 2,603, at Sheffield.

Mr. W. Fedde Fedden, F.R.C.S., the Senior Assistant Surgeon, has been elected a Surgeon, and Mr. George A. Ewart, F.R.C.S., an Assistant Surgeon, to St. George's Hospital.

Mr. A. William Sheen, M.S., F.R.C.S., has generously offered to endow the Alfred Sheen prize of the value of £1 annually in the Medical School of University College, Cardiff, by presenting to the School a sum of one hundred pounds.

Dr. H. A. Watney has succeeded Dr. Trevor Fowler as Medical Officer of Health of Epping, the latter having resigned the office owing to failing health after a tenure of nearly forty years.

Dr. Joseph F. O'Carroll, F.R.C.P.I., has been appointed Professor of Medicine in the National University of Ireland (University College, Dublin), in succession to the late Sir Christopher Nixon.

Miss Nora Smith, M.B., B.S.Lond., D.P.H., at present Assistant Medical Officer, Nottingham, has been appointed Assistant Medical Officer of Health and Assistant School Medical Officer at Eastbourne.

Dr. Sidney Davies, Medical Officer of Health for the Borough of Woolwich, returned home on Friday week last, after nearly three months' interment in Germany, where, with his wife and daughter, he was on holiday when the war broke out.

We regret to announce that Mr. Sidney Nelson Crowther, M.R.C.S., L.R.C.P., a motor-cycle dispatch rider, was killed in action on October 19th, aged 39. He was Senior Medical Officer of Surrey County Asylum, Netherene, and formerly Assistant Medical Officer at Brookwood Asylum and Senior House Physician at Westminster Hospital.

Sir Watson Cheyne, Bart., F.R.S., President of the Royal College of Surgeons of England, will open a discussion at the Medical Society of London on November 16th, at 8.30 p.m., on "Surgical Experiences of the Present War." Owing to his absence on active service, Mr. F. E. Austen will be unable to read the paper previously announced for November 9th.

The next meeting of the Oxford Ophthalmological Congress will be held at Keble College, Oxford, on July 15th and 16th, 1915. The discussion upon that occasion will deal with industrial diseases and accidents. Mr. Sydney Stephenson has been appointed Master of the Congress, vice Mr. R. W. Doyne, nominated as Past-Master. Mr. P. H. Adams (Oxford) has been appointed Deputy-Master and Mr. Bernard Cridland (Wolverhampton) Honorary Secretary.
The case we have before us is one of which the most prominent symptom is severe anaemia. She is a married woman, about 40 years old, who has had several children and no miscarriages. For the past two or three years she has felt rather weaker than previously, being easily tired and hardly equal to the ordinary household duties which, as the wife of a working man, she has to carry out. She comes of a fairly healthy family, in which there has been no particular tendency to anemia. For the past few months she has been getting steadily weaker, and at times her feet, ankles and face have become swollen. She has noticed her abdomen distended of late, but has had no pain. She came into hospital a few days ago, in a somewhat delirious state, being at times quite rational, and at others noisy and rambling in her conversation; her temperature was 100°, and she was extremely weak.

The present state of the patient is in striking contrast to that of a healthy person. You will notice the curious colour; not merely paleness, but the light yellow, almost greenish shade of the face, limbs, and to a less extent, of the body. The paleness, however, is very remarkable, the palate, tongue, gums and lips being a yellowish white colour. There is a moderate amount of edema, best seen below the eyelids, and in a slight degree in the legs, hands and back. The hair is dry, harsh and thinned. The patient's attitude is that of listlessness. She is somewhat irritable, and dislikes to be interfered with. Her temperature chart shows a moderate pyrexia with daily remissions. The pulse is frequent, of low tension, but fairly regular. The heart is dilated to a moderate extent, and is rather feeble in its contractions. There are systolic murmurs to be heard in the front of the chest, namely: near the apex of the heart; at the base, loudest to the left of the sternum; and near the inner end of the clavicles, particularly the right, and just above them. The abdomen is enlarged, mainly owing to gaseous distension of the bowels, but also from enlargement of the spleen and liver. There are several carious teeth, the gums are inflamed, and some pustules are to be found on the skin. The urine is of a low specific gravity (1003 to 1012) and is free from albumin.

The blood examination gives the following results:—There is a great diminution in the number of red cells, which are misshapen, and show great varieties both in size and shape. They only number about 1,300,000 per c.mm. A few nucleated red cells of normal size are to be found, but repeated and careful search has failed to discover any large-sized nucleated red cells (megablasts). The hemoglobin is defective, not however, to such an extent as the number of red corpuscles. The hemoglobin is about 34 per cent. of the normal amount, while the red cells may be taken as 26 per cent. of the five millions per c.mm., which should be present normally. This means a poor blood, relatively rich in hemoglobin. In order to record in figures the relation of hemoglobin to red cells, we estimate the ratio of their relative percentages; that is to say, the percentage of red corpuscles present in the patient's blood as compared with that in a normal blood, and the percentage of hemoglobin present, also as compared with normal blood. An equality in the percentages is described as a colour index of 1. Should the hemoglobin be in greater proportion than the red cells, as is found in the present case, the colour index exceeds unity. In this instance the colour index is \( \frac{3.4}{2.6} \approx 1.3 \). It is found that a high colour index, that is one equal to, or exceeding unity, is characteristic of pernicious anaemia. Most secondary anemias, on the other hand, have a colour index considerably under 1. The white cells in this case are diminished in number, but otherwise show no very definite departure from those found in a normal case. The above detailed characters of the blood, and the other symptoms of disease, leave no doubt that the case is one of pernicious anaemia.

The cause of the severe form of anaemia from which this patient suffers must be of the greatest interest and importance. It is in many cases quite impossible to assign a satisfactory origin to the complaint, but it has been observed in many such cases that there has been an obvious focus of infection. Instances have been observed where pernicious anaemia has followed septic infection from the alimentary tract. A patient, for example, some years ago, in the Royal Victoria Hospital, died after a prolonged illness in which there was considerable fever, and in which the blood became eventually typical of pernicious anaemia. A sloughing fibrous tumour was found in the bowel. A case under my charge a few years ago illustrated the group of cases supposed to be due to oral sepsis. A gentleman who had for years suffered from pyorrhea alveolaris became anemic. His liver and spleen were enlarged, and before his death his blood was typically that of pernicious anaemia. From his blood, his urine, and his gums, a streptococcus was grown, from which a vaccine was prepared and administered without benefit.

In the present case the teeth are carious, the gums unhealthy, and some pustules are present.

While one should not over-estimate the pathological importance of the wide-spread and almost universally defective condition of the teeth and gums, one must recognise that here under our very eyes an entry has been formed for the admission of microbes or their toxic products into the tissues. It has been shown that in a certain proportion of cases of septic absorption,
pernicious anaemia has ensued, and to this extent one may accept the septic theory of its causation.

There are other occurrences of the disease which do not seem to have this origin, for example, those which have been attributed to repeated or even trivial hemorrhages, or to exhausting conditions, such as too frequent pregnancies, insufficient or unsuitable food, syphilis, cancer. There is one anemic condition which is not a progressive anaemia, in the sense that it may disappear when the cause is removed, namely, the severe anaemia due to certain intestinal parasites (amoebiasis, duodenale, bothriochilus laetus, and rarely oxyuris and ascaris). The blood examination and the general state of the patient are indistinguishable from true pernicious anaemia. There still remain a number of cases which cannot with certainty be attributed to any recognisable source, and all we can say of them is that the symptoms are due to a disturbance of function of the blood-forming tissues, as shown by the presence of altered blood cells and hyperplasia of the lymphoid tissue. The disease is usually spoken of as a primary anaemia, since the origin of the disturbed haemogenous function is so often unknown. This, however, is certainly not the case in those instances of the disease due to septic absorption, where we are no more justified in using the term "primary" than we would be in calling pneumonia a primary disease of the lungs. Still less is it justified in those cases of anaemia produced by intestinal parasites, where the blood picture is practically identical with pernicious anaemia, but which tend to recovery when the parasite is removed.

There is, in fact, much reason to doubt if we are entitled to look on the condition as a distinct disease, for the symptoms may be produced by such a variety of causes. Ewing, however, disregards this want of consistency in the causation, and maintains that the typical blood picture, together with some hyperplasia of the lymphoid marrows, are sufficient to justify one in describing the condition as a progressive anaemia, no matter whether the origin of the disturbed condition of the blood and marrow is known or not.

One of the most characteristic features of this complaint is the fluctuating nature of its course, either in consequence of, or independent of the treatment which the case receives. For a time the patient improves, and an examination of the blood may show that it is approaching the condition of health. Sooner or later, however, the disease recurs, often with considerable rapidity, and in a few weeks, after being apparently well, the patient reaches an extreme degree of anaemia. In some cases no improvement takes place, and the disease pursues a persistently unfavourable course. The ultimate result is almost without exception fatal, and death is caused by heart failure, progressive weakness, or some intercurrent disease.

The treatment consists in maintaining the nourishment to the highest possible point, in avoidance of over-exertion, in improvement of the hygienic conditions of the patient in every way. Arsenic has been shown to be the most useful drug; it may be given by the mouth, in any of the suitable preparations; by the rectum or hypodermically in the form of cacodylate of sodium; or intravenously as salvarsan.

The chief drawback to active or prolonged treatment by any form of arsenic is the possible production of multiple neuritis. It may produce a very serious amount of paralysis. In addition, arsenic may give rise to considerable disturbances of the digestive organs, which in this class of case is specially unfortunate, and it may also cause the deposition of pigment in the skin, giving rise to a brown discoloration of the surface.

In some cases iron has proved of use, but is generally inferior to arsenic in its results. Any focus of septic absorption must be removed if possible. Occasional benefit has been derived from the use of a vaccine, obtained from the inflammatory process, which has presumably caused septic absorption. Lastly, as regards food, there is no special article of diet indicated. A liberal diet of the most nourishing kind available should be arranged for. Beef, mutton, bacon, ham, and fat-forming foods, generally, are suitable. Raw meat, or raw beef made into sandwiches, bone marrow, which can if necessary be administered in capsules, butter, milk and eggs should be given in as large quantities as possible, close attention being given to the digestive functions.

Note.—A Clinical Lecture by a well-known teacher appears in each number of this Journal. The lecture for next week will be by G. Norman Meachen, M.D., B.S., M.R.C.P.Lond. and Edin., Physician to the Hospital for Diseases of the Skin, Blackfriars: Dermatologist to the Prince of Wales General Hospital. Subject: "Recent Methods in Dermatology."

BACTERIAL MUTATIONS: SOME RECENT OBSERVATIONS AND SUGGESTIONS AS TO THEIR EFFECT ON CURRENT MEDICAL THEORIES.

By C. D. Maynard, F.R.C.S.E.

8, Africa Institute for Medical Research.

(Carried from page 418.)

There is, however, another group of organisms on which a great deal of interesting work has recently been done. This is the streptococcus group, and foremost among the workers on this group is Rosenow. It will only be necessary for me to quote a few sentences from his most recent publication for those of you unacquainted with it to gather the main conclusions arrived at. Writing in the Journal of Infections Diseases, Vol. 14, January, 1914, he says:—"Many authors have noticed changes in fermentative, morphological, and other properties of members of the streptococcus group. Davies concludes that the transformation of one member into another within certain limits appears to be not an uncommon phenomenon. The transformation of atypical into typical pneumococci has been demonstrated by Duerer and Riebenburg. An encapsulated streptococcus from "septo sore albus" can be converted into Str. mucosus on the one hand, and into hemolytic streptococcus on the other. This has been demonstrated by Davies, Rosenow, and others. In connection with the transformation of pneumococci into streptococci or vice versa, he writes:—"The

(a) Read before the Public Health Section of the South African Medical Congress, August, 1914.
transformation of some of the strains has been found to be complete by every test known. Thus the morphology, the presence of capsule, the fermentative powers, the solubility or insolubility in bile or NaCl solution, the behaviour towards the respective broth culture filtrates (Marmorek's test), the specific immunity response, as manifested by the production of opsonin and agglutination by anti-pneumococcus and anti-streptococcus serum, and the more or less specific pathogenic powers have been studied. Strains that correspond to hemolytic streptococci have been converted into typical pneumococci as determined by all the above tests and vice versa.

"The changes observed have frequently the characteristics of true mutations because they appear suddenly, under conditions more or less obscure, and because the newly acquired properties persist unless the organisms are again placed under special conditions. The bearing these results have on bacteriology, epidemiology, and medicine might be discussed at length: only the following point will be mentioned: the fact that variations in oxygen tensions and salt concentration, that growth in symbiosis with other bacteria, and that injections into cavities in animals call forth mutational forms in streptococci, suggest strongly that similar changes might occur in various other micro-organisms where such conditions may prevail. It would seem, therefore, that local infections are no longer to be looked upon merely as a place of entrance of bacteria, but as a place where conditions are favourable for them to acquire the properties which give them a wide range of affinities for various structures."

He has shown that we may write the names,

Hamolytic Streptococcus,
Streptococcus viridans,
Streptococcus of rheumatism,
Pneumococcus,
Streptococcus mucosus,

in a circle, and may by starting at any one of these, and travelling either way, convert it into any other by passing through the intermediate stages.

D. P. Eisenberg has recently written a paper entitled "An Investigation into the Variability of Micro-Organisms" (Centralblatt, May, 1914). The organisms he deals with are B. prodigiosus, B. violaceus, and some pathogenic bacteria. He points out that there is a much greater variability in bacteria than in other organisms, and that very great changes in their characters can be observed in comparatively short periods. These changes may be temporary or permanent. The first may be termed modifications, and the latter mutations. Further, he remarks that in consequence of the rapid succession of individuals it is probable that there are a greater number of "susceptible periods," which result in the greater possibility for bacterial variations.

A short reference must be made to the diphtheroid group of organisms. P. N. Cave, writing in the Journal of Bacteriology and Pathology, of April, 1912, expresses the opinion that the diphtheria bacillus may be converted into the Hoffmann's bacillus, and subsequently into a micrococcus in the throats of patients. Thiele and Embleton, in a paper appearing in the Journal of Bacteriology, May, 1914, wrote: "We have been able to convert the Hoffmann's bacillus into a bacillus morphologically indistinguishable from the diphtheria bacillus and capable of secreting an exotoxin, which can be neutralised by diphtheria antitoxin."

Before leaving this section of the subject, I may perhaps be allowed to narrate one or two observations in this connection which have come to my notice. In the routine laboratory of the Institute for Medical Research two stock cultures of micrococci melitensis were kept for purposes of agglutination tests. Recently, however, it was observed that the organism had lost its ordinary appearance, and had become morphologically a bacillus. The observer, thinking that this culture might have become contaminated, examined the second culture, with a like result. These cultures were plated, but no colonies of the typical micrococcus were observed. About a year ago a sub-culture from one of these growths had been sent to another laboratory, and at that time it was morphologically true to type. At our request they returned a sub-culture, which, on examination, was seen to consist entirely of a similar bacillary form. The bacillary form grows more rapidly and luxuriantly than the typical micrococcus of Malta fever. While at once admitting that this does not constitute scientific proof of a mutation as at present it has been impossible to carry out any further experimental work, it will, nevertheless, I think, be admitted that it is very suggestive. If all the sub-cultures became contaminated, they were all contaminated with the same, or at least a similar organism, although two of them were being grown in a different laboratory to the third, and, further, the micrococcus melitensis did not, or could not, live in symbiosis with the newcomer. We may here note that Park and Williams state that bacillary forms have been observed in old cultures of the micrococcus melitensis, and as is well known bacillary types frequently occur in even young cultures.

When investigating the prevalence of the pneumococcus among natives living in tropical areas, both Mr. Joseph, my assistant, and I were struck with the frequency with which a Gram-positive bacillus of a diphtheroid type, which culturally resembled the pneumococcus, was observed. In fact, not only culturally, but morphologically, it was often difficult to distinguish it from a true pneumococcus. Among the cultures which we subsequently had observed in a strain forms were found. We were at first of the opinion that, while we had pure cultures of undoubtedly pneumococci in some tubes, others were contaminated by this diphtheroid. An attempt was made to separate them from the pneumococcus by subcultivation and plating, but many difficulties and anomalies were observed. Firstly, in some of the sugar-media the growth from one and the same tube had the appearance of a diphtheroid, while in others it resembled the pneumococcus; the diphtheroid-looking organism, if transplanted from the sugar in which it appeared pure to other media, again resembled the pneumococcus. An apparently pure culture of the pneumococcus growing on a blood agar slope for several days produced heaped up lump-like colonies, which, under the microscope, contained organisms of the diphtheroid type, and some club-shaped cocci. This appearance of a diphtheroid type of organism associated with the pneumococcus has subsequently been observed in a strain isolated by Mr. Joseph from the blood of a patient reported as suffering from pernicious anemia, and by
another of our assistants, Mr. Slawkowsky, in a strain obtained post-mortem from a pneumonia lung. We are at present at work on these problems, and it is too early yet to dogmatise as to their interpretation; but, nevertheless, it is probable they are examples of mutations, or change in characters, of the pneumococcus.

Dr. Pitchford informs me that in 1912 several complaints were received from practitioners in Pretoria that Widal examinations for typhoid were returned as negative when the post-mortem evidence subsequently showed typhoid lesions. A strain of B. typhosus, isolated from the spleen of a fatal case in Pretoria, gave the usual sugar reactions at the date of its isolation, namely, May, 1912. After repeated sub-cultures had been made, the sugar reactions of growths from this strain were re-examined in May, 1914, and it was found that it produced gas in glucose broth, thus having acquired a character it did not possess when first obtained. This strain had been used for Widal reactions, giving good agglutination with serum from acute cases from Pretoria, and does so still; but it does not give such massive agglutination results as the rest of our laboratory strains, when tested with homologous serum obtained by animal inoculation.

To summarise, we have seen that alterations in type, including the acquisition of loss of pathogenic properties, may occur in certain groups of organisms, for instance,

The colon group.
The strept-pneumococcus group.
The acid-fast or tubercle group.
The mycoides-anthrax group.
The diphtheria group.

There are several other groups in which similar changes are suggested by clinical observations; for example, the non-Gramming group of diplococci, which includes such organisms as the micrococcus catarrhalis, micrococcus intracellularis, and gonococcus.

There is some evidence that changes not even confined to the group limits may possibly occur, but clearly demonstrations of what constitute the characters of a group are crude and liable to reconstruction from time to time as our knowledge increases.

In face of these facts it is not wise to ask ourselves how far current theories are satisfactory, or whether we should not revise some of the present conceptions in regard to the epidemiology of disease? There is a type of mind, unfortunately not rare, that demands some concrete cut-and-dried theory on which to rest, that cannot endure the uncertainty, and the untiring search for facts, which must precede the construction of any sound theory, and would rather adopt an incorrect hypothesis than be without the mental comfort that to such types an assumed certainty appears to bring. This type demands that some new dogma shall be enunciated before the old is shown to be faulty, and regards all collection of facts in disproof of current theories as so much useless labour or worse, contemptuously labelling such work destructive criticism, as if they had thereby abolished the importance of the facts, and rendered their hypothesis unassailable and unassailable.

If we would be scientifically honest we must accept new facts as we learn them whether they are compatible with our theories or not; this is a truism which in the abstract everyone will admit, but which of us is guilless of trying to shut our eyes to, or explain away, observations which conflict with our favourite beliefs towards the conclusion of thirty-five years’ service. Lady Simon was also presented with a diamond tiara in recognition of her services upon the Samaritan Committee.

SIR ROBERT M. SIMON, M.D., F.R.C.P., was the recipient the other day of his portrait, which will be hung on the walls of the Birmingham General Hospital, together with an illuminated address, upon his retirement from the medical profession after the completion of thirty-five years’ service. Lady Simon was also presented with a diamond tiara in recognition of her services upon the Samaritan Committee.
THE RELATIONS OF LARYNGOLOGY TO GENERAL MEDICINE AND SURGERY. (a)

By W. PERMEAN, M.D., Lond., F.R.C.S., Eng.

Lecturer on Laryngology, University of Liverpool; Throat and Ear Surgeon, Royal Southern Hospital, Liverpool; Throat and Ear Surgeon, Southport Infirmary.

GENTLEMEN,—The ordinary course of lectures on laryngology will begin in the next summer term. I have thought, however, that it would be well to preface that course with an introductory lecture this term, which might indicate the general scope of the subject and its relation to medicine and surgery as a whole. My reasons for so doing are twofold. In the first place, the subject—so the wisdom of the General Medical Council has decreed—is still a voluntary one for students. If I cannot interest you, I cannot force you to listen to me. And, secondly, I can only induce you, after I have tried to show you that a knowledge of throat diseases will be of advantage to you in the practice of your profession. Not all of you, I trust, will become specialists in this or any other branch, but to all of you a certain knowledge of laryngology is of advantage, and is indeed essential for the right understanding of a wide field of cases which occur either in general practice or in the practice of medicine or surgery.

Today I propose to point out a few of the many links that bind, and should more and more bind, the specialist to the general physician and surgeon. In the summer I hope, in the few opportunities that are open to me, to go more in detail into the most important facts of a wide subject, by lectures which will be not only lectures but also demonstrations of the actual patients themselves. I invite you to take advantage of the opportunities which exist in this city to give what time you can spare in your course by recourse to the clinical study in the out-patient room of laryngology, as it actually presents itself in practice.

The first note I wish to strike is, that though the methods of laryngology are special, there is nothing special about its pathology. Virchow has said that every specialty must be studied and practised in the light of general pathology. I would say in addition that no specialty is worth study which cannot be pursued in that spirit. The danger of specialism is a tendency to the multiplication of special terms, the creation of an esoteric vocabulary which is meaningless to the general physician, and the tendency, too, of the specialist to limit himself too rigidly to the artificial boundaries of his region. I remember a laryngologist showing a case of hemorrhage into a vocal cord; I asked him whether there were any signs of disease of the liver, and he said, "Oh, I don't go lower than the diaphragm." That is an illustration of the wrong way to practise a specialty. There is no right relation between the specialist and his brethren is for the general physician to take advantage of the skill, either in diagnosis or manipulation, of the specialist, and the specialist, whilst keeping himself abreast of the progress of general pathology, to place his expertise and often his patient at the service of the general physician or surgeon. Jealousy should give place to co-operation.

Twenty-five years ago the popular conception of a laryngologist was a man who looked down the throat with a mirror to see if the vocal cords were healthy. To-day the scope of laryngology has become a very wide one. The throat specialist of to-day must be a surgeon, a physician, and a mechanical expert. A surgeon cannot be a laryngologist, "a physician who knows how to use his hands" may well be applied—mutatis mutandis—to the laryngologist. He must have a competent knowledge of the trend of modern medicine, or he will miss the significance of much that he sees in the throat and nose; and he must possess surgical knowledge and the surgical instinct, or he will be quite unable to treat adequately the very difficult and complex surgical cases that now come under his charge. This rule for the satisfactions of surgical work should, in my judgment, be this: viz., that he should keep to himself those cases which require operation of a kind which from practice he is likely to be better able to perform than the general surgeon; but to hand over those which from his wider experience the general surgeon is likely to be more competent to deal with. If he conscientiously adheres to that rule, there should be no conflict between specialists and surgeons.

I have only time to-day to deal with some of the most important of the relations between laryngology and general medicine and surgery. I will refer to its relations with—

1. The Respiratory System.
2. The Circulatory System.
3. The Nervous System.
4. The Special Surgery of the Ear and its Adnexa.

The Respiratory System.

The nose and throat are the gateways of respiration. The respiratory functions of the nasal mucous membrane are of the highest importance. If that is normally acting, every particle of air during its passage through the nose is raised to the temperature of the body, and is completely saturated with moisture before it reaches the aperture of the larynx. About a quart of water is added to the air by transudation from the erectile tissue of the nasal mucous membrane; and it is worthy of note that there is no mechanism lower down in the respiratory tract which is capable of performing this function. He is warned of the danger of the inspired air, the mucous membrane of the nose has an action on bacteria of the highest importance. By the effect of the cilia of the epithelium impurities are mechanically removed from the nose; the mucus has, it is supposed, a direct bactericidal action, and the air after passing through the nose is practically free from germs. The importance, therefore, of a physiologically acting nasal mucous membrane is of the first rank. It is best appreciated by considering what happens when any respiration, or, in other words, the effect of nasal obstruction. Let us consider the commonest type of nasal obstruction, viz., that produced by naso-pharyngeal adenoids. Mouth-breathing is substituted for nose-breathing. Cold, dry, germ-laden air is inspired, instead of warm, moist, sterile air. Can we wonder that there is a tendency to pharyngitis, laryngitis, tracheitis, and bronchitis? Not only so, but there is undoubtedly a greater vulnerability to infection.
by germs of various kinds. Further, in mouth-breathers not enough air is inspired; the chest is not fully developed; aeration of the blood is imperfectly performed; general nutrition and growth is notably interfered with. So, too, the bactericidal action of the nose being in abeyance, the child is undoubtedly more liable to the onset of the ordinary infectious diseases. Happily, many of these untoward effects disappear when the cause is removed, and the results of a well-performed operation for adenoids furnish a convincing proof of the prime necessity of a normally acting nasal mucous membrane.

One of the most interesting relations between the nose and the respiratory system is the case of asthma. What the exact cause of asthma is, is unknown. That it is a neurosis characterised by narrowing of the calibre of the bronchioles is clear; but the exact seat of the lesion, or whether the narrowing is due mainly to spasm of the bronchial muscles or to vaso-motor tug-gescence of the bronchial mucous membrane, is unsettled. The fact, however, is clear that in many cases the irritation which starts the paroxysm of asthma proceeds from the nose, and in particular from a small region of the upper part of the nasal septum. By electrical stimulation of that area various observers have obtained increase in intra-bronchial pressure, and also spasm of the bronchial muscles. Clinical observations by Francis and others have shown that by cauterising this region very beneficial effects are produced in asthmatics. Dr. Francis goes so far as to say that "the greater part of asthmatics are to be cured by cauterising the upper part of the septum."

The relation between asthma and nasal polypi I have frequently seen in my own practice, and I can say that I have always found relief given by removal of polypi. The polypi act certainly not by producing obstruction, but by irritation; and a small amount of them is sometimes sufficient to give rise to asthma. Certainly no asthmatic ought to be considered as properly treated until the nose has been examined by a rhinologist.

Perhaps the most important relation between the throat and the rest of the respiratory system is that between pulmonary phthisis and tubercle of the larynx. Let me try to summarise the most important points in this relationship. The frequency of implication of the larynx in phthisis is very high. Fifty per cent. of post-mortem examinations of phthisis show deposit in the larynx; and during life laryngeal complications occur in from 10 to 70 per cent., according to the stage of the disease. Practically all laryngeal tubercle is secondary to lung tubercle; and the infection is conveyed both by the sputum and by way of the lymphatics. The importance of this relationship is that the prognosis of the laryngeal disease must always, whatever treatment be adopted, depend largely on the course of the disease in the lung. That is the predominant factor. So, too, no treatment of the larynx is likely to be of avail unless the patient is placed in surroundings by which his lung disease can benefit.

The result of this view is that nowadays all cases of laryngeal tubercle should be treated under sanatorium conditions, and that rest and the local application of galvano-puncture are the selected methods of local treatment.

The Nervous System.

The relations between the throat and the nervous system are many and complex. I will only refer to laryngeal paralysis as an example. Laryngeal paralysis is often the earliest sign of the gravest organic disease in various parts of the body, as will be seen by a consideration of the nervous supply of the laryngeal muscles. The cortical centres in the ascending frontal convolution; the centres for abduction and adduction on the floor of the fourth ventricle; the vagus nerves in its intracranial and extra-cranial course; and the recurrent laryngeal and superior laryngeal nerves in their long course to the larynx; all these may be the seat of disease, and may give rise to laryngeal paralysis, by which the disease may be recognised. Thus chronic medullary degeneration, as in loco-motor ataxia, general paralysis of the insane, syringo-bulbia, and the like, are all frequent causes of paralysis in the larynx. Anceuryms of the aorta or of its subclavian inanimate, or media-stinal growths that press on the trunks of the laryngeal nerves and produce a similar result.

Toxic causes, organic or inorganic, are a frequent source of laryngeal paralysis. In such cases the throat paralysis is often the most easily recognisable and may be the first clear sign of organic disease.

Laryngeal paralysis of organic origin often escapes recognition in the early stages because symptoms may be entirely absent. The fact that in these cases only the adductors are first affected, and that therefore there is no alteration of voice, serves to prevent attention being given to the larynx. This, in spite of Sir Felix Semon's insistence on it for many years now, does not seem by any means universally recognised by physicians. It cannot be too often stated that in suspected cases of such diseases as I have mentioned the larynx should be systematically examined whether the voice be normal or not, or whether dyspnoea exist or not.

I have not time to discuss the many aspects of laryngeal paralysis now. The most important conclusions I will draw are:

1. The absence of laryngeal paralysis in hemiplegic conditions owing to the fact that the cortical centres are each bilateral in action.
2. The significance of paralysis of the left cord as a sign of aortic aneurysm.
3. The value of paralysis of the larynx as a sign of chronic progressive nervous disease.
4. The absence of signs in the early stages, unless they are carefully looked for.

The relation of the accessory sinuses of the nose to the brain is one of great surgical interest. Thus disease in the frontal sinuses may give rise to abscess of the frontal lobe. Ethmoidal disease may produce meningitis, and disease of the sphenoidal sinuses, besides giving rise to intracranial abscess or meningitis, is in very important relation to the pituitary body. It is by no means unusual now for operations on the pituitary to be conducted by the intracranial route through the sphenoidal sinuses; a route which follows natural and developmental lines.

The Relations of the Throat and Nose to the Ear.

The separation of laryngology and otology in practice is impossible. Developmentally the throat and the ear are one: anatomically they
are continuous; and nearly all diseases of the ear originate in the nose or throat. Thus adenoid growth in the naso-pharynx produce deafness, and often disturbs the sense of taste. The bacillus of influenza may, and often does, ascend from the nose to the ear, to the lateral sinuses, to the brain. Obviously, treatment of the ear is unsatisfactory without treatment of the regions from which ear diseases start; and the prevention of ear disease means the removal of those conditions in nose or throat which produce it. Whatever be the artificial divisions imposed on teachers, no practitioner of ear diseases can possibly neglect the whole range of the throat and nose.

THE DIGESTIVE SYSTEM.

The cesophagus and even the stomach are now within the scope of the laryngologist—the invention of the cesophagoscope is beginning to throw a flood of light on the various causes of dysphagia, which before could only be guessed at. Foreign bodies in the cesophagus, instead of being cut out by a dangerous operation, are now removed by the safe assistance of the forceps guided by the eye. There can be little doubt that the gastroscope will do for diseases of the stomach what the cesophagoscope has done for diseases of the bladder and kidneys.

This is only a slight and imperfect sketch of some of the relations of medicine and surgery to laryngology. No man can now repeat the proud boast of Bacon, and "take all knowledge for his province"; but he should aim at least in medicine at "knowing something of everything and everything of something." The general practitioner, whether of medicine or surgery, should know enough of laryngology to be on the alert and when necessary seek the aid of the expert. The specialist should remember the dictum of Virchow: he should not wrap himself or his subject in the mantle of mystery, or obscure knowledge by the undue multiplication of esoteric terms. Let me conclude by paraphrasing the words of Lord Bacon: "He is the best practitioner who, being a general surgeon, inclines to the methods of specialism, or who, being a specialist, inclines to the methods of general pathology and general medicine."

GUNSHOT AND BAYONET WOUNDS OF THE STOMACH. (a)

By CHARLES GREENE CUMSTON, M.D.,
Privat-Dozent at the Faculty of Medicine of the University of Geneva; Fellow of the Royal Society of Medicine (London); Honorary Member of the Surgical Society of Belgium.

A BAYONET wound is in all respects similar to a wound of stab, but the lesions produced by the Lebel bayonet present certain special characters which should be taken into consideration. The Lebel bayonet has four sharp longitudinal projections, separated by four corresponding grooves, and its effects have been studied by Sieur in an article which appeared in 1900 in the Archives de Med. et Pharmacie Militaires.

He found that the wounds produced in the stomach and intestine were rounded, with irregular and slight degrees of incongruity. The surgeon recognized, however, that the bullet, not only when Sieur undertook on dogs, he found that after the bayonet had been withdrawn the borders of the wound came back in contact with each other, causing complete occlusion of the perforation, through which it was difficult to cause the exit of the gastric contents. On the other hand, when the arm remained in place, the grooves formed true gutters, along which the gastric fluid escaped and accumulated in the peritoneal cavity. It was the opinion that this bayonet acts by retracting the tissues upon their section or laceration, and this applies to the muscular fibres in particular. A soldier who was wounded by this bayonet in the epigastric region and who died four months after the accident, Virchow appeared the. The practitioner of medicine. However, if the stomach was full of food and completely transpired, no gastric contents were found in the abdominal cavity. A young girl who was wounded in the epigastric region by a Lebel bayonet presented distinct symptoms of gastric perforation but recovered without operation.

Referring now to the most important part of the subject, that of gunshot wounds, it may be said that today the armament of every country consists of pointed projectiles of small calibre, animated by a very great penetrating force. The modern projectile is elongated in shape and of an average calibre of seven millimetres; its length is equivalent to four times its calibre, and it weighs about 15 grams. The nucleus is composed of an amalgam of lead and antimony, which forms a very hard mass, and is covered at the apex at all events, and usually also on its other surfaces by the thin layer of the hard metal. Of the new German S bullet, the new French D bullet, and other types now being studied in Switzerland and elsewhere, we shall, unfortunately, have an ever-abundant demonstration of their respective values.

The lesions differ according to the distance at which the arm has been fired. Beyond 300 metres, these projectiles produce simple perforations which are small and limited with rare instances extending the tissues like a gimlet, spreading them apart, with the result that the borders of the wound may close together, producing an almost complete occlusion. The opening of the exit of the projectile is generally somewhat greater than that of the entrance, and the distance is less than 300 metres the lesions vary according to the state of plentitude of the stomach. When the organ is empty the wounds present the same characters as those just enumerated and the resulting disturbances will be slight, but the same cannot be said when the stomach is distended with food, and the result is a genuine bursting of the viscus. Such lesions have been produced experimentally by Gurnon and Delbo in their work entitled "Traité de Chirurgie de Guerre." He states that under these circumstances, besides the entrance perforation, which has the diameter of the projectile, the exit perforation considerably larger, the viscus becomes torn and the wound is converted into a simple perforation.

Gunshot wounds of the stomach are very frequently accompanied with wounds of the neighbouring viscera. When the shot is fired at a moderate distance the projectile generally transpierces the subject, passing through the pleura, lung, liver, spleen, pancreas, kidney, or even the pericardium and heart. The minimum of damage is met with when the projectile enters in the area of Labbe's triangle, an area in which the stomach is in direct relation with the inferior abdominal parietes, but even here the organs situated behind the stomach (kidney, pancreas) will probably be involved. In other instances the track followed by the projectile is along the line from the entrance to the exit, the latter follicles the axis of the body. This is met with frequently in soldiers who were in the recumbent position at the moment they were shot, and under these circumstances the lesions are multiple and varied. In the case of the point of entrance of the projectile in the anal region, while the point of exit was found in the left sixth intercostal space in the mammary line. The bullet laccerated the hypogastric vein, perforated the small intestine several times, perforating the contents and mesenteric vessels. The whole stomach alone is involved, or at least represents the principal lesion. It is just these cases that we shall more particularly consider when speaking of the
operative treatment, when this can be resorted to with the slightest chance of success, as we shall see. The object is to abstain from a large number of wounds that I may term the area of gastric vulnerability, and which corresponds to the projection of the stomach on the abdominal wall. Over the anterior abdominal wall the stab wound is often so near the axis almost vertical, or perhaps it would be better to say slightly inclined from left to right and from above downwards, whose greater extremity occupies the left hypochondrium, while the lesser is situated to the right of the umbilicus. The upper limit of the line corresponding to the limits of the upper abdominal region is represented by a curved line with its concavity parallel to that of the diaphragm, whose uppermost point is at the level of the left rib in the midclavicular line. This line undergoes slight oscillations with the respiration.

The lower limits vary. When the gastric cavity is empty they correspond to a transverse line passing at the point of union of the ninth and tenth rib on each side. When the stomach is distended it becomes displaced downwards, and since opinions differ as to this point I will merely say that the most declivous point of the full stomach will be found in the neighbor of the heart.

The left lateral limit in the state of complete dis-tension becomes confounded with the limits of the hypochondrium. Usually it attains a vertical line, passing slightly to the outer aspect of the navel. The right lateral limit corresponds to the right abdominal recess, which is also subject to variations, but which in its mean situation is found behind the eighth rib, this point corresponding to the external border of the rectus.

Over the posterior abdominal wall the projection of the stomach affects a shape similar to the anterior.

The culminating point of its upper curved limit is at the level of the eighth rib in the left scapular line. In the middle line, its upper limit corresponds to the lesser curvature, obviously crosses the spine from left to right and from above downwards, extending from the left side of the tenth thoracic to the right side of the first lumbar vertebra.

When the stomach is distended the lower limit reaches about to the spinous apophysis of the second lumbar vertebra.

Let it not be understood that a wound whose orifice of penetration is located outside the limits of the area here given may not involve the stomach. With fire-arms this can perfectly well happen, but in this case involvement of the stomach is rather the exception.

Gunshot wounds are the most frequent of any in battle; lesions from the bayonet are the exception. Usually the damage done by the projectile within the abdomen is so extensive that death results at once. Logically, it may well be argued that a laparotomy is indicated to be done for the danger of abdominal hæmorrhage, and above all, the effusion of the gastric and intestinal contents. This is what the majority of surgeons thought who were called into action in the South African War, and everything had been prepared for the operation of abdominal wounds by immediate laparotomy. But the results of this practice quickly showed that the mortality of the operated cases was greater than of those patients treated by temperation, and this is laid down as the surest indication of that which has been written on the subject is that a great number of those thus wounded die before they are removed from the field, that among those removed a number die from peritonitis, but quite a large proportion of abdominal wounds by immediate laparotomy. But the results of this practice quickly showed that the mortality of the operated cases was greater than of those patients treated by temperation, and this is laid down as the surest indication of that which has been written on the subject is that a great number of those thus wounded die before they are removed from the field, that among those removed a number die from peritonitis, but quite a large proportion recover without operation, and that almost all submitted to laparotomy die. Consequently, at the present time opinion is unanimous that abstention is proper, and this is undoubtedly the correct view for the reason, since time required in carrying out these operations is pure loss and could be far more usefully employed in other injuries.

The results were quite the same in the Russo-Japanese war, and it is sufficient to read the article by the Russian surgeon Wreden, published in The Military Surgeon, March, 1907, in order to become convinced. In his paper on abdominal wounds in the same war, published in the 8th volume of "Langenbeck's Archiv," Bumhardt gives statistics of 182 cases treated. All the cases were brought in late to this surgeon, and he obtained a cure in 78 per cent. of those treated by conservative surgery, while 50 per cent. of the operated cases died. He said that the majority of these presented peritonitis at the time of operation.

Peritonitis is the only late indication for operating, and in these cases it should be reduced to the minimum. Simple incision to let out the pus and drain the peritoneal cavity, without searching for the gastric lesions, which, unlike wounds of the intestines, have a much more favourable evolution. However, the removal of the great vessels of the thoracic and abdominal viscera may create special indications, such as hernia of the intestine and, above all, intra-abdominal hæmorrhage. What has been said of gunshot injuries to the stomach should quite as well to lesions from the bayonet, whose resulting wounds generally have a favourable evolution.

The conservative treatment consists in absolute rest, and, if possible, the subject should not be mobilised. This latter is the first condition of classic conservative treatment. Morphine and opium are to be administered and an absolute diet maintained for the first few days, which should be continued just so long as there is no indication of evacuation of the gastric perforation. Usually, feeding by mouth can be prudently commenced by the fourth day, but it may have to be postponed for a week or so. During this time rectal feeding is exclusively employed, along with the subcutaneous administration of antispasmodics.

There are those cases which will die from internal hæmorrhage, as I have already said, if not immediately operated on, and this is the only indication for surgical interference in abdominal wounds on the battle field, since an hæmorrhage is undertaken for the control of the loss of blood, after this has been accomplished, it is better, perhaps, to do a complete piece of work since the abdomen is opened, and close up the intestines or intestines if they are present. For this reason, and in order to give a clear idea of the operative technique of gunshot and stab wounds of the stomach, I desire to go into the surgical treatment at some length, although the indications are very restricted in the surgery of war, as I have endeavoured to show in what has been said.

Given a case presenting the classic symptoms of intra-abdominal hæmorrhage, and supposing that the patient can be transported in sufficient time to the field hospital, the proper indication is to carry the patient in the middle position in gunshot wounds, because by this a much better exploration can be made and the lesions found. The lesions which cause the hæmorrhage may be so serious that even spleen, liver or parts of the intestines, or the lesser curvature of the pancreas or liver can be sutured. Therefore begin at once to examine for the sources of bleeding in the left hepatic lobe, pancreas, spleen and kidneys, because gunshot wounds of these viscera are detected by the flow of blood. When this has been found and the proper treatment applied, one can next proceed to explore the small intestine for perforations, never forgetting the duodenum. Then the stomach is examined, and if wishes it is important upon you the importance of never neglecting the examination of the posterior gastric wall as well.

In bayonet wounds the exploration of the abdominal viscera needs to be as complete, because in a considerable proportion of cases from this cause are infrequent, but nevertheless, the arm may enter deeply and involve deep-seated structures, such as the spleenic or renal vein. Examination of the cardiac and pyloric portion of the stomach, which needs to be explored in gunshot perforations from stab wounds are practically unknown. When the hæmorrhage has been controlled and the gastric perforation found, you will proceed to deal with it. It is needless for me to go into the treatment of opening of the biliary tract in which a bullet enters through the thorax into the abdomen, as it is too formidable an operation to be done in a field hospital, and therefore I shall not refer to it.

Gunshot wounds of the stomach usually penetrate both walls of the organ, and median laparotomy is the proper incision. Of the other incisions I shall say...
the posterior aspect and carry out a careful cleaning of the posterior gastric space. The greater curvature need not be divided if the opening is made two centimetres from the stomach, so as to avoid the gastro-omental arteries.

In some special cases extra-gastric exploration will be insufficient if the full stomach is to be resorted to, but before doing this a cushion should be placed under the lumbar region, which may render the examination easier and the endo-gastric procedure may not be required.

Two points which must be considered when the incision is made. First, the posterior gastric wall should be horizontal, at least three inches long, and made at equal distance from the curvatures. Introducing the hand behind the stomach, the posterior wall is palpated, and the incision is made. The mucosa is wiped with compresses, after which the surface is examined. One may thus discover an ecchymosis or a perforation which would otherwise have been overlooked.

This technique, which in gastric ulcer is rather simple, is less so in traumatic perforation, because in the former the gastric cavity is apt to be empty, while very frequently the stomach is full at the time the gunshot injury is received. In such cases the contents must be removed through the incision, with all due care not to let any of it escape into the peritoneal cavity. Very few surgeons have resorted to endo-gastric exploration in gunshot wounds. However, this is the only one where the posterior perforation has been overlooked. In the case of President McKinley, the anterior perforation was simply covered over with the duodenal cavity explored with the finger, and the posterior perforation was only discovered by a direct examination of the posterior wall.

It is true that simple inspection of the outside of the stomach wall may fail to reveal a perforation, and this has happened in several cases, but it is uncommon if the operative technique that I have advised is followed. Always remember that the perforation in the posterior wall may be in the duodenal cavity exposed.

There is one lesion that may require gastrotomy for its discovery. I refer to contusion of the posterior gastric wall from the projectile. This lesion is uncommon, but it is often the cause of haemorrhage and ulceration. It is also indicated when external exploration does not reveal any lesion sufficient to explain the symptomatology, when, for example, there is free haematoma due to contusion of the stomach without perforation, which is not so often observed in practice. As can readily be seen, the endo-gastric exploration has a limited field of usefulness, but occasionally it may be required.

The closure of the perforation in gunshot wounds is a necessary operation of the gastrointestinal canal. When there is much contusion of the borders an economical ressection of the exsanguinated mucosa is indicated. When the opening is at the pylorus or cardiac end of the stomach, the suture should be placed perpendicularly to the axis of the portion involved, in order to prevent stricture. If the loss of tissue is considerable, it is better to suture the perforation in the skin in order to save the vitality of the great omentum.

The peritoneal cavity must be drained with care, the best manner being through a lumbar incision. It can be done, however, through the stomach wound. Packing the retro-gastric space may be necessary for controlling slight bleeding from a sutured pancreatic perforation. Absolute quiet is essential for the first few days, and feeding by mouth can usually be begun on the fourth day, but should consti-
ing occur it must be stopped at once and not again attempted for several days.

In closing let me say that I have only dealt with the operative treatment of gunshot perforations of the stomach as met with in the field hospital, and allow me to again impress upon you the fact that these should never be treated surgically unless laceration is severe enough. When in doubt the lives of the two or three patients in the room will be saved under the circumstances by a careful conservative treatment.

OPERATING THEATRES.

ROYAL FREE HOSPITAL.

Cystic Adenoma of the Breast.—Mr. Willmott Evans operated on an unmarried woman, aged 34, for a swelling of the breast. She had noticed a swelling in the right breast for more than three years. It had increased in size during this time, and she had occasionally felt in it some indefinite feeling of pain, but not sufficiently to give her any trouble. Her reason for coming to the hospital was her anxiety at the presence of a tumour and her fear that it might possibly be cancerous. On examination it was found that a swelling was seen in the upper and outer segment of the right breast; the skin over it was not discoloured and the nipple was not retracted. On palpation it was felt to be a rounded swelling about an inch in diameter, and it could at once be felt that it was a cyst. Aspiration could be elicited. The skin was not adherent to it, and it was not adherent to the pectoral major muscle. No glands were perceptible in the axilla or above the clavicle. A diagnosis of cystic adenoma was made.

The patient having been anaesthetised, an incision two inches in length was made over the swelling in a direction radiating from the nipple. A very thin layer of normal tissue was cut through, the capsule of the tumour was opened, and from it the growth was shelled out without difficulty. Two small vessels needed ligature, the skin was sutured after a stitch had been put in to bring the walls of the cavity together, and the wound was dressed with aseptic gauze.

Mr. Evans said that in this case the diagnosis was not difficult. In the first place, the long history, more than three years, was greatly against the idea of malignancy, for although a malignant growth may develop very slowly, yet in three years it would almost certainly have given some indication of its malignancy, such as retraction of the skin over it, adhesion to the skin, or the presence of enlarged lymphatic glands. In the second place, fluctuation showed the presence of liquid, and therefore the tumour contained a cyst, and cysts, though not uncommon in different parts of the body, are very rare. The next point to be considered is whether it be desirable or necessary to excise simple growths of the breast; in the majority of cases they do no harm, but occasionally they become malignant, and over they may give rise to much anxiety. On the whole, therefore, it is best to remove a simple growth of the breast. The incision to be employed in removal of a non-malignant growth of the breast is of some importance. When the edge through the cavity of the breast, it should radiate from the nipple, otherwise some of the lactiferous ducts are liable to be cut across, and this might lead to retention cysts in the breast. Sometimes it is possible to choose the position of the incision as to make the scar least prominent. This may be accomplished by making the incision below the lower edge of the breast and curving it so as to follow the contour of the breast. The organ is then raised from the chest wall and it is incised on its posterior aspect over the tumour. When the wound is healed the breast will hide the scar. This method is not suitable for those cases in which the growth is close to the surface. When the breast is large the commonest benign tumour of the breast is the adenoma, though it is rare to see it without some fibrous tissue, but the relative proportion of fibrous and glandular tissues varies enormously in different cases; sometimes the amount of glandular tissue is so small that a hasty examination of a section with the microscope might lead one to the belief that it was very extensive and that the breast is extremely liable to the formation of a cyst, so there is no reason for surprise that cysts are occasionally found in conjunction with adenoma, and that this tumour is not uncommon in cases which are occasionally found in conjunction with adenoma.

From the report of the Business Committee of the General Council of the University, presented at the statutory half-yearly meeting of the latter body on October 30th, it appears that the number of matriculated students is 700 less than last year, and of the great majority are serving with the Crown. It is known that between 300 and 400 members of the O.T.C. have received commissions. Many graduates are also under arms, and twelve members of the staff are serving with the Forces. At the meeting of Council reference was made to the gratification all felt at the rôle played by their Alma Mater, and it was stated that efforts are being made to compile a roll of honour of the University and to have it published.

TRAGIC DEATH OF ARMY DOCTOR.

On the 22nd the Edinburgh express due at Glasgow about noon was approaching Uddingston station near Glasgow, a gentleman of military appearance who was sitting on a seat at the extreme west end of the down platform, was struck by a train in some unknown manner just below the waist. It was not possible to piece together the circumstances of the accident, and there was no apparent cause.

The Edinburgh Students under Arms.

Infectious diseases in Glasgow are limited to the extent of 6,065 cases, in the city hospitals and under sanitary supervision at home. This includes cases of tuberculosis.

MEDICAL, MEN AND MUNICIPAL ELECTIONS.

The war is not interfering with municipal elections on this side of the border. We are further protected from the chief scene of hostilities, although taking four full shares in the combat. In Glasgow two medical practitioners are seeking seats in the Town Council.

One, Dr. James Erskine, is put forward by the Labour Party, in Anderson Ward. He was in the Council for four years, but lost by a vote. The other, Dr. R. B. Letham, is standing against a labour candidate and another candidate in a three-cornered contest.
THE DISTRESS IN THE RANKS OF MEDICINE IN BELGIUM.

To the Editor of The Medical Press and Circular.

Sir,—Professor Jacobs, of Brussels, who has himself been serving on the Red Cross in the war in Belgium, has come to England in order to enlist the sympathy of the medical profession and the public generally for the sad and pitiable condition of the doctors throughout Belgium. The object is to raise an international fund for their relief. The subjoined statement gives briefly the proposals of the Belgian Provisional Committee, and as it is of urgent importance that these should be widely known, may I ask for its insertion in your columns. I am, Sir, yours truly, 

H. MACNAUGHTON-JONES.

Harley Street, London, W.
November 1st, 1914.

The consequences of the terrible war now raging are disastrous in the extreme for the profession in Belgium. Already a large number of Belgian doctors have been shot and in many cases they will meet the same fate. The majority of the doctors living in the towns and villages that have been pillaged and burnt are utterly ruined. The demand is pressing for immediate assistance for the widows and orphans of the doctors slain in action, and for zealous protection of those who are deprived of their means of existence through the devastation caused by the hordes of Germans who have overrun the country. The winter is approaching, and epidemics are likely to be anticipated, and the hunger-stricken people, enfeebled by privation and suffering, will fall an easy prey to infectious diseases. Utterly destitute, they cannot pay for treatment at the hands of men, the majority of whom are themselves unable to earn an existence for themselves and families; no need is there to dwell on the miserable plight of those who find themselves in such straits. Equally unfortunate are the pharmacists whose laboratories have been burnt. At such places as Tarnipes, Malines, Louvain and elsewhere, temporary laboratories have been formed from out the dibris of the smoking ruins of their establishments.

A provisional Belgian Committee has been formed consisting of Professors Stizen and Jacobs, of the University of Brussels, Professor Béco, of Liége, Professor Schockaert, of Louvain, and Professor Benge- 

mans, Secretary of the National Therapeutical Society of Belgium. The objects of the Committee are to do:—

1. To seek to organise relief for the doctors and pharmacists deprived of their means of livelihood.
2. To establish an annuity fund for the widows and orphans of those killed during the war.

It is proposed to create towards this fund—raised by voluntary subscriptions, will be devoted to the urgent needs of those requiring immediate assistance, both medical men and pharmacists. The other will be a loan fund, the money to be given on a small rate of interest on a guarantee of its being returned at a specified time. This will enable the doctors to continue their work. The details of working out the scheme will be arranged by a Central Committee set up by the London Committee of our Army. It is hoped that the work will extend to the Colonies, the United States, Italy, Sweden, Norway, Brazil and the Argentine Republic.

(Signed) JACOBS.

Professor in the University of Brussels.

THE STUDENT'S TRAINING.

To the Editor of The Medical Press and Circular.

Sir,—The increase of work laid upon the medical profession by the National Health Insurance Act is now greatly augmented, and for an indefinite period, also by attendance on the sick and wounded soldiers of our Army. The demand for medical men being in excess of the supply brings into higher relief the question of whether, in some subjects, the knowledge required by our Universities and licensing authorities from candidates for a qualification is excessive. Take, for example, chemistry. The medical student attends a course of chemistry equally suitable for one who is going to be a manufacturing chemist. The Examiner figures in what a practical chemist has need of acetic acid, but he has no idea of the shape of vinegar or otherwise, nor can he procure any food or beverage for love or money within many miles. He therefore imagines the matter for his laboratory for himself, and in anticipation of this he asks the medical student in his examination paper: "How can acetic acid be prepared from wood?"

Again, in the domain of zoology, the question is a likely case, in which a man rushes into the consulting room of a medical man and desires to be informed what the cyclostomata are. In answer to the patient's inquiry, the doctor, having a retentive memory and an eye to the purpose of a question, puts to him in his paper on zoology, is able to reply that the cyclostomata are an order of cartilaginous fishes having circular mouths. The student pockets his fee and the patient's paper. When so many special subjects of a more useful

BELFAST.
ROYAL VICTORIA HOSPITAL.

The Board of Management of the Royal Victoria Hospital, Belfast, have had within the last few days to determine a rather important question—namely, the propriety of admitting to its out-patient department and wards women holding the certificates of the St. John Ambulance Association and of the Red Cross for a short period of training. A like privilege was sought to be conferred by the Technical Institute of Belfast for members of classes in first aid and nursing. These applications received very careful consideration, and the arguments pro and con were impartially placed before the decision. The Board was much influenced in the fact that the War Office had declared that none but fully-trained nurses would be sent to the front, and that a reserve of at least 1,000 trained nurses would be sent to the front, and that a reserve of at least 1,000 trained nurses were in readiness to proceed to the front if required. The Board of Management further considered that while a body of medical students numbering 150 and over, in addition to a large number of probationers, were receiving instruction who as students doing a good work, were after all rather of the nature of amateurs.

LETTERS TO THE EDITOR.

[We do not hold ourselves responsible for the opinions expressed by our Correspondents.]
type are being added to the later years of the student's curriculum, is it not high time that less knowledge should suffice him in physics, chemistry and zoology?

I am, Sir, yours truly,

Observer.

NEWSPAPERS AND QUACK ADVERTISEMENTS.

To the Editor of THE MEDICAL PRESS and CIRCULAR.

Sir,—My attention has been very much drawn to this subject by the great, although by no means too great, amount of advertising. Much of it is taken in one of the foremost London daily papers; and until recent years have never troubled about the advertisements, or given any serious thought to them. I am now more alive to the facts explained in your pages; and am able to be the more sensible of the magnitude of the scandal. I have carefully scrutinised the pages of my paper since the issue of the Report on Patent Medicines. This paper had an editorial notice of the report. I send you a selection of cuttings of glaringly fraudulent character which are daily appearing, including one of the most impudent of the day, in which an attempt is made to exploit our brave soldiers at the front. The Editors, the owners, and the manager of the paper I allude to are each and all aware that the advertisement is a swindle.

I am, Sir, yours truly,

J. Wilson.

October 16th.

OBITUARY.

MR. ALFRED H. JACOB, L.R.C.S.I.

We regret to announce the death of Mr. Alfred Hildebrand Jacob, L.R.C.S.I., which occurred last week in Dublin from ill-health. Dr. Jacob obtained the diplomas of the Conjoint Board of the Irish Royal Colleges in 1890, and spent most of his professional life in South Africa. He practised for many years at Dewetdorp in the Orange River Colony. Early in the present year he returned to Dublin. Dr. Jacob came of a family closely associated with this journal. His father, Dr. A. H. Jacob, was for many years our Irish editor, and his grandfather, Dr. A. Jacob, was the founder and first editor of the Medical Press.

REVIEWS OF BOOKS.

CANE SUGAR AND HEART DISEASE. (a)

Dr. Goulston's studies on the effects of cane sugar in heart disease have been familiar to us for some time past, and we welcome with considerable pleasure the appearance of his observations on this remedy along with the notes of twenty illustrative cases collected together into the present volume. In the first chapter the author gives an account of the manner in which he was first led to adopt the sugar treatment thirteen years ago in a case which did not respond to drugs, and as a forlorn hope. The treatment in this case was entirely successful, as have been a large number of others running into hundreds, various representative and characteristic ones being quoted by him. The author draws particular attention to the fact that pure cane sugar must be used, since those prepared from the beet is found to be inefficacious. All modern physiologists agree that the glycosen stored in muscle is converted into dextrose by an amyloergic ferment. What is not so generally known is that dextrose has a powerful nutritive effect upon the human muscle. Hence, from this it follows that cases in which the myocardium is at fault are those in which cane sugar has a specific action. Such are auricular fibrillation in particular, and those with evidences of high blood pressure and arteriosclerosis.

We are of the opinion, from the illustrative cases published by the author, as well as those written by his own experience, that Dr. Goulston has amply proved his point, and we congratulate him upon bringing forward a valuable addition to the armamentarium of the physician in cases of cardiac failure.

THE NEWER PHYSIOLOGY. (a)

The bearing of many physiological problems and principles upon everyday medical practice is becoming gradually more recognised by others beside the consulting physician. To the general practitioner as much as to the specialist. Every one will the contents of Prof. Short's excellent little manual in mind, and will seek for its contents, fuller and newer than in the first edition three years ago, include such subjects as vitamins, surgical shock, transplantation of bone, pulmonary feeding, purin bodies, acetaminia, nerve injuries, and many others which have a close relationship to the common aspects of disease which confront us all. The author considers that the abiding value of Prof. Crike's work lies in the beneficent effect of his method of nerve-blocking local anaesthesia whereby the lower level centres of the cerebro-spinal axis are protected and general shock thereby prevented. A clear account is given of the modern view of the absorption of foodstuffs in man, as well as of the use of amino-acids, which are the actual substances that enter the blood-stream. Since the fermentation converts the peptones into amino-acids it must not be supposed that the patient is in the necessity of digesting peptonised foods when these are administered. With regard to the question of the absorption of foodstuffs by the large intestine, Prof. Short assigns that the crucial experiment is, Can amino-acids be absorbed? In order to point the author, together with Dr. Bywaters, estimated the nitrogen in the urine in patients after daily enemata of milk pancreatised for twenty-four hours, so as to convert most of the protein into amino-acids. They find after analyses that these bodies are absorbed, and that therefore patients may be rendered by rectal injections of milk thus pancreatised, even though ordinary peptonised milk be a failure. In the concluding chapter on cutaneous anaesthesias the author effectually disposes of the idea that belladonna liniment diminishes the sensibility to pain over the area to which it is applied, but "it is a thankless task," he says, "to pull down stronghold of belief, but it is necessary if only to direct more attention to the true means of giving relief to pain, including general drug treatment, rest, massage, counter irritation, the localised, passive, and active. Prof. Short's book is one that deserves to be widely read by all who desire to keep up to date in their work.

BACTERIOLOGY. (b)

This book has always been very practical and noted for the wide ground it covers. Prominent teachers of clinical bacteriology as a rule give scant attention to disinfection and water bacteriology. Prof. Hewlett is as competent an authority on sanitary bacteriology as he is on the clinical department, and every part of the subject receives thorough treatment. Every effort has been made to publication, and the work has been accomplished for the benefit of those who are so well advised as to get this fifth edition. Criticism and description are alike excellent, so, too, is the aspect of the whole. The book is highly noticeable in the case of diseases that have recently proved pregnant sources of speculation. The author limits himself to mention of the probable rôle of flies and flies.

(a) "Cane Sugar and Heart Disease," By Arthur Goulston, M.A., M.D.,Cantab, Demy Sto, Pages viii. and 107. London: Balliere, Tindall and Cox. 1914. Price 5s.

naso-pharyngeal necrosis when dealing with infantile paralysis, and no mention is made of old wood, cancer houses, and uncooked vegetables when dealing with malignant disease. As far as nasal discharges are not due to a micro-organism, but is derived from the irresponsible division of cells of the normal or of embryonic tissue. While one can understand an omission to deal with swine fever seriously, we think it unfortunate that the book contains an account of epidemic abortion in cattle. The book now contains descriptions of the cultivation of spirochetes, but although the author mentions Noguchi's "heliom," he contented himself with a remark that in a future publication this will be discussed. It develops at the site of inoculation.

Special commendation must be given to the chapter on leprosy, not only for the treatment of the various conditions, but also for the trite statement that the mode of spread is probably by personal contact, though possibly insects play some part—an excellent and very judicious comment on the radically opposite opinions of leprous that as to infectivity. This is in tacit agreement with the resolutions of the Bergen Conference of 1909.

Since this book went to press, the report of the Inter-Departmental Committee on Sleeping Sickness has been published and has emphasised the existence of two distinct and separate forms of the disease—the Uganda form and that prevalent in Nyassaland and Rhodesia. Professor Hewlett's book was quite ready with a description of Tr. Reduvioides. In these circumstances, there is little real progress chronicled since 1903. Many methods of testing them have been acclaimed and then fallen into disuse. The one only that is at all seriously discussed has been the streptococci, and the only one that we have been able to recognise among the list of those who have studied the question will criticise the omission of more than brief mention of many others.

Bacteriologists have differed considerably over the relative longevity of B. coli and streptococci in the tissues, and a reasonable deduction is that under different conditions either may outlive the other. Further, it is alleged, though the reviewer has never met with a case, that sometimes the streptococci will kill off the colon bacilli, with the result that when the latter only is estimated a grossly polluted water may appear free from faecal contamination. At any rate, in the present state of our knowledge it would certainly seem wise to insist on an enumeration of streptococci waters which do not give dawning evidence with the estimation of colon bacilli.

PAIN, ITS ORIGIN AND SIGNIFICANCE. (a)

Pain is well nigh ubiquitous; it is present in almost every emotion. It is often the first, if not the only, symptom that brings the patient to the physician. Dr. Behan has realised this, and, seeing the importance to every medical man of intimate familiarity with its causes, course, and circumstances generally, has offered us this book. It is a fine book and a good book. The author has diligently searched the literature, as a bibliography of no less than 63 pages shows, and has extracted from it a text of great value. The valuable experience he has sat down and sorted and seasoned with the salt of his own knowledge, and the result is practically an exhaustive treatise on its subject.

We agree that the anatomy and components of every imaginable pain. Pains are discussed according to their locality, the causation, their intensity, and their significance, and a determined effort is made to define the term "pain." The author has produced a statement without a reference, and an authority is even cited for the description of the behaviour of an earthworm suffering from mechanical division. There is nothing that the author has spared himself, and his labours have produced a book that we well consider as complete. There is not much in it that is original or brilliant, but it has all the solid virtues. It is definite in its statements, as far as we can judge it is trustworthy, and it gives both sides of any disputable question. It is amply and on the whole well printed, and the illustrations are entirely those in Figs. 37, 85, 101, and 107, are technically poor, and could be easily improved. The book is well printed and adequately bound, and we detected no misprints. In short, Mr. Behan and his publishers, have produced a work that gives us a very full and accurate résumé of our present knowledge of pain, and we find it hard to imagine that anyone interested in this subject could search this book for information and go away disappointed.

IONIC MEDICATION. (b)

The principle of the electric penetration of drugs in the form of ions as utilised in the treatment of disease has been the subject of the researches of a number of practitioners since the researches of Leduc into the subject in 1903. When one considers the case with which ionic medication can be applied and the simplicity of the apparatus required it is rather surprising that this method of administration of drugs has not become more general, for it cannot be denied that the results obtained by it are often extremely good. As an introduction to the subject, giving at the same time full details of how to deal with the ionic method, this handbook fulfils every requirement, and the practitioner who follows the plain directions laid down therein will speedily become an adept in the art of ionic medicine.

This book will be welcomed by anyone who considers that ionisation is more effective than by any other methods of treatment in the troublesome and painful conditions around the elbow-joint, often described as 'tennis elbow.' In lumbago. Facial paralysis, and the modern malady known as fibrositis, a few applications of the salicylic ion to the areas affected will afford relief quickly, and may bring about a cure. The treatment of rodent ulcer by zinc ions is sometimes quite brilliant, and the absence of the nausea with which the author thinks may be ascribed to the imperfect penetration of the ions, which are precipitated in an insoluble form as zinc phosphate when they come into contact with the plasma. The first two chapters dealing with the necessary apparatus should be thoroughly mastered before attempting to apply the treatment to patients.

ALCOHOLIC FERMENTATION. (c)

The question, and questions, of alcoholic fermentation show no indication of decay of interest for the inquiring mind of fallen humanity since (pretty surely long before) our common ancestor planted the first grain of barley and watched the harvest rise from the arid. Not merely does the alcoholic question continue to advance in "a general way" with the collective wave-front of all physical science, it presents a subject in which the poet and the physicist and the physiologist and the industrialist and the philosopher and the theologian all command a voice. The existence was voiced in the paradoxical aphorism of one of the most highly inspired of all poets: "Man, being reasonable, must get drunk." Thus, while humanity will continue to remain in its present unregenerate state, the preparation and properties of alcohol will assuredly continue to furnish some of the most important and interesting of existing questions and considerations: for the economist, the politician, and the philosopher, and the industrialist, and the physiologist, and the theologian.

The present work represents an expansion of lectures formerly delivered by the author. Very necessary indeed an intelligent reader will have anticipated, its text does not detract from what has been said or guessed about the inexhaustible subject of fermentation, but it skims the cream of historical presentation and of physical result which has floated over the perfect surface of the problem. It affords analytical action and reservoir of synthetic thought.

(6) "Tonic Medication." By H. Lewis Jones, M.D., F.R.C.P., Consulting Medical Officer to the Electrical Department in St Bartholomew's Hospital, London. Price 2s. 6d. net.

(c) "Alcoholic Fermentation." By Arthur Harden, P.D., B.Sc., F.R.S., Professor of Biochemistry at the London University, etc., etc., London, New York, Bombay, Calcutta and Madras; Longmans, Green and Co. 1914.
The text and bibliography of this second issue have undergone important expansion. The author is a past master of his subject, who is quite masterful in the arrangement of his facts and lucidly of his explanations as he is in his personal grasp of all the threads of the otherwise tangled skein of his data, and the penetrating power of his logical illumination of every facet of his kaleidoscopic subject. It is hardly necessary to add that we anticipate an early appearance of the third edition.

FALMOUTH IN WINTER.

The Corporation of Falmouth have sent us the official guide to that town and its environs, thereby hoping that the publication of a clear and illustrated statement of facts of the coast may attract some of the throughs of pleasure seekers and of delicate individuals who yearly migrate to the French, Italian, and Algerian coasts from the United Kingdom on the approach of winter. That Falmouth has justification for its claim of "Queen of the West" on the Cornish Riviera must be admitted by all who have personal knowledge of the beauties of nature here revealed; and the tables of sunshine furnished by the Meteorological Office tend to prove that we will not miss this in this direction through enforced absence from their accustomed Continental residences. That our charming resorts on the South-West Coast of Great Britain, such as Bournemouth, Torquay, Devonport, Truro, Penzance, Newquay, and others, have thrown into their own this winter is assured. What the army of mere pleasure-seekers will miss are such distractions as Casinos, Bailleries, Battailles des Fleurs, etc., but the absence of these must not affect that still greater army of invalids and those whose constitutions are not sufficiently robust to withstand the winter amenities of our great cities. These will naturally seek advice of the medical profession, and they will, moreover, have this item to the credit of their purse and of fatigue, that through the enterprise of the Great Western Railway Company they have now but six hours' railway journey from London in luxuries trains to reach that beauty spot, Falmouth, on the Cornish Riviera.

LITERARY NOTES.

We have received from Mr. H. K. Lewis, of 156 Gower Street, London, a "List of Medical Journals," conveniently grouped under subjects and giving the subscription rates. It could be of use to librarians, secretaries, and individual medical men and specialists seeking information respecting periodical publications. Thus, "General Medicine" is represented by eighty journals, including the "Nervous and Mental Diseases," by fifty, among which about half of the 350 titles given are unprocurable, while this disastrous war lasts. We would draw the publisher's attention to the error, giving the annual subscription for the Medical Press and Circular outside the British Isles as 23s. 6d. It should be 21s., the same as in the United Kingdom.

From the Scientific Press, Ltd., comes a small shining book entitled "Standard Prescriptions for Insurance Practice." It has been compiled by Dr. G. H. Gunson, of Wisbech. Its object is to give medical men administering the Insurance Act a collection of useful prescriptions, which may be a certain uniformity attained in the treatment of patients. The prescriptions are, on the whole, satisfactory, and doubtless many practitioners will find Dr. Gunson's little book useful in the direction indicated.

MESSRS. Livingstone's "Catechism Series" has recently added to it a book on Botany and one on Medicine. These are published at one shilling net. The first name is illustrated, and may be found helpful to the student in mastering the subject. The other, we think, will be of very little value, as it attempts too much in a small space. Both are built up on the question and answer plan. We cannot, however, advise students to attempt mastering the important subject of practice of medicine by means of the Catechism Series.

The November number of that conspicuously well edited and instructive journal, The Sunday at Home, contains many items which have a relation to the present circuit of our pages. Of our quota include "Brave and Noble Deeds," some golden pages from the earlier chapters of the great war, "The North Sea Fisherman: The Manner of Man He Is," "Beneath the Walls of Paris," and "The Refugees of Europe." An adulatory show how faces are distributed in the war countries. These five articles are illustrated, and throughout the number are sprinkled vignettes of Russian life, with no fewer than five complete short stories of the war are founded on incidents connected with the war.

NEW BOOKS AND NEW EDITIONS.

The following have been received for review since the publication of our last monthly list:


MEDICAL NEWS & PASS LISTS.

The Royal Medical Benevolent Fund and the War.

In consequence of the war, the College Council of the Royal College of Surgeons decided not to hold their usual dinner this quarter, but sent instead a cheque of 39 guineas as a contribution to the Royal Haywood Fund, and festivals of the kind will be abandoned. We agreed to meet this generosity, and medical profession is concerned this generous and thoughtful example will be largely followed. The medical profession will certainly be hit hard by the war in many ways and already special demands upon the Fund are being made of which the following is but one example. A young doctor, only seven years in practice, recently married, volunteered for service. He was killed in the field within the first week of the war. His wife and two small children will in great temporary distress. This is but an example of many distressing cases, and the Fund will meet it difficult to deal with them as liberally as it would desire without special help and generous support.

Royal College of Physicians of London.

At the meeting of the College on Thursday last, the President, Sir Thomas Barlow, in the chair, the following candidates were admitted Members of the College—


*Under Regulations dated October 1, 1856.
†Under Medical Act, 1856.

University of Oxford.

At a Congregation held last week the degree of M.D. was conferred upon A. D. Gardner, University.

University of Cambridge.

At a Congregation held last week the following degrees were conferred:—M.D.—A. Feiling, Pembroke; A. Ahammas, Emanuel, M.A.—II., H. H. Lovejoy, St. John's, M.B.—A. V. Scorer (by proxy), Pembroke; V. W. E. Evans, Trin. Hall; T. P. Ring (by proxy), Queens; C. C. Dixon, Jesus; R. M. Wheeler, Non-coll.

Royal College of Physicians of Ireland.

At the annual stated meeting of the President and Fellows of the Royal College of Physicians of Ireland, held on the morning of St. Luke's Day, the following officers were elected for the coming year:

President: Dr. E. MacDowel Congreve.
Vice-President: Dr. Joseph O'Carroll.
Censors: Dr. J. O'Carroll, Dr. T. G. Gordon, Dr. H. C. Drury, Dr. Gibbon Fitz-Gibbon.
Examiners for the License to Practice Midwifery: Dr. Hastings Tweedy and Dr. Bethel Solomons.
Examiners for the License to take the title of an absent Censor or Examiner: Medicine, Dr. Winter, midwifery, Dr. Sheil; medical jurisprudence and hygiene, Dr. Falkiner.
Examiners under the Joint Scheme: Biology, Dr. Nesbitt; chemistry, Dr. Lapper and Dr. Falkiner; physics, Dr. Harvey and Dr. Rowlett; pathology, Dr. Earl; pathology, Dr. F. C. Purser; pharmacy, materia medica and therapeutics, Dr. Geaney and Dr. Purser; physiology, Dr. J. A. Manton; medicine, Dr. Craig and Dr. Martin Dempsey; hygiene and forensic medicine, Dr. Bewley.
Examiners for Preliminary Education: Languages, Mr. E. H. Alston, F.T.C.D.; mathematics, Mr. R. A. F. Rogers, F.T.C.D.; Irish, Mr. Edward de Valera, B.A.
Examiners for the Diploma in Public Health: Chemistry, Professor Lapper; bacteriology, Dr. Earl; meteorology, Dr. Manton; hygiene, Dr. Martley.
Examiners for the Membership: Practice of Medicine, Dr. O'Carroll and Dr. F. C. Purser; clinical medicine, Dr. Drury and Dr. Travers Smith; pathology and bacteriology, Dr. Earl and Dr. O'Sullivan; obstetrics and gynaecology, Sir Andrew Horne and Dr. Hastings Tweedy.
Representative on the General Medical Council: Sir John Moore.
Representatives on the Committee of Management: Dr. Walter Smith, Sir John Moore, and Dr. Kirkpatrick.

Treasurer: Dr. Bewley.
Registrar: Dr. Kirkpatrick.
Librarian: Mr. Robert Phelps.
Law Agent: Messrs. S. Gordon and Sons.
Agent to Manage the Trust Estate: Messrs. Townsend.

Professor W. H. Thompson, M.D., was elected a Fellow of the College.

The National University of Ireland.

The Senate met on Thursday, October 29th, 1914. The Registrar reported the death on July 19th, 1914, of the Right Hon. Sir Christopher Nixon, Bart., M.D., LL.D., Vice-Chancellor of the University.

The Senate unanimously adopted the following resolution:—"We hereby express our deep regret at the death of the Right Hon. Sir Christopher Nixon, Bart., M.D., LL.D., who, as Vice-Chancellor of the University and as its representative upon the General Medical Council and other public bodies, has rendered invaluable service to the University since its inception; and the Senate desires to offer to Lady Nixon and the other members of her family its most sincere sympathy with them in their bereavement."

The Registrar reported receipt of a Royal Warrant as follows:—"Dated August 10th, 1914, appointing Sir
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"Marne" upon them. I know what deeds were done, what lives were given, what wounds were received to have that one name so inscribed. Believe me, the Victoria Cross is won over and over again in a single day! They are brave! What if two were to sleep and the wounded one act after the excitement of battle? They suffer their wounds, great and small, without a murmur; they get their wounds dressed, take chloroform, and go back there again, as if they were going to have their hair cut. They are gloriously brave. Men who have been in the thick of the fight all day, seen their chums wounded and killed, their own lives not worth a second's insurance, rush into battle with these men cock their food and go off to sleep, and most wonderful of all, go back to the thick of it next day!"

In addition to offering the War Office 100 beds—at the Walton Home and 49 at the Seaside Branch, Bexhill—for soldiers recovering from wounds or illness received or contracted during the war, the board of management of the Metropolitan Convalescent Institution—at the request of the Assistant Director of Medical Services—has placed 20 beds at the Little Common Home, Bexhill, at the service of the military authorities, for men of the Southdown Battalion of the Royal Sussex Regiment who may require medical treatment.

Ogdway House, Paignton, the Devonshire residence of Mr. Paris Singer, has been converted into a private hospital. A number of wounded men from the battles of Mons and the Aisne are comfortably installed. The house is entirely decorated by workmen and artists from France, and the sea, though hidden by trees, is but five minutes' walk from the gates.

We are asked to state that the Serbian Government is in immediate need of the services of qualified bacteriologists and physicians experienced in the treatment of epidemic diseases. Conditions of service and remuneration will be made by arrangement. Applicants should address themselves and submit their offers, with references, to the Secretary of the Serbian Legation, 195, Queen's Gate, London, S.W.

The British Red Cross Society has been instructed to purchase and equip, for immediate dispatch to the front, a motor ambulance service in the shape of the profits arising from Sir E. T. Cook's "Life of Miss Florence Nightingale." It is indeed fitting that the name of the great pioneer of nursing service for the sick and wounded should be associated in this manner with the Red Cross work of to-day.

Dr. Mowat, of the ill-fated cruiser "Hermes," which was sunk by torpedoes in Dover Straits on Saturday last, has given some particulars of the founding of the vessel in the Daily News and Leader. "All the officers," he says, "were sitting in the wardroom at breakfast. The wind, sea, and rain were very rough. All at once plates flew about in all directions; their breakfasts were flung into their laps. The officers rushed up on deck and were told that a submarine had attacked them on the starboard side. Their first thoughts were of their families. There was no panic whatever. The men came sharply up to command. He rushed to the sick bay and saw to the removal of the sick men there. The scenes before the ship foundered were indescribable. Men with broken arms and broken legs were lying about in all directions. I am thankful to be alive," added Dr. Mowat, "yet I will go back as soon as they want me again. This is not my first experience of naval warfare, and your country needs every man of you."
NOTICES TO CORRESPONDENTS.

NOTES TO CORRESPONDENTS, &c.,

By Correspondents requiring a reply to this column are particularly requested to use a Distinctive Signature or Initial, and to avoid the practice of signing themselves "Reader," which has led to much confusion and will be spared by attention to this rule.

Original Articles or Letters intended for publication should be written out in full, and must be authenticated with the name and address of the writer, not necessarily for publication, but as evidence of authorship.

Dr. W. R. S. (London, W.)—We have done with the article in the present issue in the manner that you suggest.

THE ORDER OF ST. JOHN OF JERUSALEM IN ENGLAND.

We have been asked to give publicity to the fact that an appeal is being made for the Ambulance Department of the Order of St. John of Jerusalem for funds to extend its work amongst the wounded in the war by means of a photographic collection. The individual amount noted for is small, the total sum needed is large. To collect such an amount by a subscription will call for an immense amount of personal service to obtain the desired result. The appeal mentions that a collection had already been established under the auspices of the Order, and supplied with the necessary staff. 200 doctors and nurses have been sent out to the front. Over 5,500 orders have been despatched to the Expeditionary Forces, or distributed amongst the ships of the naval and military hospitals, and to a number of medical stores and supplies, including 5,000 articles of clothing, have been sent out to the sick and wounded. A depot for the troops has also been established at Southampton, where they can obtain food and medical assistance. A number of motor ambulances are being despatched to carry the wounded from the front to the base. Subscriptions and donations may be sent to the Office of the Fund, St. John's House, Southwark, S.E. An account of all donations has been kindly placed at the disposal of the Ambulance Department by the Marconi Wireless Telegraph Co. of J. Billing & Co., and is available for the newspaper cutting, but we do not think that the incident calls for editorial comment.

The graphic account of the course of the war, and the appeal for funds, was published in our issue of May 25th, 1897.

The Wellcome Historical Medical Museum.

A special exhibit of interesting objects and relics associated with naval, military, surgical, and ambulance services is being arranged at the Wellcome Historical Medical Museum in Wigram Street. It will include miniatures, portraits, prints, contemporary relics, and paintings and drawings, and will form part of the military and surgical instruments and appliances used in naval and military surgery in bygone times, also medical and surgical instruments, and cabinets, etc., used in war time. Pictures, prints, and drawings of field ambulance work, military hospitals, novelties, and equipment not usually to be included in the Curator would be glad to hear from medical practitioners who may be willing to lend relics, instruments, or objects of a similar character, which will be treated with the greatest care, and insured against loss or damage. Particulars and descriptions of loans should be sent to as early as possible, address the Wellcome Historical Medical Museum, 54a Wigram Street, London, W.

Dr. M. (London) wrote:—The medical service is not an easy one, and, owing to the war, lack of men, to whom the attractions of active appointments are more pressing than those afforded by this appointment.

Meetings of the Societies, Lectures, &c.

WEDNESDAY, NOVEMBER 4TH.

Royal Society of Medicine (Section of Ophthalmology).—8 p.m. Castle: Mr. A. Hugh Thompson: (1) Complete Loss of Papillary Light Reflex in one eye, with retention of contraction to convergence. (2) Persistent one-sided loss of Papillary Reflex in a healthy adult. Papers by Mr. Robert Spicer, in absence in the anterior Chamber. Mr. H. B. Gransdale: The necessity of a definition of Miotics.

TUESDAY, NOVEMBER 3RD.


November 5th. London Clinical Society (Prince of Wales’s Hospital, Tottenham.—4.15 p.m. On Thursday, November 5th.

ROYAL SOCIETY OF MEDICINE (SECTION OF LARYNGOLOGY).—4 p.m. Cases and specimens will be exhibited by—Dr. Hill, Dr. Lamb, Dr. Lea, Dr. Charles, Mr. Deaver, Mr. Conroy Potter, Dr. Irwin Moore, Dr. John Hone, etc.

West London Medical-Chirurgical Society (West London Hospital).—Clinical discussion, with a showing by—Mr. Adolph Baldwin, Mr. Bishop Harmon, Dr. Arthur Sounders, Dr. Graninger Stewart, and others.

NOTICE TO HOUSE SURGEONS.

Hulme Dispensary, Dale Street, Stretford Road, Manchester.

Wanted, a House Surgeon, duly registered and fully qualified. Salary £100 per annum. Annual increase £10 to £200, with apartments, attendants, coal, and gas. Applications, at once to Honorary Medical Secretary. (See adv.)

House of Recovery and Fever Hospital.—Junior Assistant Resident Medical Officer, Salary £60 per annum. Applications to J. M. Day, Medical Superintendent. (See adv.)

Children’s Hospital, Manchester.—Resident Medical Officer. Salary £100 per annum, and £20 a year as M.O.H., with Vaccination Fees. Immediate application to F. King, Clerk of Union. (See adv.)

Manchester Royal Infirmary.—Assistant House Surgeon. Salary at the rate of £80 per annum. Applications to W. M. Humphries, Secretary. (See adv.)

Appointments.

Clarkway, H. R.C.S.Eng., M.S., Acting Assistant Surgeon to the Royal Free Hospital.


Moore, G. B., L.R.C.P. and S.Edin., L.P.S.Glas., Second Assistant Medical Officer at Queen Charlotte’s Lying-in Hospital.

Sallesbury, Watson, M.B., B.S., London, Resident Medical Officer at Queen Charlotte’s Lying-in Hospital.

Smith, W. M., M.D., M.R.C.S., Ealing, Medical Superintendent to the West Bromwich and Walsall Joint Union Dispensary, West Bromwich.

Street, J. H., M.R.C.S., Ealing, Surgeon, Assistant to the Curative and Workshop Acts for the Billesdon District of the county of Lincoln.

Wells, Harold V., M.B., Ch.B., Consultant, Assistant Resident Medical Officer at Queen Charlotte’s Lying-in Hospital.

BIRTHS.

Griﬃths.—On Oct. 29th, at Wylam House, Knights, Radnorshire, the wife of Mr. John A. K. Griffiths, M.B., of a son.

McIntyre.—On Oct. 27th, at Princess’s Hospital, Berkhamsted, Herts., the wife of W. A. Milner, M.R.C.S., L.R.C.P., of a daughter.

Rigden.—On Oct. 23rd, at "Lisanaran," Cinderford, Gloucestershire, the daughter of Mr. and Mrs. George F. Rigden—a son.

Carr.—On Oct. 23rd, at "Back Brook," Chislehurst, Kent, the wife of Mr. Robert Carr, M.R.C.S.—a daughter.

Wardleworth.—On Oct. 24th, at St. Nicholas, Sheringham, to Dr. and Mrs. D. Wardleworth—a son.

Marriages.

Matthews—Lee—On Oct. 21st, at St. Andrew’s Church, Westham, St. Joseph’s Road, Hove, the daughter of Mrs. Matthews, of the marriage of Mr. and Mrs. Matthews, of Wakefield, Huddersfield, to Miss M. B., eldest daughter of Mr. and Mrs. J. H. Lee, of Wakefield, Miners’ House, Huddersfield.—Mr. Matthews is a surgeon, &c.

Newhouse—Cooper.—On Oct. 31st, at Westcliff Congregational Church, Lowestoft, the daughter of Mr. and Mrs. John Cooper, of Lowestoft, to Mr. H. E. Newhouse, of Lowestoft.—Mr. Newhouse is a solicitor, of age 25.


Lloyd—forrest.—On Oct. 27th, at Huddersfield, Miss Mary Forrest, of age 25, to Mr. W. Lloyd, of age 27, of 42 Merion Square, Dublin.—Mr. Lloyd is a solicitor, of age 27.

Death.

Chesney.—On Oct. 21st, at Popeinhege, Belgium, the result of shell fire, Lieutenant George Gregory Cheshney, M.B., F.R.C.S., attached to 1st Cameron Highlanders, son of Charles H. Chesney, of 6 Albury Road, Wimbledon.—Mr. Chesney was a surgeon, of age 29.

Cromwell.—Killed in action on Oct. 18th with British Expeditionary Forces, as Motor-cycle Despatch Rider, Sidney Nelson, of 50, Ainslie’s Terrace, M.R.C.S., L.R.C.P., of 2nd Avenue, Bethesda.—Mr. Cromwell was a Surgeon, of age 39.

Grant.—On Oct. 25th, at Sydenham, by Interment, John Macpherson Grant, M.R.C.S., Ealing, of age 40.

Rintoul.—On Oct. 21st, Lieut. David Wylie Rintoul, R.M.C., eldest son of Capt. and Mrs. D. Rintoul, of 20 College Road, Clifton, aged 25.

Surry.—On Oct. 28th, Mr. Henry Sydney, M.D., of Stratford-on-Avon, Warwickshire.—Mr. Sydney was a surgeon, of age 29.


Walsh.—On Oct. 27th, at Miserden, near Tewkesbury, J. G. Walsh, M.R.C.S., E.A., aged 62, youngest son of the late Dr. and Mrs. Walsh.—Mr. Walsh was a surgeon, of age 62.


HULME DISPENSARY.

DALE STREET, STRETFORD ROAD, MANCHESTER.

WANTED,—A HOUSE SURGEON duly registered and fully qualified. Salary £100 per annum. Annual increase £10 to £200, with apartments, coal and gas. Applications, at once to Honorary Medical Secretary. (See adv.)
The alleged excessive drinking by women at the present crisis is clearly of considerable social importance, and, if existent, its suppression is much to be desired. At the same time, as pointed out in our editorial columns a week ago, to deal with it on lines of sex distinction may have a harmful effect, inasmuch as it might readily arouse in the militant female camp passions that for the present have been happily allayed. In the present instance surely it would be wiser to let well alone, and extend to women precisely similar freedom and similar limitations in the matter of alcoholic indulgence to those permitted to men. It is to be hoped that such considerations may be laid before a kind of informal committee which has met to discuss the matter. This somewhat curiously constituted body is composed of the Commissioner of Police, of Alderman Edward Johnson, chairman of the London Central Board of Trade Protective Societies, and of Mr. Frank P. Whitbread, representing the London Brewers’ Council. It has been agreed by them that all licensees within the Metropolitan Police district should be asked early in the present week no longer to serve women with intoxicating liquors before 11.30 in the forenoon. This request at once thrusts into prominence the question of sex privilege in a personal and offensive form. If it be inadvisable in the interests of the community that women should consume alcohol before 11.30 a.m., on what principle can it be right that men should be permitted to drink at public-houses before that hour? What is sauce for the goose should in this case equally be sauce for the gander.

Wyn should the handling of a delicate and weighty matter of this representative kind be left to a Commissioner of Committee. Police, a trades union representative, and a brewer? What sort of wisdom is on the look for from so grotesque an amalgam of councillors? Why should not responsible representatives of other callings have had a voice in an issue of this social complexity and importance? It would be easy to get, say, the help of a Member of Parliament, of a London County Councillor, of an experienced social philanthropist, and, above all, of a broad-minded leader of the non-militant women, as well as of some distinguished woman who is not implicated in any Suffrage movement. We venture to assume that a committee thus constituted would in all probability decline to advise exceptional licence regulations restricted to one sex alone, or, if such restriction were approved, it would be accompanied by a full statement of the special facts and considerations that led to a decision imposing special sex distinctions. The principle involved—namely, that of public-house drinking in morning hours—it may be well to add—has our complete and hearts approval, and a sensible step highly desirable in the interests of the public health. If it be resolved to persevere in the effort to render the people sober by Act of Parliament, that end is more likely to follow impartial dealing with both sexes than by arousing a sense of class injustice by one-sided measures of control aimed at women only. Nor is it to a combination of police, trade unionism, and the brewery interest that the reformers would look for the wise conduct of the temperance campaign.

The War Office is certainly doing its best to enforce high moral standards among soldiers’ wives—that is to say—upon the wives of non-commissioned officers and men. The question of drink is apparently left to the licensing authorities and the magistrates—while other ethical lapses are to be dealt with in future by the police. A memorandum has been issued to the various Chief Constables with a covering letter from the Home Office, directing that the police shall assist in withholding separation allowances and food to their wives or dependents in the event of serious misconduct of recipients. The "unworthy" are defined as "women guilty of serious misconduct, e.g., cases of immorality definitely established, conviction of criminal charges, or gross negligence of children." It is difficult to believe that even War Office inebriate will venture to carry a crude and offensive infringement of the rights of the citizen into effect. Experience has shown again and again that the police are the last persons in the world to whom it is advisable to entrust the surveillance of minor offences. It would be difficult to imagine any dealer blow to the recruiting of our new army than the placing of soldiers’ wives under the supervision of the police. More than that, they are to be judges as well as investigators, for without judgment founded on evidence can the police determine whether any specific charge of immorality is or is not "definitely established."

A Non-All-Round Principle.

Nor is it altogether easy to comprehend why "misconduct," which is not flagrantly criminal, should rob the recipient of money hardly won by the soldier fighting at the front. It is certain that in the case of the withholding of the means of sustenance, an equivalent sum will have to be found by the already over-burdened rate-payers, who now have to keep a large number of soldiers’ wives and dependents whose pay has not
been forthcoming, owing to the unbusinesslike methods and niggardly policy of the War Office. The married recruit in future may look forward to police supervision for his household in addition to incorrect estimation and irregularity of allowances. The public health is closely involved in this matter, as it does the environment of millions of families. Another important social aspect is that of class inequality, for if it be necessary for the safety of the community that the War Office should regulate the morals of the soldier's wife, it follows that similar conditions should be imposed upon all ranks of the service. That, at any rate, will be the contention of a democratic army, a description that applies to Lord Kitchener's new force. It would be a pity were the splendid enthusiasm of our new troops to be marred by War Office iniquity, and it is to be hoped that Parliament will turn its attention to the Military Pay Department. If the State is to control the morality of the soldier's household—well and good—but the principle will have to be applied to all recipients of dependants' pay and pension from Field Marshal to drummer boy if we are to steer clear of the quicksands of class inequality.

It is a short-sighted policy indeed that permits sweating by employees who are carrying out Government contracts for the Army. It simply means a small saving in expenditure at the cost of the ratepayers, who will assuredly be called upon in the long-run to support the disabled workpeople who have been living in a state of chronic semi-starvation owing to their meagre wages and long hours of labour, often under bad sanitary conditions. A recent report of the Public Health Committee of the Bethnal Green Borough Council shows that homeworkers in the East End of London are being scandalously sweated by Army contractors. Among the cases quoted are the following:—Making and finishing blue serge tunics—2s. 6d. each, complete finishing; thread and silk purchased from the firm. Black canvas kit-bags—2s. 6d. per dozen; thread purchased from the firm. Fawn jean kit-bags—1d. per dozen; thread found. Khaki haversacks—2s. 6d. per dozen; own thread has to be purchased from firm at 6d. per spool of 202s.; two spools make three dozen bags. Jean kit-bags—2s. 6d. a dozen, finished; own cotton and thread have to be purchased. Finishing khaki trousers—2s. 6d. own thread to be purchased. Trouser finishing—2s. 6d. per pair; worker has to buy cotton at 2d., per spool and thread at 4d. per spool (average cost 1s. 6d. weekly). Making kit-bags of brown canvas—1s. 9d. per dozen finished; thread supplied by employee."

The War Office and the Middleman. "We have no grounds for suggesting, nor do we wish to suggest, that the Government is in any way responsible for these prices; but they appear to us to be due to the recent relaxation of the Government rule that Army work shall not be performed by home workers. The result in these cases appears to have been that the work has passed through the hands of so many middlemen or sub-contractors that the low wages mentioned must be paid to the persons actually performing the work, in order to provide a profit for the persons who give out the work to the home worker." The committee were advised that the matter was one for the Office of Trade Boards; and the particulars set out above, with other details, have been forwarded to that Department with the request that any action which is possible in the matter shall be taken. It is to be hoped that even amid the enormous pressure to which the War Office is subjected by the conduct of a great war something may be done to remedy the great wrong that is being done to the sweated workers of East London and elsewhere.

The Medical Roll of Honour. The casualties amongst all ranks of the Royal Army Medical Corps have, unfortunately, been considerable during the last week. We have to record the death of Captain R. C. G. M. Kinkhead, R.A.M.C., who has been killed in action. A full obituary notice of the deceased officer appears elsewhere in our columns. Officers wounded—Captain H. G. Gibson, R.A.M.C., and Lieutenant C. W. B. Littlejohn, R.A.M.C. News has been received of the whereabouts of Captain W. Egan, R.A.M.C., who, it appears, is a prisoner at Crefolk. Captain T. B. Bennett, R.A.M.C., is unofficially reported to be lying wounded in the Casino at Boulogne.

LEADING ARTICLES.

THE PROPOSED BELGIAN RELIEF FUND. Our readers will remember that our issue of November 4th contained a letter from Dr. Macnaughton Jones, calling attention to the dire distress amongst the medical men of Belgium, and enclosing a letter from Professor Jacobs, of Brussels. The latter announced that a provisional Belgian Committee had been formed, with the double object of securing immediate relief for the doctors and pharmacists deprived of their means of livelihood, and of establishing an annuity fund for the widows and orphans of those killed during the war. It was stated that the details of the scheme would be arranged by a Central Committee sitting in London, representing the United Kingdom, Dr. Macnaughton Jones, on receiving the promise of help from various leading men, especially in Ireland and Scotland, sent the appeal from Brussels together with a covering letter to the British Medical Journal and the Lancet, but neither journal has so far published the communication. Doubtless owing to an oversight, no invitation to join the British Committee has been extended to the Medical Press and Circular, although it is announced that there is power to add to its number. The editor of the latter journal is to some extent encouraged by the fact that during the last few months there has been a large increase of readers, among whom Dr. Jacobs' appeal on behalf of Belgium has been circulated. The needs of the Belgian medical men are urgent; many of them are destitute, and have no means wherewith to support their wives and families. Their homes are desolate and their practices dis-
sipated into thin air. A large sum of money is wanted for their relief, one portion to minister to present needs, and another to restore them later to their homes and enable them to commence life afresh. The appeal is now made first of all to the nation, but the United Kingdom has come to the aid of their Belgian confrères in their sore need. We ask our readers, then, to send subscriptions through the Medical Press and Circular in answer to the appeal of Professor Jacobs in our issue of last week. It should be clearly understood that our journal will not administer any of the funds entrusted to its care. All money will be handed over to the Central Committee which has been formed in London. Subscriptions of any amount, great or small, will be gratefully acknowledged by either the London Editor (W. Henrietta Street, Covent Garden, W.C.), or by the Irish Editor, 29, Nassau Street, Dublin. In a matter of this kind we shall endeavour to aid to our utmost, the efforts of the Central Committee in attaining the object to which we reflect with so small satisfaction we were the first to call attention. In a crisis such as that now confronting the Allies, it becomes a bounden duty to fly to the succour of those who have lost their all in their heroic stand against a common enemy.

CURRENT TOPICS.

The Relief Fund for Belgian Medical Men—An Appeal to Mr. Asquith.

In our issue of November 4th we published an appeal from Professor Jacobs, of Brussels, President of the medical men and pharmacists of Belgium. His letter was addressed primarily to the medical profession of the United Kingdom. It shows that some of his countrymen for whom he appeals are in dire distress, and he has since conveyed to us by word of mouth a more detailed story of their sufferings and anguish. Bereft of home, of patients, of income, they have become wanderers with their wives and families upon the face of the earth. Many of them are in England without means, and dependent on the hospitality which is being freely meted out by our countrymen. A Relief Committee has been formed for the purpose of raising funds, in the first place from the medical men of the United Kingdom. It is difficult, however, to see how the latter can adequately assume the burden, for many of them are away on war duty, while others have already emptied their purses and given freely to other relief agencies rendered necessary by this Great War. Under these circumstances, we appeal strongly to Mr. Asquith’s government to make an immediate grant in aid of Belgian medical practitioners. Sooner or later Parliament will be called upon to come to the financial aid of Belgium. An immediate grant of, say, £500,000 would enable the Central Relief Committee to make a start, and, later, to re-establish some, at any rate, of the Belgian doctors in their homes—to use the words of Dr. Jacobs—“pour recommencer la vie.” The value of such help at the present moment would be incalculable; to the health of the Belgian population must ultimately depend upon medical administration. It is to be hoped that the friends of Belgium will urge the vital necessity of this monetary aid upon Parliament in the best interests of the Belgian people. A certain proportion of Belgian medical men might be engaged by our War Office for military service and for attendance upon their refugee countrymen now in the United Kingdom. Lastly, we have Dr. Jacobs’ own assurance that his medical confères would regard any monetary help at the present moment of tribulation as a debt of honour, to be repaid in due season with no empty tribute of thanks, but with the strong and enduring gratitude that one associates with brave men. It is becoming more and more difficult for private benevolence to stem the torrent of distress arising from the war, but it is still possible for Parliament to play the good Samaritan to the medical men of Belgium. Therefore again we ask Mr. Asquith and his colleagues to carefully consider our suggestion as to an immediate grant in aid.

Red Hair.

Those of us who have not got it thank the gods or other responsible eugenicists that there is red hair in the world. It adds to the gaiety of nations. Like Falstaff, the owner of red hair is not only witty in himself, but he brings out the wit of others. And if other men feel a spice of danger in the application of their wit, for red men are notoriously hot-tempered and resentful of personalities—ginger for pluck. Eugenists have heard these legends and with their well-known enthusiasm have investigated them on a basis of pure science. They claim to have found that red hair is not to be always hereditary, and though it may lie dormant for several generations it never arises anew. Rufosity is a Mendelian “recessive.” Red children are rarely born where one parent is dark and the other fair, but they are almost invariably if both parents are red. In England they are alleged to be no more frequent in temper than the rest of the population, but according to American Medicine this is not the case in the United States. The reason is interesting. On the theory that there are two or three pigments which in various mixtures are responsible for all human colourings, the red-haired man is a defective. He is only one degree removed from the albino wherever he has no melanin. Consequently, in hot climates the red-haired man, who has only one pigment, is insufficiently protected from excessive light which irrites him, keeps his nerves on edge and otherwise annoys him and lessens his efficiency. This, like a great deal of the more sensational eugenicist work, is speculation minus statistics. It may easily not be true. We welcome the industrious investigator of uncon sidered trifles. His work may help to soothe the amaranthine aurora. It will be a novelty for him to have his pigmentation taken seriously.

Canine Distemper and Human Poliomyelitis.

During the past few years several cases have been described by Batte, Holmes, Flexner, and Clark, in which symptoms of paralysis have occurred in dogs simulating poliomyelitis in human beings. On close investigation it has been found that certain nervous affections met with in horses, sheep and guinea-pigs present histological features not unlike those of infantile paralysis in man. In the Journal of Pathology and Bacteriology, Drs. J. P. McEwan and James D. Downie, of the Royal College of Physicians’ Laboratory, Edinburgh, have recorded their observations upon cases of undoubted distemper in dogs exhibiting nervous symptoms, and they have compared the histological changes found in them with those met with in human poliomyelitis. Following an attack of distemper, the nervous system may be affected in three distinct ways. In one group of cases the symptoms are those of acute generalised convulsions of sudden onset, death ensuing in a short time from status epilepticus. Intense engorgement of the cerebral vessels is seen, but no meningitis. In another type the symptoms are choreiform, indicating meningeal irritation, and the two other conditions are apparent by the thickening of the vessel-walls and brain substance by cells of a lymphoid type. The third group is characterised by spinal manifestations, the hind limbs being in a
condition of lactic wasting paralysis. Post-mortem the spinal grey matter is seen to be infiltrated with lymphoid and compound granular cells. There is positive evidence that the distemper bacillus, described by Dr. J. P. McGowan, can produce in culture a powerful nerve toxin. This organism was obtained from the respiratory tract of five of the cases, and it is well known that in man the virus of anterior poliomyelitis may be present in the nasal mucous membrane. The comparison between the human and the canine affections is an interesting one and it may possibly throw further light upon the etiology of other obscure diseases.

Royal College of Physicians of Ireland.

We publish in another column a letter from the Registrar of the Royal College of Physicians of Ireland to which we wish to direct attention. The Registrar is attempting to make in the College a collection of portraits of past presidents, and he gives a list of presidents of the last century of whom portraits are lacking. It is probable that oil paintings of most of these are in existence, and it is likely that many of the portraits remain but little interest for their present owners. To the College, on the other hand, they would be very valuable as forming part of a series. In cases where the owners are unwilling to part with such memorials, they can have no objection to photographs of the oil paintings being taken for preservation in the College. We understand that the Registrar is willing to arrange for the taking of such photographs on being informed of the present location of any of the pictures sought. We hope that if any of our readers can give the College any help in this matter they will do so. While drawing attention to this appeal of the Registrar for portraits of past notables of the Irish profession we may mention that a catalogue recently issued by the Librarian of the College. The Librarian is endeavouring to make in the College as complete as possible the collection of medical books and tracts published in Ireland, as well as of medical books by Irish writers published elsewhere. Our readers may be able to help in this also, and we commend the appeal to their goodwill.

National "Nerves."

The way in which our nation has braced itself for the supreme struggle thrust upon it has roused the admiration even of those who least expected it. Those who remembered the follies and boosings, the depressions and the swaggerings, of our people in the days of the South African War, have learned that the England of to-day is a stronger and better country than the England of fifteen years ago. On the whole, the people are determined without fear or fuss to go through with the business in hand, no matter what sacrifices may be required. Nevertheless, there are signs of "nerves" from time to time, when we require to be noticed in order to be checked. The disease of the crowd, which at the present moment shows as "nerves" mists, when the danger seemed more pressing, as, for instance, if an invasion were to occur, easily developed into national panic. The "spy fever" which, more particularly in the early days of the war, was such an instance, was one symptom of "nerves." The present panic was the recent driving from official life of one of our leading sailors, to whose initiative and foresight we owe, in no small measure, the present security of our shores. Such action of the Government is a direct encouragement to the development of "nerves" among the people. We find another evidence of unhealthy "nervousness" in a long letter which Mr. H. G. Wells contributed to a recent issue of the Times. Mr. Wells tells us the terrible things he and his class will do if and when the Germans land in England. If the Government do not give him a rifle, and teach him to use it, he will use a shotgun, and no doubt, if he cannot get even a shot-gun, he will throw stones. If the military experts tell him that he is not to do any of these things, then he will shoot the experts. We believe that the supreme duty of the citizen at the present moment is to keep cool. Most sensible people who want to be really useful can find work to do without fussing themselves into a state of "nerves." The watchword at present and till the war is over should be "Steady men steady."

Sausages.

The sausage has long functioned vicariously for the populace. It typifies the pantomimic clown, Teutonic Kultur, and kindred ridiculous pomposities. There are sausages and sausages—small ones that are a bare mouthful, and gigantic fellows whose very section satisfies the starving. The essential characteristics of a sausage are few, comprising chiefly a constant shape and a variable interior. The shape is typical; unlike the multi-parisoned ethmoidal bone, the sausage can only be compared with itself or its next-door neighbour. In its true and proper sense, its entire length determines the certainty of its interior. The sausage-maker is notoriously fickle. He chops and changes; and his raw materials, if the tongue of the people wages true, would make a fair assortment of samples for a traveller in zoological gardens. The glorious uncertainty of the interior is of the essence of the sausage, no less than the harmless necessary gut that covers it. A sausage to be worthy of the name must have its origin "wroop" in mystery and its interior in small intestine. So we have written, and so, too, we thought. Not for the first time disillusion awaits us. There is an invention for covering sausages with wood pulp. Shortly, bleached sulphite small pulp will be the substitute for the constant sad content. This substitute is confirmed with carbon disulphide, added to water, and allowed to swell. The result is a thick, viscous solution which is moulded into tubes, passed into a salt solution, and converted into a yellow jelly. Ultimately it is cleaned, dried, rolled up, and shipped to the sausage shop. It is hard to discuss such an iconoclastic proposal calmly. Since our childhood's first sausage we have clung with affection to its skin. We were content to remain in ignorance of the meat lest worse befell us, but we thought the skin unchangeable as that of the Ethiopian. We must grin and bear it. Sausages we must have. They supply food for our stomachs, material for our comedians, and epithets for our enemies. The invention has us in the hollow of his hand. We tremble and are still. The worst is yet to come.

Red Cross Workers in General Hospitals.

In our last issue we noted the decision of the Board of Management of the Royal Victoria Hospital, Belfast, not to admit women holding first-aid certificates for short periods of training in the hospitals. We knew that other hospitals have decided differently, but we believe that the Belfast Board is right. There is not at present, nor is there likely to be, any dearth of properly trained nurses. The War Office has a reserve of at least 1,500 trained nurses on its list ready to undertake any work that may be required of them. There is not likely to be any national need for such crude
material as a course of first-aid lectures and three
weeks in a hospital is likely to produce. Moreover,
no training of any value can be given to these short-
term probationers without interference with what
is one of the essential duties of a general hospital—
the training of medical students and nurses. We do
not overlook the fact that even some special know-
ledge of nursing is sometimes due to a woman in
her ordinary household sphere of duties. The
danger is that a young woman, armed with her first-
aid certificate and her certificate of "hospital
training," fancies herself something between a
trained nurse and a medical practitioner. She
becomes a public danger.

We are particularly interested in the perusal of the diary of a temporary
probationer recently published in the Spectator.
The young woman recounted her experiences and feelings, and at the end of her fortnight's or three
weeks' training complacently noted that she was
able to hold her own with probationers who had six
months' experience. She added—quite unneces-
sarily—that she had now confidence in herself.
We do not gather, however, that there was any ground
for such confidence.

The Choreic Voice Sign.

New clinical observations are always of interest,
especially when they assist in or help to confirm the
diagnosis of disease. Dr. Walter B. Swift, of Bos-
ton, (a) has reported a change in the voice in chorea,
as registered by means of the vocal kymograph,
which he believes is constant in cases of this dis-
ease. Briefly, the signs consist of a rise in pitch and an increase in the intensity of the voice. These
modifications of vocal utterance escape notice in
ordinary conversation, but with prolonged vocalisa-
tion they become manifest. Twenty cases of
chorea were subjected to a series of twenty-seven
tests, 540 tests in all. The changes were not
always in proportion to the amount and extent of
choreic movements as seen. They were always
more marked in the long vowels, less so in the
whispered voice, whispering, blowing out air or hold-
ing the breath. The consonants showed no change
except when prolonged. Lack of articulatory
control will contribute to slight changes in the voice,
but the characteristic voice-sign, according to Dr.
Swift, occurs in the open prolonged sound of "a,"
as in "ah," and it is, therefore, suggested that this
vowel should be used as a routine clinical test for
eliciting the new sign of chorea.

Food Delivery.

We are very inconsequential in our fastidiousness
about our food. What the eye does not see the
imagination can ignore. We are very particular
about ready-made packed foods—untouched by
hand, but we do not seem to mind what happens
to some of our more common commodities before
they reach us. We have learnt a certain amount.
We insist on pure water, and some of us are particu-
lar about our milk. Anyway we know the dairy
inspector is looking after us. But we do not worry
about our meat and bread. Both may be and
usually are exposed to gross dirt and bacterial
invasion both in the retailer's shop and in the streets
during delivery. The meat is not so important. It
at least is superficially sterilised in the cooking.
But the bread is not. The loaf lies jumbled with
its fellows in the baker's van. The driver jumps
from his seat and proceeds to paw over his wares
with his unhandsome hands. We frequently see
loaves rolling in the highway to be gather up,
freed from gross dust and ultimately ingested. It

(o) American Journ. of Dis. of Children, October, 1914.

is a disgusting process if we think about it. Bread
should be wrapped in waxed paper as soon as baked,
and not be unwrapped till it is wanted. The baker's
objection to this is, that the quality of the bread
deteriorates. It is an unsound observation. Investi-
gators in America—where these people really are
ahead of us in some few things—arrive at contrary
results. They find that wrapped bread actually
keeps fresh for several days longer than in Paris
naturalibus. There is, then, no reason why we
should have dirty bread. Apparently we do not
mind or we would not have it. If the baker's pocket
was touched he would quickly supply our demand.
But we are content to go on as we are, and as
long as we maintain this steadfast inertia nothing
will be done. After all, we get the bread we dis-
serve.

PERSONAL.

Dr. Herbert M. Cargin, M.D.Edin, D.P.H., has
been appointed Medical Officer of Health of West
Hartlepool.

Dr. S. W. F. Richardson and H. A. Moffat have
been appointed Additional Honorary Surgeons to the
New Somerset Hospital, Capetown.

Dr. John Barlow, M.D.Edin, F.F.P.S.Glasg., has
been re-elected President of the Royal Faculty of
Physicians and Surgeons of Glasgow.

Dr. John P. Henry (MacEnry), M.D., B.Ch.Dub.,
has been appointed Professor of Ophthalmology and
Otology in University College, Galway.

Dr. L. B. Cano, of Peterborough, who is on active
service with the Army Medical Corps, has been
attached to the military hospital at Cairo.

Mr. A. Ernest Maylard, M.B., B.S.Lond.,
F.F.P.S.Glasg., has been elected President of the
Glasgow Medico-Chirurgical Society for the ensuing
year.

Lieut.-Colonel F. J. Greig, reserve of officers,
Royal Army Medical Corps, has been appointed
Assistant Director of Medical Services for the Ulster
Division.

Dr. L. McIntyre, Weeks, of Redcar, late of Wil-
lington, was the recipient of a suitable presentation
the other day from the colliery officials in the district
upon the occasion of his marriage.

Dr. J. Richardson Marrack, M.A., M.B., B.C.
Cantab., 1st class National Science Tripos, Part I,
1908, and 2nd class Part II, 1909, has been elected to a
Fellowship at St. John's College, Cambridge.

We are glad to learn that Mr. Littler Jones, Surgeon
to the Liverpool Royal Infirmary, one of the medical
men on board the ill-fated hospital ship Rohilla, which
was wrecked off Whitby on October 29th, is progress-
ing favourably after suffering from shock and expos-
ure.

The following officers of the Royal Army Medical
Corps have been decorated by the President of the
French Republic with the Legion of Honour, with the
approval of the King, for their gallantry during the
operations between August 21st and 30th, 1914—
Croix d'Officier, Major S. L. Cummins, M.D., Croix
de Chevalier, Captain S. E. Lewis, M.B., Captain
J. T. McCartney, M.B., and Captain H. S. Ratner,
M.B. (killed in action).
CLINICAL LECTURE ON
RECENT METHODS IN DERMATOLOGY. (a)

By G. NORMAN MEACHEN, M.D., B.S. M.R.C.P. Lond. and Edin.,
Physician to the Hospital for Diseases of the Skin, Blackfriars; Dermatologist to the Prince of Wales' General Hospital.

LADIES AND GENTLEMEN.—If the advances made during the last few years in our knowledge of diseases of the skin, apart from those due to syphilis, have not been startling, we may comfort ourselves with the fact that dermatology has, at any rate, not lagged behind the other specialties of medicine. The link that binds dermatology to general medicine is largely a clinical one, but we have the great advantage both in diagnosis and treatment of being able to see what we are doing.

Excluding the Wassermann test and the leucin reaction of Noguchi, we have only the tuberculin test, whether injected into the patient or applied to the skin after the manner of Moro or Von Pirquet, that really deserves the title of specific. Considering the frequency with which a tuberculous focus is present somewhere in the body, a positive reaction to tuberculin should always, I think, be accepted with caution. Taken in other evidence, it is useful in helping to confirm the tuberculous nature of a doubtful skin eruption. With regard to tuberculin-therapy, it may be said that if the practitioner wishes for quick results he will be disappointed, but if he be prepared to peg away slowly, using, by preference, the bi-weekly gradually increasing dose, he may expect to see some improvement, if not an actual cure of a lupus. By the method of obtaining slight reactions only the chief objection to the use of tuberculin has been removed. At the recent meeting of the Dermatological Section of the British Medical Association, held at Aberdeen, Norman Walker related some successful cases seen at the local application of a 5 per cent. tuberculin ointment, and he said that he had not observed any marked local reaction.

The use of vaccines in general may justly be called specific, for what can be more so than the inoculation in a case, say, of syphilis, with a vaccine from a culture taken from the disease? In all staphylococce infections of the skin, especially in furunculosis, vaccine-therapy generally yields good, and sometimes brilliant results. The method of Whitfield, described at the International Congress of Medicine in 1913, of giving 250 million staphylococci as an initial dose, increasing it rapidly, appears to me to be the method of choice. At the same meeting, Gilchrist narrated his experiences with vaccines in skin diseases, and he finds that in the case of acne injections of a vaccine of 10-20 million of acne bacilli as an initial dose, repeating the dose or slightly increasing it after the negative phase has passed, are the most efficacious. Some degree of local immunity seems to be produced by the application of ointments made up of various micro-organisms, such as staphylococcus albus ointment, 10 per cent., in cold cream, in cases of seborrhoeic eczema. Such methods seem reasonable and are worthy of trial.

THE ROLE OF PHYSICAL THERAPEUTICS.

The number of physical agents that have been employed of late years in the treatment of diseases of the skin is very numerous. One naturally thinks of X-rays first, and for the treatment of lupus vulgaris of the ulcerating type, rodent ulcer, and skin cancers, and for producing epilation, for ring-worm of the scalp and sycoysis, this agent remains one of the best. Now that we have better means of measuring the dose, injury to the skin is becoming progressively rarer, though there are cases still in which a delayed radio-dermatitis may appear, or where the hair fails to grow again after epilation.

In radium we have a remedy which far exceeds the X-rays in potency, and in the relief of itching and pain. Thanks to Wickham, Degrasis, and other workers, sufferers from severe pruritis, chronic eczema, with lichenification, new growths of the skin, lupus, angiomata, nevi, rodent ulcer, and other forms of malignant disease of the skin, have a reasonable chance of receiving benefit or lasting cure.

The Kromayer lamp, on account of the shortness of exposure required—about ten minutes—and the larger size of the area treated, has fair to become a serious rival of, if not actually to supersede, the Finsen light. The ultra-violet rays from a mercury vapour lamp, as originally employed by Kromayer and Nagelschmidt, have given excellent results in alopecia areata and in severe rosacea of a disfiguring type.

The good effects of hot air in dermatological therapeutics are seen in the radiant-heat treatment of localised pruritus or chronic eczema. The use of electrically heated appuratus is also highly satisfactory. The katharos marks, and can be obtained by means of electricity is useful for limited areas of disease. More recently we have the method of through-and-through warming of the tissues, or diathermy, which, in the hands of Nagelschmidt, has given good results in cases of lupus, nevus, and rodent ulcer.

Many of these more advanced adaptations of light and heat can be obtained by the use of expensive apparatus, and are, therefore, only available for the favoured few. If it be desired to obtain the benefits of local hyperaemia, one can employ Bier's suction cups at a small cost. These are small exhaust cups of glass, connected at one end with a rubber tubing. The size of the cup should correspond with that of the area to be treated, and only sufficient exhaustion should be produced so as to cause it to adhere. The cup is kept in situ for five minutes, released, and re-applied after three minutes' interval for a further period of five minutes, for half to one hour, once or twice daily, according to the effect produced. Small patches of alopecia areata and most acne pustules may be satisfactorily treated by these suction-cups, though they will seldom take the place of local remedies entirely.

SOLID CARBON DIOXIDE.

The benefits of hyperaemia, combined with more or less destruction of tissue, can all be obtained by the use of what I may venture to call the most generally useful agent employed for this kind of work in the whole range of dermatological therapeutics. Introduced by Pusey, the solid crayon of

(a) Delivered at the North-East London Post-Graduate College, August 6th, 1914.
frozen carbonic acid with a temperature of — 70 degs. C. combines many of the properties of radium and X-rays without the expense of the one and the disadvantages of the other. Exactly how one prepares the solid snow is immaterial; I, for one, am fond of the Goossman apparatus, where the receiver of the frozen gas also acts as an applicator. For navi and moles it is unrivalled, while many other skin affections are benefited by it, notably rodent ulcer, which it destroys in a very few applications, and also lupus crythematous of the discoid variety. Warts and old-standing patches of lupus vulgaris require, of course, a longer application than that needed for superficial navi. I do not think that solutions of the snow in acetone or ether possess any real advantage over the ordinary solid cryospray. From the case with which its application can be controlled it will be acknowledged that frozen carbon dioxide is superior, and, of course, far less costly, than liquid air. In the case of very young infants the exposure, and also the pressure, must necessarily be much less than in the case of adults.

IONIC MEDICATION.

The researches of Leduc, Lewis Jones, and others, upon the electric penetration of ions into the epidermis has encouraged dermatologists to employ the principle commonly used of anions and kations for the treatment of cutaneous disorders. The essentials of success in ionisation are (1) to employ a weak solution of the substance chosen—seldom more than one to four per cent., (2) to protect the bare skin from the pole of introduction by several layers of moistened lint, (3) to see that no acid or alkaline irregularity of surface exist upon the area to be treated, (4) all oily and fatty matter must be removed from the skin by alcohol or ether before commencing the treatment. Zinc is a favourite metal for ionisation, and a two per cent., solution of the chloride or a four per cent., solution of the sulphate is used for moistening the pad beneath the positive electrode, in this case made of zinc, placed over the part to be treated. A current of 2-3 milliamperes per square cm. is allowed to pass for ten to twenty minutes, the indifferent electrode being placed in a basin of salt water in which the patient immerses one hand. A sitting is given once a fortnight, and in the case of a patch of lupus vulgaris, for which this method is employed, it is repeated once a fortnight. In the case of rodent ulcer, the positive electrode may consist of a zinc needle which can be introduced beneath the skin into the diseased tissue. Ionisation with salts of mercury, copper, or zinc, has been successfully employed in ringworm of the scalp, alopecia areata, warts, boils and scabies. Ionisation with quinine has been employed with benefit in herpes zoster, while the salicylic ion has acted well in acne. Iodine ions have been used by Riddell, of Glasgow, for some time past in the treatment of ringworm.

CHEMICAL AGENTS.

The setting free of nascent iodine locally by the action of peroxide of hydrogen upon a lupus lesion while the patient is taking iodide of sodium, after the manner of Pfannenstiel, I have found of considerable value in dealing with nasal cases in which the mucous membrane is involved. At a recent meeting of the Dermatological Section of the Royal Society of Medicine a case was shown by Sibley in which lupus of the buccal mucous mem- brane had been successfully treated by insufflations of equal parts of iodide of potassium and chalk, the mouth being afterwards rinsed with chlorine water in lemonade. Axel Reyn liberates nascent iodine in a patient taking iodide of sodium by electrolysis of the lupoid lesion itself.

Some interesting observations have lately been made as to the power of certain aniline dyes to influence epithelial growth. One of these, scarlet red, has achieved considerable reputation as a cell-proliferant, being employed as a 1:1 per cent., ointment in cases of ulcus cruris. A modification of this, amidoazotoluol, or the diacetyl derivative of this known as pelldol, may be employed in weaker solutions than scarlet red. Basic fuchsin has also been recommended by May and Heidingsfeld.

Allantoin, the active substance of the common comfrey root (Symphytum officinale) has been employed successfully by C. J. Macallister and others in chronic ulcers. It should not be used in foul or septic conditions, nor in too strong a solution. Of late the remarkable researches of Strauss, of Barmen, into the germicidal powers of copper salts, especially in connection with tuberculosis, have led to the experimental application of copper chloride and tartrate, and, more recently still, the combination of copper with lecithin, known as "lecuity," in cases of lupus. A little girl with severe lupus around the ankle has just been under my care in the hospital. I scraped her and afterwards applied copper lecithin locally. At the same time she took pills of the same substance internally. The time is young to report fully upon this method, but the results, so far, seem encouraging.

AUTO-SERUM THERAPY.

Another direction in which a good deal of research has lately taken place is that of the injection of the patient's own blood serum in chronic certain dermatoses. It is now two years ago since Linser and Mayer were able to cure cases of urticaria, prurigo and herpes gestationis by this means. 10 to 20 c.c. of blood-serum are injected in these affections with success. Ravaut utilised the patient's own blood in similar cases. In certain toxic forms of skin eruption, such as occur in pregnancy, intramuscular injections of Ringer's solution have been practised with success by Eichmann and others. Excellent results have recently been reported by Holobut and Lenartowicz in pemphigus by injecting the clear, sterilised contents of the bullae themselves in 6 c.c. portions.

I have endeavoured to indicate in the briefest fashion some of the principal directions in which progress is being made in dermatology. There yet remain a great many questions to be investigated. The influence of the internal secretions, for instance, and the findings of chemical analysis of the urine, the face and the blood, the bacteriology of skin affections in general, and last, but not least, the discriminating use of histological methods, are all of the highest importance to the dermatologist who would study his specialty with keenness and interest.

NOTE.—A Clinical Lecture by a well-known teacher appears in each number of this Journal. The lecture for next week will be by P. Moriquand, Professor at the Faculty of Medicine, Lyons, Physician to the Hospitals. Subject : "Subjective and Exertive Abdominal Pains."

Dr. Frederick B. Power is retiring from the position of Director of the Wellcome Chemical Research Laboratories next month. The high character of the research work carried out in these laboratories during the eighteen and a half years of his directorship is well known to medical men. He will be succeeded by Dr. Frank L. Pyman, who has already made several important contributions to chemical science.
TREATMENT OF HEART DISEASE BY MEANS OF PHYSICAL EXERCISES AND CO₂ BATHS. (a)

BY I. HARRIS, M.D.

The treatment of certain forms of heart disease by means of physical exercises and CO₂ baths has long ago been adopted on the Continent; in this country, so far, it has found but scanty recognition, and yet its value for suitable cases of heart disease is indisputable, and the principles underlying the form of treatment are the same by which Nature usually remedies a defective circulation—by increasing the hypertrophy of the heart.

Voluntary and involuntary muscles increase their efficiency by exercise, and the effect of the one reacts on the other. That holds good for the normal as well as for the diseased heart. But, in addition to that, exercise is capable of regulating the state of developing the peripheral vessels to such an extent as to make them assume in part the functions of the diseased central organ (K. Haselbrock). Increased exertion does not, to the same extent as in the normal heart, manifest itself in an increase of blood pressure (which denotes an increase of cardiac activity), but the regulatory functions of the peripheral vessel become more efficient.

Other beneficial effects are:—Firstly, exercise produces deeper breathing, and thus the suction power of the chest is made more efficient: it increases the efficiency of the vaso-dilators and contractors, improves metabolism and by causing a group of muscles alternately to contract and dilate, the flow of the blood towards the heart is facilitated.

It also acts reflexly on the splanchnic nerves, and thus causes the organs supplied by these nerves to contract and empty their contents. Lastly, exercise increases the efficiency of the different organs of the individual, so that the usual activity of daily life becomes less fatiguing.

Work, then, benefits equally the patient suffering from heart disease as it does the healthy individual. The only difficulty is that of knowing how to regulate the exercise, so that it shall be both effective and at the same time not an undue strain for the heart.

The difficulty of this problem is not limited to the treatment of disease: how many problems which are waiting in vain for a solution in our present age would be abolished if work—useful work, be it physical or be it mental—could be so regulated as to make it bear a certain and defined relationship to the requirements of the organs and the faculties of the individual! It is an ideal which cannot be applied to everyday life, but which must be enforced in the enfeebled organ where the reserve power is small and the demarcation line between activity which is beneficial and activity which leads to overstrain is so narrow. In the various physical appliances which can be usefully graduated we possess a method of making this ideal applicable to the patient.

But the application of exercise to disease can only become useful when all the laws of the physiology of work are taken into account.

Thus the amount of exercise must bear a definite relationship to the reserve power of the heart. It must follow the laws of activity and repose—an art means, its application must be rhythmical. Only one group of muscles should be exercised at one and the same time, in order to avoid as much as possible overstrain of the heart.

As far as the actual effects of exercise on the circulation are concerned, it produces, when employed in sufficient strength, an increase of blood pressure which lasts from fifteen to twenty minutes after work has ceased, and is followed by depression of a few minutes’ duration, and only then the pressure returns to normal. The increase of the blood pressure is due to the systole and the diastolic pressure remaining the same as before, which means that the amplitude increases. The pulse rate becomes more frequent and the pulse becomes pronouncedly diastolic. Repeated exercises of the same intensity fail to produce, after awhile, an increase in blood pressure. Moderate exercise does not increase the blood pressure. These few data with reference to the effect of exercise on the healthy and diseased heart will give the physician clues as to the indications and contra-indications of this form of treatment for heart disease.

Exercise is indicated in cases where there is a good reserve power of the heart and the muscles of the body are badly developed, as is often met with in young people. And here exercise will sometimes work wonders.

Secondly, it is indicated in fatty hearts, where it will often effect a permanent cure.

Thirdly, it is indicated in neurosis of the heart.

Fourthly, it is indicated in the convalescence from defective compensation in chronic valvular disease.

Finally, it is indicated in all cases of chronic valvular disease where the heart muscle is intact.

It will maintain a better compensation than digitalis would under the same conditions, without of course producing any of those bad effects which the prolonged use of this drug entails.

It is contra-indicated:
1. In anemia pectoris and aneurysm.
2. In patients who have led a too strenuous life.
3. Soon after an acute attack of valvular disease and after rheumatic and other fevers.
4. Where the reserve power of the heart is small, and where there is a great deal of edema and difficulty in breathing.

In arterio-sclerosis, so long as the disease has not progressed too far, the patient will do well under physical treatment; the heart will become stronger and the patient will be able to follow his daily occupation with less effort than usual, and carefully graduated exercise will not increase the blood pressure.

So far as the actual methods are concerned by which the treatment is to be carried out, only the following systems permit of a scientific graduation: the Oertel, the Schott, the Zander, and the Herz systems.

The Oertel system consists of gradually increased walking exercise, first on flat surfaces and afterwards on gently sloping hills. This method does not allow of careful graduation, and ought only to be recommended for the patient who has carried out a successful course of treatment by means of the other methods.

The Schott system consists of a series of move-
ments, active and passive, carried out on alternating muscle groups by means of manual manipulation. Here also perfect graduation is impossible to attain; for the manipulator, being a human being and not a machine, is unable to gauge always the exact graduation required.

The Zander and Herz systems are very similar to each other. They consist of a series of apparatus suitable for the manipulation of the different muscle groups. By means of levers and weights careful graduation can be obtained. The machine for active movement is of course worked by the patient himself, those for passive movements by means of a motor. I use the Zander system, which I have fitted up at my premises, and can therefore only speak from personal experience of that system.

Before carrying out a course of exercise the patient should be carefully examined in regard to the reserve power of the heart. This is best done by making the patient carry out a few simple movements, and noting their effect on the heart.

The movements are carried out slowly, about twenty times in the minute. In mitral disease a great deal of attention should be paid to breathing exercises, whilst in aortic trouble the exercise of muscles is more important. In order to avoid any possible overstrain it is best to start with more difficult exercises, gradually going down to the easy ones, then allowing a few minutes' pause for rest.

* The effect of CO₂ water baths is neither due to CO₂ nor to the water bath alone. An ordinary water bath of a temperature at which CO₂ water baths are usually given produces a marked increase in the blood pressure and a diminution of the pulse rate. The CO₂ gas bath, on the contrary, increases the pulse frequency (Grodell); the blood pressure is not influenced at all. The CO₂ gas bath excites always a feeling of warmth in the patient; the ordinary water bath, at a temperature at which CO₂ water baths are usually given, produces a feeling of coldness. A CO₂ water bath at a temperature of 33°-35° does not affect the blood pressure; colder baths produce an increase of the same, but the pulse rate always diminishes under its influence. The patient, too, feels more comfortable in a cold CO₂ water bath than in an ordinary bath of the same temperature.

To the antagonistic properties which are contained in the CO₂ water bath Senator and Frankenhauer ascribe the beneficial effect of these baths on heart disease. The CO₂ bubbles in the CO₂ water bath force away the cold water from the surface of the body, taking its place and exciting a feeling of warmth; thus a perpetual interchange between cold and warm stimuli, which are acting on the body, is taking place. Whether this theory is correct or not is difficult to say. One thing is certain: it is a mistake to attribute, as Mackenzie has done, the sole effect of the CO₂ water bath to the ordinary water.

Besides producing warmth, CO₂ becomes absorbed by the skin and excites deeper and more voluminous respiration.

CO₂ water baths contract the vessels of the periphery, dilate those of the brain and abdomen and diminish the rate of pulse frequency. A different distribution of the blood takes place in various parts of the body, the skin reddens, the heart action is increased, and the breathing becomes deeper without becoming more frequent under its influence.

All these signs indicate that CO₂ acts primarily on the vessels, making them dilate and contract more efficiently, and thus diminishing the resistance to the heart's activity.

That CO₂ water baths have a good effect on suitable cases of heart disease can hardly be doubted. It has been repeatedly demonstrated that under its influence a diminution of cardiac dulness and return of the apex beat to the normal has taken place. I have myself often experienced an irregular pulse becoming regular under this treatment.

The same indications and contra-indications that apply to physical exercise also apply to CO₂ water baths. In the treatment of patients by means of CO₂ water baths the same graduations as in physical exercise must be observed. By increasing the CO₂ in the bath and lowering the temperature, the effect of the bath can be increased. In treatment of heart cases at my premises, I usually combine the CO₂ water bath with physical exercise, but one method of treatment can be successfully carried out without the other.

THE OPHTHALMOSCOPE IN GENERAL AND MEDICAL PRACTICE.

By C. O. HAWTHORNE, M.D., F.R.F.P. & S. GLASG.

Physician to the Hampstead and North-West London Hospital, and to the Royal Watford Hospital for Children and Women.

On more than one occasion, when addressing practitioners and students of medicine, I have ventured to say that the clinical examination of any patient, to be satisfactory and secure, must include inspection of the fundus oculi and other parts of the eyeball, just as it must include the use of the stethoscope and the application of chemical tests to the urine. Until recently I was under the impression that this proposition, though widely ignored in practice, was not seriously challenged in principle by any responsible authority. It appears, however, from a lecture published in the Clinical Journal (a) some months ago, that in affirming the necessity for the routine use of the ophthalmoscope, and in advocating the measures necessary to secure this end, I display 'extraordinary ignorance,' am guilty of 'confusion between diagnosis and treatment,' and fail to appreciate 'the responsibility attaching respectively to the physician or ophthalmic surgeon with regard to each.' The last two counts of this indictment, in spite of their truly terrible sound, are decidedly wanting in precision, and as no particulars are advanced in their support, I may be excused for failing to understand them. As for 'ignorance'—well, this is a fairly widespread failing. Dr. Johnson himself pleaded guilty to the charge; even ophthalmic surgeons may not altogether escape it; and a physician must be content to be condemned by his neighbours. Yet, while making my confession with all due humility, I may perhaps be allowed to remark, that my personal failings in no way affect the value of the propositions I have stated. These must be met, if met at all, by argument, and not by the advertisement of my 'extraordinary ignorance' or by the announcement, ex cathedra, that my 'mistake... is the confusion between diagnosis and treatment,' whatever this may mean. The

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(a) January 20th, 1914.
personal seeling may quite possibly be just, without affecting in the least degree the validity of the claim that unless the fundus oculi is examined in each individual patient a serious error in diagnosis and treatment may at any time result. This proposition stands by itself, and may readily be discussed without reference either to ignorance on the one side or to omniscience on the other.

To prevent all misconception, I may briefly repeat the two main propositions of this paper, which has provoked the discussion in the critique. The first is that any of the pathological changes which occur in the fundus oculi are important, not because they are signs of local disorder, but because they announce the existence of some constitutional or visceral disease. And my second proposition runs, that these fundus changes are not infrequently the first available clinical evidences of the diseases to which they severally belong. If these propositions are accepted—and they are really quite beyond challenge—it shows that unless examination of the fundus oculi is adopted as a routine measure in every patient, a diagnosis which would have been readily possible by means of the ophthalmoscope, will, every now and then, be postponed or missed. From this conclusion there is no possible escape. Opinions may differ as to the frequency or infrequency of such a disaster, but that the disaster will sometimes arrive, and as a matter of fact does arrive, cannot possibly be questioned. There is one way to avoid it, and one way only, namely, to make the practice of ophthalmoscopic examination a part of the routine investigation of every case. Unless someone can tell us in advance which cases need ophthalmoscopic examination and which make no such demand—and no one pretends to do this—we can never be sure that negligence in any individual instance may not mean for our patient the calamity of a diagnostic error; and the importance of this statement is emphasised by the knowledge that disturbances of the most serious significance may exist in the fundus oculi and yet the patient be free from any sense of visual defect.

Given, therefore, an individual patient, it is imperative, if he is to be efficiently protected, that his medical adviser shall know whether there are, or are not, pathological changes in the fundus oculi, which is only another way of saying that an ophthalmoscopic examination is an essential part of every complete clinical examination. Is this conclusion accepted? It is the main proposition of the paper for which I am criticised, but I do not find that any critic either explicitly accepts it or explicitly rejects it. He tells us, it is true, that, as even "ignorant" people know, "there are many diseases of the eye which are compatible with fairly perfect vision, as shown by the test types"; and he allows that "most of these conditions require skilled use of the ophthalmoscope." But whether from these premises he draws the conclusion that every patient ought to have the benefit of an ophthalmoscopic examination it is impossible to say. All we are told is that "the skill used in the ophthalmoscope . . . is no part of a general practitioner's work." Diseased conditions of the first importance may be present though the patient is unconscious of any visual defect; they can be discovered only by ophthalmoscopic examination—these propositions are duly announced; but their application in practice remains in doubt. Do they mean, or do they not mean, that the only secure method to pursue is to examine the fundus oculi in every case? This question involves the central point of the controversy; and yet in the lecture with which I am now concerned it is nowhere plainly answered. If it is to be answered in the negative, then clearly a certain proportion of our patients must be left to the hazard of a diagnostic error. If, on the other hand, we agree that safety is not possible without ophthalmoscopic examination, and I shall venture to assume that I am contradicted—there remains only one further issue to be considered, namely, By whom is this examination to be made?

My answer to this question has been that the examination may quite well be undertaken by the practitioner in charge of the case, and that medical education ought to include the modest measure of training which is necessary for this duty. I have urged, further, that this is the ideal to set before every practitioner; and I now venture to add, that unless undertaken by the family practitioner, the ophthalmoscopic examination in the great majority of instances will not be undertaken at all. The only alternative is someone believed to be a specially trained expert. But this would mean that every patient needing a complete examination would have to be referred from his usual medical adviser to a practitioner believed to be specially competent in the use of the ophthalmoscope; and it is needless to say that in practical life this is out of the question. If a patient is conscious of defective sight he will doubtless be ready to take expert advice on the subject, but on the mere possibility that the examination of the interior of his eyeballs may perchance yield some useful information he will hardly be ready to spend either time or money. It follows, therefore, that if the ophthalmoscope is to realise its value as a help in the diagnosis of visceral and constitutional disease, its use must not be confined to the practitioners of ophthalmic surgery. On the contrary, it must be placed where alone it has a full opportunity, namely, in the hands of the family practitioner. That obscure and difficult points in reference alike to observation and interpretation may need a specially experienced skill or judgment, is a commonplace, and is not in dispute. But this in no measure qualifies the argument already stated. This argument lies in a narrow compass: unless the ophthalmoscope is used as a matter of routine the beginnings of disease may be overlooked; such use must either be adopted by the family practitioner or confined to a limited number of experts; on the latter plan ophthalmoscopic examination cannot but be widely secured; therefore anyone who admits that such examination is necessary must needs urge its cultivation in general practice.

It may be possible to hold that inspection of the fundus oculi is not a necessary part of a general clinical examination; that, in other words, the neglect of it is not of any practical importance. But it is not possible to hold that such examination may prevent serious diagnostic error, and yet to teach that it need not be made. On the contrary, examination ought to be made, and the choice is between the so-called expert and the family practitioner. The former is largely out of reach. There remains only the family practitioner; and this is the burden of my claim.

It seems necessary to ask quite plainly what is the ground on which opposition to this claim is
based. Is it contended that routine ophthalmoscopic examination is unnecessary? Or is the demand that this examination should be undertaken only by those who practise ophthalmic surgery? In the lecture with which I am now concerned we get no clear answer to these questions. On the one hand we are told that the "skilled use of the ophthalmoscope . . . is no part of a general practitioner's work, and that "skilled ophthalmoscopic examination" is for general practitioners an "exceedingly unworkable ideal." On the other, it is announced that "the use of the ophthalmoscope . . . serves to break the monotony of general practice," and the practitioner is advised to study the diseases of the eye in such a fashion as to be able to localise "the part of the eye which is affected and the probable cause of deterioration in vision." But if the practitioner may use the ophthalmoscope to relieve monotony or to localise disease, why may he not use it as part of his scheme of general examination? To allow the one motive as practical and to whilst uttering solemn warnings against the cultivation of the other, is surely to preach doctrines which are mutually inconsistent.

That the ophthalmoscope is a sacred instrument and is only safe in the hands of an ophthalmic surgeon is a position which, however absurd, can at least be understood. But to advise it as a relief from monotony, and yet to describe its general employment as "an unworkable ideal," is to escape the possibility of logical defence. The use of the instrument may be either advised or condemned. But no extenuation can be made to cultivate it as a recreation while avoiding its practical values can only be described as amazing.

The essential fact of the situation is that the ophthalmoscope is an instrument by which the nervous, vascular and other tissues of the eyeball can be examined. The state of these structures is often of importance to those who practise ophthalmic surgery, and practitioners so engaged, naturally therefore, cultivate the art of ophthalmoscopic examination. But in many cases, the same issue is involved in any question of local surgical procedure, and practitioners responsible for such cases are under an obligation in each instance to settle the matter definitely one way or the other. This they can do—and often there is no alternative—by learning to examine the fundus oculi for themselves.

To present this practice as a rash and anxious undertaking, entangled amidst "the ramifications of ophthalmology," is to invest with an air of unnecessary mystery what is really a perfectly simple exercise. And, indeed, a forward proceeding—a proceeding, too, which may readily be mastered by any practitioner (a) who, for his own benefit and the benefit of his patients, will give a little time and trouble to its cultivation. More especially in these days of the electric ophthalmoscope the inspection of the fundus oculi is, in the great majority of cases, a matter of extreme simplicity (b), and anyone who employs this method will soon learn to distinguish between what is normal and what is abnormal, even although for the precise identification of any abnormality observed he may, at least in his early days, find it necessary to solicit some more experienced opinion. It may be quite true, as we are told, that the ophthalmic surgeon can boast "a knowledge of optics (a) and the many details of refraction work, some parts of general medicine and surgery, neurology, the variations of the normal anatomy and physiology connected with vision, together with the special surgery of the eye." Such a recital revives the familiar figures of Goldsmith's schoolmaster and his village audience:—

"And still they gazed, and still the wonder grew.
That one small head could carry all he knew."

To wear so considerable a weight of learning "lightly, like a flower," is indeed no small achievement, and we may bow before it in respectful admiration and amazement. But wherein does it provide a reason why those of us who have no surgical ambitions should hesitate to cultivate the services and guidance of the ophthalmoscope? This is the more so, if we prize, and it in no way conflicts with due respect and regard for the manual and mechanical dexterities of our surgical colleagues.

On the point of the medical curriculum it is certain that under modern conditions the medical student has a training in physics and physiology quite sufficient to fit him to appreciate the optical questions involved in the use of the ophthalmoscope; and on the practical side my argument has been, that as the application of the ophthalmoscope has a much wider range than the activities of ophthalmic surgery the student ought to be introduced to this larger area as an essential part of his practice and training. He ought, to quote my challenged paper, to see "the physician in the wards and the assistant physician in the out-patient department making an ophthalmoscopic examination as much a matter of routine practice as are auscultation of the cardiac sounds and estimation of the tendon-jerks. And in saying this I am not to be accused of advocating an opinion detached from actual practice and based on "ignorance," "confusion," and an "underlying mistake." From many years' experience as a clinical teacher and examiner I am satisfied that students can easily be trained to regard and to use the ophthalmoscope as a necessary means for the routine investigation of medical cases; and in view of this experience I cannot allow such a method to be "an unworkable ideal."

Moreover, in what I have said, I have, after all, done little more than repeat what has been urged by voices of much greater command. It is more than twenty years ago that Dr. (now Sir) Archibald Allbutt wrote: "Every medical school is now bound to teach its students the use of the ophthalmoscope as carefully as the use of the stethoscope is taught;" and according to Sir William Gowers, writing in 1903, "no defect in medical education seems so persistent as ophthalmoscopic training. It will be so until the inspection of the normal disc is part of practical physiology, or at least is taught with the stethoscope at the beginning of practical medicine. Clinical work abounds with unused opportunities, because the eye is never looked into until the end of the student's course."

(a) "There is nothing inherently difficult in the use of the ophthalmoscope . . . and with a little practice any man of ordinary intelligence can without difficulty diagnose changes in the fundus—such conditions, for example, as optic neuritis, optic atrophy, albinism, retinitis, disseminated choroiditis, and massive haemorrhages."—Brit. Med. Journ., July 4th, 1914.

(b) On a recent occasion when the All-India Conference met in Moolah, a number of medical students who had not touched an ophthalmoscope for many years, were shown the fundus with an electric ophthalmoscope as simply and easily as they could have been shown a picture hanging on a wall through a hole in a partition. Not only so, but it is our practice to demonstrate the fundus with this instrument to by-visitors to the hospital."—Col. R. H. Elliot, The Ophthalmoscope, March, 1913.
SOME COMMON ERRORS IN NEUROLOGICAL DIAGNOSIS AND TREATMENT.

By TOM A. WILLIAMS, M.B., C.M.E.DIN.,
Washington, D.C.
Corresponding Member of the Societies of Neurology and Psychology of Paris, Neurologist to the Epiphany Free Dispensary, etc.

The fundamental error too common in contemporary therapeutics, happily passing away now, is the striking at the symptoms. It is the groundwork upon which is built the nostrum evil. These compounds make appeal only to physicians versed in nothing but pharmacodynamics, and poorly versed at that. Pathogenesis teaches better. That one knows how to slow a rapid heart does not prove the desirability of such slowing for the patient's sake. A pained abdomen does not command an opiate, but rather surgical intervention. Is there any more reason why a pained cerebrum should demand an opiate? Staphaetion by sedatives is no better treatment in nervous cases than in surgical. The difference between the two groups of cases is that surgical pathology is understood by many, while neuropathology, and above all psychopathology, is hardly even sensed save by a few.

A few examples of changed practice will make clear the point of view required in current practice in order to save the numerous nervous wrecks resulting from the exceedingly bad therapeutics now so common. If, as has been said, mistakes are more instructive than successes, there need be no apology for discussion of a few in the admittedly fallacious field of neurological practice.

Symptomatic Treatment.—In neurology, typical examples of the errors due to survival of that conception of medicine which, ignorant of causes and mechanism of disease, sought to neutralise symptoms are afforded by the belief that an excitable person should be given bromides, the symptom of excitement being met by a depressant, or that one who feels below par should be given stimulants, of which strychnine is usually the first suggested. And though a community's reflection should show the absurdity of treating by a purely spinal excitant an inadequacy of the higher neurones of the cerebrum in a patient with lower neurone reflexes already exaggerated. Even should a patient suffer from inadequate spinal activity, the practice would still be just as bad as everybody now knows enough to condemn, the indiscriminate giving of opium in painful affections within or without the abdomen, or the giving of purgatives for intestinal obstruction. The perversity of these practices stands to the reason of one who thinks in terms of pathology. But it actually required years of application of the experimental method of trial and error before surgical method superseded these evil practices.

Indiscriminate Electrical Applications.—An error almost as common is the application of some modality of electricity to patients with what is loosely called functional nervous disease. The procedure of the physician who does this has no better standing than that of the unqualified practitioner whose existence we all deplore. He forgets, if he ever knew, that the inadequacy of a patient's response to environment by means of his nervous system may originate from a bodily disorder the treatment of which has nothing to do with the nervous system at all. The apparent relief of the patient may even be due to suggestion, just as in much of the practice of the charlatan. Those who are unconvinced by this example have only to apply what I have said about chronic disease to some acute disease. In typhoid fever, for example, the interference with nervous function is invariably, even the reflexes being modified in most cases, while the cerebral systems gave their name to the disease. It is a functional nervous disorder if the term has any meaning, and yet its interference with reflexes is as true of a typhoid patient by the unthinking empiricism so often applied to chronic conditions.

It is the prevalence of this unenlightened empiricism which prevents us from convincing legislators and other laymen of the essential difference of the science and art of medicine for which we stand, in contrast with the practice of osteopathy chiropractic, optometry, Christian science and similar attempted short cuts to the relief of suffering. An instance will show the point.—

A man was referred to me by Dr. Wingert of Wheeling, W. Va., because of an increasing incapacity to manage his limbs, which had progressed to a point where his work as dentist was impossible. He had been treated for several months by electricity, and later by massage applied by an osteopath. No diagnosis had been made. These measures were therefore a waste of time and money, for the man had amyotrophic lateral sclerosis, a progressive disease usually fatal in two years, through paralysis of the muscles of deglutition and respiration.

Failure to detect Tabes Dorsalis.—An error of this type is particularly common in another, but much more hopeful, disease in which the spinal cord is affected. A clinical example will make the point clear.

A school teacher, whom I saw in consultation with Dr. Judes of Websdertown, W. Va., suffered for some years from recurring pain and numb feelings in the legs. These pains were believed to be rheumatic because they seemed sometimes to be relieved by salicylates and were greatly improved by a few months at a watering place. That she became less able to perform her work was attributed to the stress of the teacher's life, and so-called "general tonics" were prescribed. She went to Clifton Springs not long before I saw her, and was there treated by a series of baths and exercises, alternated with rest. No diagnosis was made, yet it is not conceivable that her symptoms of five years' duration had persisted for some time been accompanied by ascertained physical signs, for when I saw her last summer the deep reflexes were everywhere absent, the pupils did not react to light, the sensibility of the lower limbs was seriously impaired, and there was some inco-ordination. Of course, the diagnosis was tabes dorsalis. Appropriate treatment has enabled the young woman to recover weight.
and strength, and she is now performing her work more satisfactorily than for five years past.

Because of space limitations other cases are not here published, but it may be stated in general that rheumatism for lightning pains, asthenopia for parietic strabismus, gastric ulcer for tabetic crises, and even tuberculosis for laryngeal crises and cystitis for tabetic bladder are not uncommon errors. The Wassermann sero-diagnosis is of but little help, for in 40 per cent of tabetics the reaction is negative. The clinical diagnosis is thus the paramount means still.

(a) Of the same type is the error of diagnosis and treatment which leads a practitioner to treat as nervous dyspepsia merely symptoms of remittent discomfit, flatulence, and pain in the abdomen, with general nervousness.

Nervous Dyspepsia erroneously diagnosed.—A case in point was that of a powerful man—referred by Dr. Burch,—6 ft. 2 in. in height, who had lost 40 pounds in weight and suffered from insomnia, great irritability of temper and great discomfit after eating. He had greatly restricted his diet on account of a diagnosis of nervous dyspepsia. When he was first referred to me, eggs and milk were his main sustenance. Different medical men had rung the changes upon alkalis, acids, stomachics and adjuvants of various kinds. Besides these, sedatives had been given freely; so much so that his fatigability was extreme and he easily became lachrymose. For those who employ it, the diagnosis "abdominal neurasthenia" would have been ready. Physical examination, however, showed in the first place great exaggeration of the deep reflexes, a tachycardia of 110, and a fine tremor. Great variability of the blood pressure at different examinations was also revealed, and excessive perspiration was easily provoked, while irritability was a prominent feature of the case. This was not of the psycho-genetic type, for the only possible agent revealed by psychoanalysis was an apprehension lest his condition might have been provoked by the excessive venery in which he had indulged until about two years before. Further analysis showed this not to be the source of his anxiety, which, in so far as it was psychological, was the natural response to the morbid feelings produced by his grave physical condition.

In spite of the absence of ocular signs and of thyroid enlargement, the case was declared to be one of hyperthyroidism plus paretic-glandular dystaxia. The dyspepsia was just as secondary as were the other symptoms. Although we do not know the etiology of this disease and are obliged to resort to empirical treatment, yet it is more rational to apply the latter to the more primitive disorders than to such secondary effects as dyspepsia, nervousness, insomnia, sweating, exhaustion, or tachycardia. Accordingly, the dystatic glandular apparatus was eliminated by stimulation of the cutaneous circulation through changes of temperature by means of water, this being followed by periods of repose, for the maintenance of adjustment during freedom from stimuli, physical or psychological. A balanced dietary was also imposed, and the man's anxiety about himself allayed as much as possible. The therapy was difficult, but finally succeeded, and the man is now at work, free from symptoms, although not quite up to weight and still a little abrupt in his reactions.

A diagnosis of nervous dyspepsia, too, is the usual fate of patients in the early stages of pernicious anemia. A proper examination of the blood would, of course, obviate this error.

In pellagra, likewise, remittance of the gastro-intestinal symptoms leads to the same erroneous diagnosis and treatment on the part of clinicians who think only in terms of symptoms to neutralise.

Nervous Dyspepsia diagnosed in a Case of Pellagra with Spinal Sclerosis.—A woman about 48 years of age, was seen with Dr. Cobey of Frostburg, Md., in October 1912. She gave a history of long standing nervous dyspepsia and anemia. Recently she had become progressively weaker until locomotion was impossible without assistance. Glossitis, varying in severity, was said to have lasted four years. She had been treated for years for dyspepsia and pernicious anemia had lately been suspected, but the characteristic blood picture was stated not to have been present. Syphilis was then thought of, and a mercurial course given without benefit.

Upon examination, the tendon reflexes proved all absent except those of the right arm and the left radius, which were very feeble. The plantar reflexes were feeble also, and the pupill reflexes, though brisk, were not maintained. Tingling and numbness in the hands and feet annoyed her.

Sensibleness to pin pricks was lost below the knee except on the fibular border of the foot, where it was feeble, as also in the thighs. Touch and vibration were lost and impaired in the same regions respectively. Attitude sense was lost only in the ankles. Pressure pain was everywhere exaggerated. The temperature sense was not tested.

Motility was much weakened in the whole of the lower limbs, especially so in dorsiflexing the feet. The left toes was weaker than the right. But the patient was feeble in general. The gait was shuffling and unsteady, and she fell readily when unsupported. Ataxia was absent.

Nervous dyspepsia should be diagnosed only when its genesis is psychological, and this can be found out only by a proper analysis of the patient's case.

Neuritis Erroneously Diagnosed.—A most common error is a diagnosis of neuritis because of the presence of local pain, especially when this is increased by movement or pressure. One such case I described fully before the Medical Society of Virginia in 1910. (a)

The pain in the right arm from which this young woman suffered was due to the dragging upon the muscular attachments caused by the tension of her muscles produced by an occupational psychogenetic writer's cramp, of which I cured her.

An occupational pain in the shoulder was similarly the cause which led a young male stenographer, supposedly neuritic, to be sent last spring, by Dr. Noble Barnes. Actually, the pain did not arise from irritation of the nerves in the arm. Nor did it come from a psychological source, as in the case of the last patient. The fact that it was allayed by rest,

(a) See Case II, Semi-Monthly, December 21-1, 1912.
which is really no proof of a so-called neurosis, arose from its production by a traumatic lesion of the connective tissues, including the subacromial bursa.

Local neuritis is an unusual disorder except when the direct result of local trauma or infection. General infection or intoxication produces a general neuritis, the physical signs of which are well-known and unmistakable. The attribution of chronic neuritis, without proper examination, to neuritis is as reprehensible an attribution by the osteopaths to a spinal displacement. (To be concluded in our next.)

OPERATING THEATRES.

HAMPSTEAD AND NORTH-WEST LONDON HOSPITAL.

THREE CASES OF GUNSHOT INJURY RECEIVED DURING THE EARLY STAGES OF THE BATTLE OF THE AISNE OPERATED ON BY MR. JACKSON CLARKE.—Case 1.—A sturdy-built infantryman, the lower end of whose left humerus had been traversed by a rifle bullet. The elbow was nearly double its normal width. Both wound of entry and that of exit of the bullet had healed aseptically. An X-ray showed that the bullet had passed transversely through the lower end of the humerus, separating the articular surface. The trochea and capitellum were covered by this inner side of the lower end of the shaft, accounting for complete ulnar paralysis which was present.

Operation.—A U-shaped incision, convexity upwards, was made across the elbow and the flap turned down exposing the base of the olecranon, which was chiselled through, and the interior of the joint thus exposed. The ulnar and radial articular surfaces were normal, whilst the lower end of the humerus was found to be separated into two fragments, which, being detached from all their connections with the surrounding parts, were removed, and the lower end of the shaft of the humerus was shaped to suit the sigmoid cavity of the ulna. The olecranon was re-attached by passing a stout silk suture through the triceps tendon and through a drill hole in the upper end of the ulna. The incision was then closed throughout, and the limb put up on a posterior malleolus block so as to immobilize the joint.

Case 2.—An infantryman, the upper fourth of whose left ulna had been shattered by a rifle bullet, causing, as an X-ray showed, a typical bullet fracture of a hard bone, a small central space being surrounded by numerous fine fragments attached to the radial manner from the central space which marked the path of the bullet. This patient had complete ulnar paralysis. The fracture was solidly healed five weeks after the injury was received, but there was no sign of recovery of the ulnar nerve.

Operation.—The ulnar nerve was exposed by an incision beginning over the site of the nerve behind the internal condyle, and passing downwards and forwards along the septum between the palmaris longus and the flexor carpi ulnaris muscles. The nerve was exposed by separating these muscles, and three-fourths of an inch of it were found to have been destroyed by the bullet. The adjoining sound parts of the nerve were then thoroughly covered and the shortened nerve was stretched by careful digital traction, but in order to obtain their readjustment without tension it was necessary to displace the nerve from behind the internal condyle. From this process the ends were then united by catgut stitches, one passing through the whole thickness of the nerve, others through the capsule. The limb was put up in a flexed position.

Case 3.—A bullet fracture through the shaft of the humerus at the junction of the middle and lower thirds, Complete paralysis of the musculo-spiral nerve. The fracture had united at the end of five weeks, but the paralysis persisted.

Operation.—The nerve was exposed through an oblique incision over its course, and, as in Case 2, nearly an inch of nerve was found to have been destroyed. The damaged part having been excised and the nerve stretched, the ends were united as in the former case and the limb put up with flexed elbow, and a separate malleable splint was applied to the hand of the patient to maintain hyperextension in order to facilitate recovery of the paralyzed extensor muscles.

The course of all three cases was uneventful. After three weeks the patient whose elbow was excised had no further sensation over the distribution of the ulnar nerve in the hand, and had comfortable voluntary movement at the elbow through an angle of 35°. In the case of the re-united musculo-spiral nerve sensation began to reappear at the end of ten, and in the re-united ulnar nerve after 14 days.

TRANSACTIONS OF SOCIETIES.

ROYAL SOCIETY OF MEDICINE.

SECTION OF OPHTHALMOLOGY.

MEETING HELD WEDNESDAY, NOVEMBER, 4TH, 1914.

The President, Mr. PRIESTLEY SMITH, F.R.C.S., in the Chair.

Mr. A. HUGH THOMPSON showed a young girl who had dilated pupil of Argyl-Robertson type, with well-marked corneal and palpebral oedema. The condition was not congenital in her, because two years ago her pupils were normal, and she had only slight myopia. The knee-jerks were normal.

He also exhibited a case of one-sided internal ophthalmoplegia. The man was invalided from the Navy two years ago on account of supposed aneurysm. He was a stoker in the Navy, and since he left that he had been doing similar work—stoking—in a brewery. No aneurysm had been found, though he was carefully examined by Dr. John Broadbent.

Mr. ROCKFILDE spoke of two cases in his experience with mydriasis and iridocleoplegia. In one there was a strong family history of retinitis pigmentosa, but in the patient there was no retinal or pigmentum change. One patient's end was in an asylum as a general paralytic.

Mr. N. BISHOP HARMAN showed a case of congenital entropion. The lashes of the lower lid were permanently erect, and the child was born with the condition. The Meibomian glands seemed deficient. The mother was normal, but the grandmother was said to have had a double row of lashes. He proposed to split the lid, so as to separate the lashes from the glands, and graft between the two a strip of mucous membrane. If that succeeded, the lower lashes would be prevented from reaching the cornea again.

Mr. MAYO referred to three similar cases which he had had. He operated upon them by taking out a narrow band of skin on the outer side of the lid. There had been no recurrence, though one was operated upon five years ago and the patient was still well.

Mr. BISHOP HARMAN read notes of a case of high myopia in an infant.

Mr. W. H. JESSOP showed a case of tumour of the lower lid, which he regarded as a lymphangioma. A former term applied to it was elephantiasis nostras. Skiascans showed nothing abnormal about the bones, and skilled nasal investigation was negative.

Surgeon-Major ELLIOTT mentioned a similar case which he had treated in this hospital, and which was found to be sporocephalos oculonella.

Mr. LESLIE PATON said he had seen a similar case following the extensive scarring of lupus, and there was complete blockage of the lymphatic ducts draining the lid. He sent the case to a colleague with the request that he would establish a permanent drain into the lymphatics of the lip.

Mr. HARMAN reminded members of a case shown at the Loco-Motorical Section of which draining was done into the neck, and answered fairly well.

Mr. A. W. ORMOND exhibited a doubtful case for
diagnosis, which was generally regarded as inflammatory.

Mr. H. L. Eason exhibited an interesting example of a curetted tubal pregnancy which he had improved upon. As perforation was occurring in the ciliary region, the only course was removal of the eye. He had had a case in which perforation occurred in three weeks; in this case it commenced in the fifth week and ended in perforation. Mr. Dawney showed a patient suffering from intraocular metastatic carcinoma.

Mr. W. T. Holmes Spicer read a communication entitled CYSTS IN THE ANTERIOR CHAMBER ARISING FROM THE PARAS CIARIAS RETINA, and illustrated it by a number of slides. The case had been under observation seven years; it began with a purplish spot at the edge of the pupil at three months of age. At 16 months, when first seen, there were three opaque, finger-shaped masses coming into the anterior chamber from behind the iris. Four years later these had disappeared, and a cyst about 4 mm. in diameter was seen floating freely in the anterior chamber. Other cysts appeared later, and finally there were seven, floating like toy balloons in the anterior chamber. In the meantime the eye had become glaucomatosus, a ciliary staphyloma had formed, and the eye was removed. The pathological examination was made by Mr. Geeves. It was found that the cysts were formed of embryonic retinal tissue containing vitreous. They had their origin in the paras ciliaris retina, starting from cellular membranes, which grew over the iris and also into the vitreous; the cysts grew on the surface of these membranes. There was, in many places in the walls of the cysts, a resemblance to glioma tissue. The case further proved the non-metastatic origin of the vitreous.

Mr. Treacher Collins, discussing the case, said it bore out the view of embryologists that the vitreous humour was derived from neural epithelium; it further showed that it was derived from only one portion of it. Mr. Mayow referred to a case of his own in which there was a pigmented tumour in a microphthalmic eye, consisting of epithelial cells. It only occupied an eighth of the segment of the ciliary body.

Mr. W. Lang spoke of a case he saw with Professor Fuchs, in which there was a semi-translucent brownish cyst in the anterior chamber. Since then he had had a similar case of his own, but an attempt to deal operatively with it was a success.

NORTH OF ENGLAND OBSTETRICAL AND GYNECOLOGICAL SOCIETY.

MEETING HELD IN LIVERPOOL, OCTOBER 16TH, 1914.
The President, Dr. Willett (Liverpool), in the Chair.

Dr. W. K. Wallis (Manchester) exhibited a specimen of double hydrophthalmic and tubo-ovarian cysts removed with the body of the uterus from a young lady, married a few months, whose appendix had been removed a few years previously.

Dr. Forsyth Gill (Manchester) described a case of double uterus with right pyocolpos. This case presented great difficulties in diagnosis. The patient was a virgin, at 22, with normal menstruation, who complained of pelvic pain of some days' duration, and had a raised pulse and temperature; on examination two masses could be felt which, on account of the symptoms, were taken to be the uterus and a matted appendage. The abdomen was opened and the matted mass was removed, and then the halves of a double uterus, with no sign of inflammation, below which, on the right side, a fluctuant swelling could be felt. This swelling was opened from the vagina, and proved to be the occluded right half of the vagina filled with pus.

Dr. Gemmel (Liverpool) exhibited a specimen of adeno-carcinoma of the uterus, removed from a patient, at 22, who complained of pain and a slight vaginal discharge.

Dr. Briggs (Liverpool) showed a specimen of a soft resilient interstitial uterine fibroid from a woman, at 30, in which there was great difficulty in making a diagnosis between fibroid and pregnancy. Also a stony hard fibroid, which was difficult to diagnose from its shape, occupied a loop of small intestine and the patient gave a history of a uterus from a case of post-climacteric hysterection.

Dr. Fletcher Shaw (Manchester) described a case of septic miscarriage followed by intestinal obstruction. The obstipation occurred five days after the miscarriage, which had been followed by sepsis; the symptoms of which had abated. An abdominal section revealed a loop of small intestine adherent to a mass of glands in the region of the sacral promontory. The appendix was removed, and the patient did very well for two days, when acute peritonitis supervened, for which the abdomen was again opened and drained. The patient made a good recovery. In all probability the glands were enlarged from the uterine.
promote valuable co-operation), with the result that it is a very representative and powerful body of business men and women.

The Council does not propose to offer any form of charity in relief, as this would naturally be both impossible and undesirable, but it does propose to give certain forms of assistance, which will, it is hoped, tide over the critical period of the war, enabling people so severely hit to resume their normal status when the war is over.

The majority of the professional societies have their own schemes of relief; these are and must remain quite independent, but it will ensure the most adequate return for outlay being obtained if certain forms of assistance are centralised and made available for their use.

The chief forms of assistance arranged are in matters of education, training, emigration, maternity aid and temporary employment, all of which are worked under separate representative sub-committees of men and women whose positions and capabilities fit them especially for dealing with their special departments.

For example, the Education Committee is composed of the presidents of the principal educational associations, and has as its object the arrangement of co-operation with the proprietors and governing bodies of schools by which children, whose parents through financial stress are unable to pay the usual school fees, will be maintained at school at reduced subscription from the funds of the Council, thereby ensuring both the continuity of the schools, many of which would otherwise have to close down owing to the withdrawal of pupils, and also the uninterrupted education of the children, which is so vitally important to the national life.

The Training and Emigration Committee proposes chiefly to arrange free training for those professions for which it has been ascertained that openings exist in the Overseas Dominions. This will apply mainly to men and women in already overstocked professions.

Numbers of Domestic and Emigration Colleges have offered free or greatly reduced terms to the Council, and these scholarships are immediately available.

The Maternity Assistance Committee proposes to open a maternity nursing home for wives of professional men, and has been joined by voluntary doctors and medical ladies. A suitable building has already been generously lent for the purpose. It is also proposed to give free maternity assistance in their own homes, so long as those homes can be reached within a day's journey. The Council will include some of the most well-known men and women in the medical world, including the President of the Royal Society of Medicine and the Treasurers of the Royal Medical Benevolent Fund.

The Temporary Employment Committee has been organised to develop opportunities for temporary employment in works of public and national utility, both for men and women.

It has also been found necessary to meet the demand for immediate relief while people are waiting to be placed in permanent work. The Women's Emergency Corps and the National Union of Women's Suffrage and other women's organisations for needlework, toy making, etc., for professional women, which have been arranged to make available to nominees of the Council.

It will be seen how far-reaching and important the work of this Council is, for it affects not only the conditions immediately confronting us while the war lasts. It may develop on such lines as would be of permanent value in information available to those interested as to the conditions and opportunities of employment in the various professions.

It is necessary to form a central fund to carry on this great work, this fund being used to organise and maintain the various forms of assistance proposed; to help those members of professions which are not organised and have therefore no benevolent funds; to provide assistance for the families of professional men who have given up all to enlist for the service of their country.

All those who have this very real need at heart are earnestly invited to give practical support by sending subscriptions to the Treasurer, Professional War Relief Council, 13 and 14, Prince's Gate, S.W. Cheques to be crossed Messrs. Coutts and Co.

**SCOTLAND.**

**FROM OUR SPECIAL CORRESPONDENTS AT HOME.**

**ADMINISTRATION OF THE INSURANCE ACT IN SCOTLAND.**

At the second annual meeting of delegates of the Scottish Association of Insurance Committees, held in Edinburgh on the 31st ult., the Chairman (Mr. R. D. M'Ewan, Glasgow) and others spoke of the unsatisfactory state of matters presently existing in connection with the supplementary grants in aid of sanatorium benefit. The complaint was made that Scotland was only getting £11,000 out of the additional £100,000 the Government had granted for this purpose. It was stated that the view was expressed that the 6d. lost to the Sanatorium Benefit Fund by being given to the doctors should be made up. After a discussion on the maternity benefit, it was agreed that the funds, which had to be organized so that they might be able to meet this end, be used for the support of the medical service in connection with the British Medical Association, and to some extent the dental service, the federations of medical societies, and the funds of which have suffered greatly, but the Leith Committee, though they wish to do so, cannot subscribe towards the maintenance of the institution.

Sir James Lees-Milne, ex-Chairman of the Scottish Insurance Commissioners, in discussing the general working of the Act, said that the unsatisfactory position of Insurance Committees with small numbers of insured persons in regard to administrative expenses, had never been brought to the notice of the authorities, and that they were generally satisfactory, except in some parts of the Highlands, where it needed strengthening, and that was now being done by special grants. The Commissioners were not so well satisfied with the stipulations in the Act as to expenses, in the way in which medical certificates for sickness benefit were granted were numerous, and in some cases justified. Steps were being taken to reduce the burdens of approved societies from this cause.

The question of drugs had received their constant attention from the outset, and the Scottish chemists had supplied medicines and appliances which were beyond criticism. There was no evidence of any restriction of drugs, but there was evidence of too lavish prescribing, and that articles, such as foodstuffs, which were not required had been ordered. He quoted several statements to show that the Scottish Insurance Committees, were agreed that the present drug fund of 1s. 6d. was ample in all normal circumstances. He urged that the building of sanatoriums should be proceeded with as quickly as possible, and that all the money so accumulated in the country would be taxed to provide for wounded soldiers. With regard to donations to hospitals, the view of the Commissioners was that these donations should not come out of the special fund provided for doctors, and Insurance Committees, and that until the other general purposes fund—could meet its other obligations, subscriptions and donations could not be given from it, to however worthy an object. It was also reported that in Scotland the President of the Royal Pharmaceutical Society was the first President of the BritishPharmaceutical Society, and that the other one of the Professional War Relief Council, 13 and 14, Prince's Gate, S.W. tablets to be crossed Messrs. Coutts and Co.

**Correspondence.**

**November 11, 191—**
extra work and done exceedingly well. The nursing grant would have to be delayed, on account of the difficulty of getting nurses; and if the grants for lectures, reports and laboratories would have to be post-
poned. The closing part of the discussion centered around the question of a central bureau for the checking of prescriptions, as to which Sir James spoke very plainly and pointed a central bureau. He said, they would have all sorts of vested interests growing up, and would be tied to an expensive, in-
efficient, local scheme. Local committees, especially small local committees, would not exercise their functions, simply because one particular man did not want to offend another. What was wanted—and this was the point which was rammed home to him by doctors and chemists—was a central authority which would act impartially.

ROYAL FACULTY OF PHYSICIANS AND SURGEONS.

At the annual meeting of the Fellows of this Faculty, Dr. John Barlow was re-elected President; Dr. Ebenezer Duncan, Visitor; Dr. W. G. Dun, Treasurer; and Dr. Alexander Napier, Honorary Librarian. The following new councillors were elected:—Dr. James A. Adams, Dr. Freelead Ferguson, and Dr. Robert Jardine. The Fellows unanimously agreed to subscribe 100 guineas to the Prince of Wales's Fund and 1,000 to the Boys' and Girls' Aid Fund.

THE HEALTH OF GLASGOW IN 1914.

In his report upon this subject, Dr. A. K. Chalmers, the Medical Officer of Health, estimates that in the middle of 1914 the population of the city was 1,032,028. The excess of births over deaths explains fairly well the increase. Infant mortality was slighter, more, amounting to 129 per 1,000 births, practically one-third being due to immaturity.

LIEUTENANT HUGGAN, R.A.M.C.

This gentleman is a well-known Scottish Rugby Internationalist. The circumstances of his case was at the seat of war have now been made known. He had volunteered for field duty where he could attend cases in the fighting zone. In the course of his work in this sphere he had gathered a number of wounded men into a cave. One of them was a German officer. In order to have more light to attend to this man's wounds, Lieutenant Huggan took him outside, when a shell came and killed both of them.

PROPOSED HOSPITAL AT AYR.

To relieve somewhat the pressure upon the hospitals in Glasgow, it is proposed to establish, with the approval of the War Office and under the auspices of the British Red Cross Society, a Red Cross Hospital at Carrick House, Ayr, the use of which has been kindly offered by Mrs. Arthur.

ADDITIONAL MOTOR AMBULANCE WAGGONS.

Six additional vehicles of this kind were shipped from Glasgow at last instance, to augment the fleet of wagons employed by the Scottish Branch of the British Red Cross Society in connection with the Scottish Hospital in France. Four of the six are Wolseley wagons and two Albions. Of the Wolseleys, three have been provided by the branch of the National Relief Fund, while the fourth was the gift of an anonymous donor. The wagons provided through the Herald fund have been named "John Hunter," "William Cullen," and "James Syme." Two others, previously provided through it, bear the names of Lord Lister and Sir Robert. Two Argyll wagons will be sent later from Glasgow to add to the above.

STOBHILL HOSPITAL.

Stobhill Hospital, Glasgow, is now entirely in the hands of the military authorities, the Parish Council having meantime relinquished it. Further contingents of wounded have arrived.

BELFAST.

A BATTALION of 130 wounded soldiers has just arrived in Belfast from the front. Most of the men have been injured within the last week at the battle of the Yser. They were located as follows:—to the Royal Victoria Hospital, 30 to the Mater Infirmary, 24 to the military hospital at Victoria Barracks, and the remainder to Downpatrick and Omagh.

The Medical Board of the Ulster Volunteer Force has offered a fully-equipped hospital of 100 beds in the Exhibition Hall, Belfast, to the War Office. This offer has been accepted.

The same body has handed over to the St. John Ambulance Brigade a reserve of 100 vehicles. The Voluntary Aid and Nursing detachments in Belfast and a most impressive display of the Ulster Fraternity was held in the Ulster Hall on the 3rd inst., when Lord Randal formally took these over on behalf of the Association.

LETTERS TO THE EDITOR.

[We do not hold ourselves responsible for the opinions expressed by our Correspondents.]

YOUNG SOLDIERS AND SOCIAL DISEASE.

To the Editor of The Medical Press and Circular.

Sir,—A Committee of the Liverpool Medical Institution have had especially written and printed suitable literature for soldiers, directing their attention to the dangers of the venereal diseases. In our opinion, this matter is of more importance than the question of drink. A man may recover from a drinking bout, but with the other infection he is only so much lumber on service. We are anxious to interest commanding officers' chaplains, medical men and others who are in a position and would undertake to distribute these pamphlets among those for whom they are intended. They will be supplied free so far as our funds admit. Correspondence is invited, and letters addressed to the Librarian, Liverpool Medical Institution, will receive attention.

I am, Sir, Yours truly,

M.A., M.D.

Liverpool,
November 7th, 1914.

THE MEDICAL DEFENCE UNION AND BOGUS PRACTITIONERS.

To the Editor of The Medical Press and Circular.

Sir,—May I be allowed to state that the successful prosecution of the unqualified medical practitioner, Robert Reginald Renton, alias Wing, at Sheffield, referred to in your last issue, was carried out by the Medical Defence Union, a warrant having been obtained for the man's arrest by the Union shortly after the inquest was held to which your Editorial refers. The penalty ordered to be paid has proved irrecoverable, and the alternative imprisonment, there-

fore, is being enforced against the defendant. In this case, as in so many actions with which I have to deal each year, The Medical Register is little or no protection to the public against unqualified practice; indeed, in many instances it is a source of danger. Names and qualifications of practitioners upon the Register residing abroad are continually being assumed by impersonators with perfect impunity as far as the statutory authority is concerned, and the detectives work done in this office and the valuable aid of the Public Prosecutor, successful convictions
would never be obtained. The General Medical Council has apparently no machinery whatever with which to cope with these cases or to proceed against the offenders, and the whole cost of detection, collecting evidence, and preparing the cases for prosecution rests upon the Medical Defence Union solely. A very grave case of impersonation and forgery of death certificates will be tried in a London Police Court this week, the detection of which was entirely due to the Medical Defence Union.

I am, Sir, yours truly,
A. G. BAYEMAN,
General Secretary.

Medical Defence Union,
4, Trafalgar Square, London,
November 4th, 1914.

THE HOUSE SURGEON DIFFICULTY.

To the Editor of The Medical Press and Circular.

Sir,—I see by your last issue that the Holme Dispensary, Manchester, has been advertising in the medical journals for three months for a house surgeon at a salary of £80 and upwards, with furnished apartments, coal and gas, yet the vacancy is not filled. Evidently there is a scarcity of young medical men, and even ship surgeons can now command £20 per month. How is it that the Dublin hospitals pay their house surgeons at such a low rate—generally £1 per week, without board—or some cases the visiting staff take the fees for inquests, which should be the perquisite of the house surgeons? It may be said that the experience gained makes up for the deficiency in cash; but the experience gained and the opportunities for operating are no greater in England, yet there salary there is three or four times greater.

I am, Sir, yours truly,

Dublin,
November 7th, 1914.

THE WORK OF THE LONDON POLYCLINIC LABORATORY.

To the Editor of The Medical Press and Circular.

Sir,—Gratifying promises of support enable me to announce that the work of the Polyclinic Laboratory will be continued at 4, Bloomsbury Square, where specimens will receive my prompt and personal attention. As hitherto, earnest effort will be made to ensure that every report shall be of practical help, both in diagnosis and treatment, therefore any clinical notes will be welcomed with the specimen sent for examination.

The Laboratory will be always open, and the work will be conscientiously done at the customary fees. Special attention will be given to private instruction in all branches of clinical pathology.

I shall be delighted to see all my old and new friends every Thursday afternoon, 4—6, but individual visits will be at all times heartily welcomed by

Yours truly,
WYATT WINGRVE.

4 Bloomsbury Square, W.C.,
November 4th, 1914.

P.S.—Postal tubes send the necessary apparatus for collecting material will be at once forwarded on the receipt of a postcard.

TEMPLE OF ASCLEPIUS?

To the Editor of The Medical Press and Circular.

Sir,—I have had in my possession for a good many years a tablet of white marble which bears the inscription, "Temple of Asclepius, Cyrene." Now, I believe to be a misnomer, and, indeed, I have been informed that it is, and that the inscription should read, "Temple of Apollo." Asclepius, of course, was a heathen deity as well as Apollo, and had temples erected in his honour in various parts of Greece, very appropriately on the sites of healing springs or on the tops of mountains. But I do not know of him having been so honoured elsewhere, particularly in the ancient city of Cyrene, in North Africa, where, however, there was a Temple of Apollo. Therefore, I think "Temple of Apollo" is right. Perhaps some of your readers can throw light on the matter. Although not such a "specialist" as his brother, Apollo also had the healing art under his protection.

I am, Sir, yours truly,

November 6th.

PORTRAITS OF IRISH PHYSICIANS.

To the Editor of The Medical Press and Circular.

Sir,—I shall be greatly obliged if any of your readers can give me information as to where a portrait or a photograph of any of the following Irish medical men would be likely to be found. They were all prominent in the medical profession in Dublin during the last century, and each was President of the Royal College of Physicians.

It is probable that some of their descendants are still living in the country, and may be known to some of your readers. Any information that will lead to their discovery will be greatly appreciated.

I am, Sir, Yours truly,

F. PERCY C. KIRKPATRICK,
Registrar, R.C.P.I.

23 Lower Baggot Street, Dublin.
Arthur Saunders ... Died after 1810
William Harvey ... 1817
Francis Hopkins ... 1819
Edmund Cullen ... 1824
Charles William Quin ... 1819
Alexander Pelissier ... 1817
James Coghern ... 1820
Anthony Gilmore ... 1817
Hugh Ferguson ... 1833
James Callanan ... 1820
George Francis Todderick ... 1821
Robert Bredin ... 1822
Samuel Eton ... Died 1845
John O'Brien ... 1845
Charles Richard Alexander Lendrick ... 1841
George Alexander Kennedy ... 1805

THE GENERAL MEDICAL COUNCIL AND ILLEGAL PRACTICE.

To the Editor of The Medical Press and Circular.

Sir,—In discussing the actions or inactions of the Medical Council, it is necessary to bear in mind the statutory limitations within which it is confined. Its functions are almost entirely confined to supervision of education, the control and antitrust activities of a Register of practitioners. It possesses disciplinary powers, but these are restricted to registered men. It has no power whatever to interfere in any way with unqualified practitioners, or with quacks of any degree of infamy. The Act of 1858 can strike a name off the Register for infamous conduct; but cannot interfere with the offender if he pleases to practise afterwards, and to use his titles with the prefix "ex" before them. It has been common for those men to advertise themselves as ex-M.R.C.S., and L.R.C.P., etc. The Medical Council is not to blame for many of its apparent shortcomings. The blame lies upon the law. The Report of the Committee on Secret Remedies has incidentally demonstrated the fact, that it will be the fault of the profession if, when Parliament meets again under normal conditions, the first steps towards complete and drastic medical law reform are not speedily taken. The unanimous Report of the Committee, if left in its present form, will be defeated by the Council, unless for the better, if the law be comprehended by an Act of Parliament. I am, Sir,

Yours truly,
W. C. M.,
London, W.C., November 11th, 1914.
In the meantime I would again entreat every member of the profession to obtain and read (most interesting reading) the Report of the Select Committee. It costs only 3d. The verbatim Report of the evidence costs 2s. 7d. It constitutes a wonderful story of cynical knavery and human cruelty—more instructive and amusing than any literary work of the same size and cost, and of the present day that I am acquainted with.

I am, Sir, yours truly,
HENRY SEWELL.

The Old Rosebery,
Earlswood Common.
November 5th, 1913.

OBITUARY.

CAPTAIN R. G. KINKEAD, R.A.M.C.

We have learned with great regret of the death on the field of battle of Captain Richard George Kinkead, R.A.M.C., only surviving son of Professor R. J. Kinkead, of Galway, one of the leading medical men of the West of Ireland. George Kinkead received his medical education at the Queen's College, Galway, and the Richmond Hospital, Dublin, and graduated M.R.I.C.S. of Ireland, and M.R.C.P. of London. After a year in the Coventry and Warwickshire Hospital as Assistant House Surgeon he joined the Royal Army Medical Corps. When war broke out he was in the Municipal Hospital, but was soon brought home and attached for service to the 15th Hussars. He was killed in action on October 31st.

The following extracts are from Captain Kinkead's last letter, written on October 26th, which reached home couple of hours after the telegram from the War Office announcing his death—"I am fit and well and sound in wind and limbs, except for pains in back and legs from overstrain of the muscles, due to lifting men out of the tanks, but am now carried them back. We have to do it, as the trenches are very small, and one or two wounded men fill up a whole trench, so they must be got out unless the fire is too hot. We had a day's rest yesterday, but are in the trenches again to-day; came in last night, and it was a wet, miserable night.

"One sees in a war like this the sort of stuff our officers are made of. They are mostly 'top-hole' chaps, worshipped by the men; and if there are shells, etc., the officers throw these to lead their men's example. Even when the storms burst over one's head, one must not duck or jump—the men would see it. You would be surprised to see how quickly the men follow one's example. I hope after the war the Kaiser will get the recognition that is due to him, because he is one of the very best.

"The other day a farm, where I had been sleeping in a barn, was shelled and set on fire. My corporal, thinking I was still asleep, went into the blazing barn to fetch me out, and was not satisfied until he had searched the whole place. Now, this corporal was one of the 15th Hussars, and has only known me since I came to the regiment, just over two months. I hope after the war Tommy will get the recognition that is due to him, because he is one of the very best.

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DR. R. D. MUIR, OF HATCHAM.

We regret to record the death of Dr. Robert Douglas Muir, of The Limes, St. James's, W. 2, which took place at Broadstairs on the 24th ult. The deceased, who was 45 years old, had been in bad health for some time. He held the qualifications of M.D.Brux., M.R.C.S., L.R.C.P., Lond. Dr. Muir was well known in New Cross and he held many positions, including those of Hon. Physician to the Club and Institute Union Convalescent Home and the Medical Officer of the Sons of Temperance, being also Lecturer and Examiner to the St. John Ambulance Association. He was an ex-President of the West Kent Chirurgical Society, a member of the British Medical Association and the New Cross Medical Society, and at one time Medical Officer of the out-patients' department at the Miller General Hospital, Greenwich Road, Resident Medical Officer at Queen Charlotte's Hospital, and House Surgeon at Charing Cross Hospital. Dr. Muir had been actively engaged in the medical work of St. James's Parish, where he was highly respected. In addition he represented the London County Council as a Manager of St. James's Schools. He leaves a wife, a daughter and three sons, with whom the greatest sympathy is felt.

REVIEWS OF BOOKS.

Dietetics (a)

To be fed "with food convenient" for one's state of health and healthiest, that is, the least nourishing, as well as the most liable to be converted into one's tissues, is a most natural and simple provision of the body. But it has been found that the body only requires a limited amount of this food, and that there are certain substances which are more or less essential to a proper diet. It is the object of the present work, which is an interesting study of the dietetics of the army, to discuss the different "cures" for diet, and to ensure that the body shall not be supplied with too much or too little of the necessary ingredients of food. The book is divided into three parts: the first part deals with the general principles of dietetics; the second part with the special principles of dietetics; and the third part with the practical application of the principles of dietetics.

alcohol by persons in health could be obtained from other foods. Very few people would be any worse if they did not take it, and very many would be better if they abstained from it.

In the second part the diseases of the various systems of the body are described, with special reference to the best kind of food that should be ordered in each case of deviation from health. And here, let it be noted, are no vague directions. Typical meals and diets are given for practically all diseases for acute and chronic gout, epilepsy, mucous colitis, dropsy, eczema, arterio-sclerosis, and so on. Articles of food to be avoided are mentioned specifically in each case. Every practitioner should read the chapters upon the dietetic treatment of chronic and typhoid fever, which are full of practical detail and sound common-sense. The concluding chapters deal with vitamins, lipoids, and the deficiency diseases. Enough has been said of the method and style of this most excellent work, which must prove invaluable to medical men in every class of practice.

EXAMINATION OF THE URINE, (d)

Many of us know Husband’s “The Urine in Health and Disease.” On it the greater part of the book under review is based—this section on uranalysis. Although the fact is not mentioned in the title, the examination of the blood, gastric contents, and laces occupies a large part of the book—73 pages out of the 197 composing the text. All four sections are excellently written. The advantage is that the various processes are concise and accurate, and the headed paragraph and tabular method are effectively employed. There are 31 line illustrations, mostly showing the appearances of urinary crystals and of the various apparatus described in the text. They are clearly drawn and are excellently calculated to fulfil their function. The format of the book is essentially convenient. The pages measure three inches by five, and the use of paper which, while thin, is quite opaque, prevents any tendency to bulkiness. The type is clear and not too small. On the whole, Mr. Ilewat has given us a most handy and useful little volume, which should be in the pocket of anyone who is often called on to perform the work included in its scope, and on the bookshelves of all other physicians and students.

THE BACKWARD CHILD, (b)

There can be no question that the study of the backward child presents a problem of paramount importance with which we should be careful not to neglect. In the past this branch of study has been much neglected, but there is every reason to hope that this accusation will not hold good in the future. We refer specially to Mrs. Morgan’s book, which should be of much practical service to all those called upon to deal with backward children. The book is a radical departure from present psychological lines of work in two ways. Its aim is an analysis, an attempt to find the cause of the individual backwardness rather than the mere classifying of mental defectives; and its subject matter is the backward child who will remain in the community rather than isolated cases. The book is based on practical experience obtained in a training centre clinic conducted for two years in New York City, in which children were tested and then trained in the particular deficiency which that examination had revealed, and therefore this work can be claimed as first-hand knowledge. The various tests to be applied in the investigation of backward children are described not only minutely and with great lucidity, but also in such a way as to be easily understood by teachers of average intelligence. The author is of the opinion that a certain amount of psychological acumen on the part of the examiner is very necessary. The writer of the book makes suggestions as to systems of training to develop the neglected or unexercised functions which are responsible for such backwardness. A very interesting chapter is that giving the case notes of typical backward children. In each case of diagnosis and treatment, the types chosen illustrating (1) slow rate of development, (2) nervous intractability, (3) sullen intractability, (4) listlessness, and (5) hysteria. The book certainly traverses new ground and ought to be widely read and carefully studied. Throughout the keynote has been simplicity, and the importance of individual investigation and treatment is emphasised.

TRANSACTIONS OF THE ROYAL ACADEMY OF MEDICINE IN IRELAND, (a)

The thirty-second annual volume of the Transactions of the Royal Academy of Medicine in Ireland, consisting of contributions of the Fellows of that institution during the past academic year, presents a collection of papers of curiously uneven scientific merit. The opening article, on the “Pathology of Edema,” by Dr. W. G. Smith, is a valuable and lucid summing up of the present state of knowledge in regard to causation and development of dropsy. Other papers of interest contributed to the medical section are those of Dr. J. A. Crofton on “A Study of the Prophylaxis and Treatment of Tubercular Infections,” and of Dr. C. M. O’Brien, summarising his experience of eleven years in the treatment of superficial cancers with radium, Drs. T. G. Moorhead and A. Stokes contribute on “The Treatment of Arthritis Lamellose.” One of the most suggestive papers in the volume is that by Dr. Wm. Boxwell on “Disordered Bladder Function in Nervous Diseases.” He criticises from the clinical point of view the conventional teachings concerning the nervous mechanism of incontinence.

Save for one interesting article on the “Radical Treatment of Chronic Osteomyelitis,” by Mr. Seton Pringle, the level of the surgical papers is not up to that of the others.

The obstetrical and pathological section contains the admirable reports of the Rotunda Hospital by Drs. Jellett and Rowlette; a very interesting article on “Gynaecological Urology” by Dr. Gibson; and an instructive article on the “Use of Pituitrin in Labour,” by Drs. Madill and Allen, of the Rotunda Hospital.

Professor McWeeny contributes a long article on the Wassermann reaction, in which he maintains the greater usefulness of the “equine” compared with modifications such as Birt’s or Fleming’s.

Not the least interesting article is one by Dr. Kirkpatrick on “The Origin of Some of the Dublin Hospitals,” the volume as a whole is disappointing, and does not, as medicine would have us to believe, display the capabilities or wealth of critical material of the Dublin Medical School. The reporting of discussions is slovenly—not to say illiterate.

ASTROLOGY IN MEDICINE, (b)

Dr. Mercier, in choosing astrology in medicine as the subject of his FitzPatrick Lectures, took a subject which has filled a great past in the history of medicine. Astrology had a known history of some 6,000 years—it occupied great minds from the old Chaldean astrologers of the ancient Babylonian astronomers to the time that it was regarded as forming, if not the basis, an integral part of the practice of medicine. And if Dr. Mercier does not succeed in teaching us how to “count a nativity,” at least he may teach us to understand astrology as a great many other interesting things. He shows how astrology was the physician’s guide both in prognosis and in treatment. Drugs potent with good at one period may be equally potent with evil at another. Dr. Mercier has succeeded in opening the door to a discipline of astrology—no difficult task, surely. Indeed, Dr. Mercier rather wastes his humour on it.

(b) “Astrology in Medicine: The FitzPatrick Lectures delivered before the Royal College of Physicians on November 6th and 11th, 1913, with Addendum on Saints and Signs.” By C. A. Mercier, M.D. Pp. 100. London: Macmillan and Co., Ltd. 1914. Price 2s. 6d. net.
astrology. We would have liked his lectures better had he given us some help to comprehend how the study could have attracted and held great minds for so many centuries.

THE WAR IN BULGARIA. (d)

This delightful volume by the famous Brussels surgeon is of special interest at the present time. Prof. Laurent gives a very vivid description of his experiences during the recent Balkan campaign. The first portion of the work is devoted to an interesting account of the scenes of battle and the nature of the country. The second portion deals with the conditions encountered in the wounded on the field of battle. These descriptions are clearly portrayed by Prof. Laurent's skillful pen, and the language is made all the more striking by means of excellent illustrations after actual photographs. The book fully bears out the contention that war is a horrible affair, to be greatly dreaded by humane races such as ours, and makes us feel that a time must come when our death-causing machines will for ever be set aside and peace reign among the nations. Prof. Laurent's book is most interesting to study, and conveys to the reader a striking word-picture of the nature of the wounds met with in modern warfare together with the best measures for dealing with them.

ZOOLOGY. (d)

The present edition, the sixth, of Dr. Thomson's well-known book has been brought thoroughly up to date, and we have no hesitation in saying that as a trustworthy guide to the study of zoology the student will find that he needs in order to acquire a comprehensive grasp of the subject. The views of classic writers, as well as those of contemporary biologists, are freely drawn upon, but the author has given much attention to a comprehensive subject without endeavouring to emphasise facts—in other words, he is sufficiently dogmatic to strike conviction into the mind of the student. The whole field of zoology is covered in a succinct and informative manner, from the protozoa to man. In many sections of the book the relationship of the type or species under consideration to the cause or dissemination of disease is pointed out. Of much interest, too, are the zoological details of insects, fishes, and birds. Special mention should be made of the tables of contrast between various classes or species which are of great value to students preparing for examinations in biology. A biographical appendix is added and the whole book is admirably full. A word of praise must be given to the excellent cuts with which the book is illustrated; they are wisely chosen and add greatly to its educational value. We can recommend this text book with every confidence.

QUANTITATIVE ANALYSIS. (c)

This volume is written on somewhat novel lines. It is divided into two distinct parts. One deals with a general consideration of the subject, while in the other each substance is taken up individually. The importance of molecular weight determination is very ably brought out in a new way. In an including chapter of the book some standard methods for the analysis of certain organic bodies of technical importance are collected together. These afford the student very good general idea of how to carry out these technical estimations. Such bodies as alkalis, phenols and acids are very fully dealt with. The arrangement adopted by the authors is based on a series of lectures given by Dr. Whiteley at the London Imperial College of Science and Technology, and is, we consider, a most excellent one. The book will be found a most useful and helpful guide to quantitative organic analysis, for it contains a clear and accurate statement of the most modern approved methods. Its use will save the worker trouble in referring to journals in which scattered references are made to many of the methods included in this unique volume. It is an extremely practical and useful work.

NEW PREPARATIONS.

"MERSALV." We have received from M. Bresilhon and Co., Gamage Buildings, New South Head Road, London, a very pleasant-looking, of pleasant odour and creamy consistence, containing ten per cent. of metallic mercury. The metal is present in an exceedingly fine state of subdivision, and "Mersalv," on account of its cleanly appearance, should popularise the method of mercurial treatment by injection, by means of which it is well known that patients can be brought rapidly under the influence of the drug. No irritation of the skin is said to follow its use, and no underclothing. One drachm is rubbed in lightly at bed-time until the skin is dry. "Mersalv" is supplied in white ceramic pots, holding sufficient for 15 and 30 days' treatment, at 4s. 6d. and 7s. 6d. per pot. "URASEPTINE." From the same firm comes also a specimen of a granulated product, soluble in water, known as "Uraseptine." As its name implies, it is a urinary anti-septic, being composed of piperazine, uretrone, hemilol, and the benzoates of sodium and lithium, containing 50 c.c.m. of active matter to each teaspoonful. It is also a solvent of uric acid and phosphates, as well as being a mild, non-toxic diuretic. "Uraseptine" is therefore indicated in all cases where a sedative and diuretic action is needed upon the urinary tract, while it is also of use for the rapid elimination of uric acid and urates. The dose is two to six teaspoonfuls daily. "IDEOIOL" AND "IODARGOL." From Messrs. E. Viol et Cle., 118-112 Holborn, E.C., come specimens of two new colloidal preparations of iodine prepared by electro-chemical action. "Ideoil" is colloidal iodine the particles of which are kept soluble by means of a neutral electrolytic cell. This form iodine possesses a high degree of anti-toxic and bactericidal action, and it has a powerful action on the phenomena of leukocytosis and the production of anti-bodics. Hence it has been used with success in the treatment of pulmonary anf other forms of tuberculosis by intra-muscular injection of 1 c.c., equal to 0.2 grn. of colloidal iodine. It may also be administered internally in gelatin capsules containing 0.25 c.c. in cases of acute pulmonary infective processes. "Ideoil" may be applied externally, and it is ten times more active than tincture of iodine. "Iodargol" is pure colloidal iodide, identical with "Ideoil," only differing from it in that each ampoule contains 0.4 grn. of electro-chemical colloidal iodine. Its bactericidal and non-antiseptic properties are specially indicated in gonorrhoeal urethritis, in which disease injections of 1 c.c. are given with a bulb-action syringe into the urethra and retained for ten minutes. It is claimed that by this means the acute stage is much diminished in length and intensity.
The Irish Association of Women Graduates.

THE MEDICAL PRESS.
MEDICAL NEWS AND PASS LISTS.
November 11th, 1944.

The Irish Association of Women Graduates,

At the annual general meeting of the Association,

held in Dublin on the 30th ult., under the presidency of
Professor Hayden, M.A., Dr. Kathleen Lynn made a report of the
appointment of Miss Howley, M.A., as assistant director in the
staffs of general hospitals. A discussion followed, and
the matter was referred to the General Council of
Medical Women. The meeting passed a vote of
sympathy with Dr. Elizabeth Mahony, for the death
of her father, who was killed in action, and with Miss Hanan
on the death of her mother.

A Salford Citizen’s Bequests to Hospitals.

Under the will of the late Mr. Jas. Grimble Groves, of
Springbank, Pendleton, Salford, formerly Unionist M.P. for South Salford, the Salford Royal Hospital
receives £4,000 for the endowment of a bed, and the
Pendlebury Hospital (October 15th) for the endowment of a cot, both to be named after the testator.
The Altrincham Provident Hospital and Dispensary
also receives £1,000 for the maintenance of the "Colin Cot"
provided by him some time ago.

The Royal Colleges of Physicians of London and Surgeons of Ireland.

Have decided to adopt the following temporary
regulations during the war—

(a) That time spent as assistant on active service in one
hospital, or a hospital of the naval or military
hospital, or any hospital utilised by the naval and
military authorities, not exceeding six months, be
allowed to count for the equivalent period of medical
and surgical hospital practice, and for the duration of the
appointed period of medical clinical
clinic and surgical dressership, provided that a
satisfactory certificate is produced from the principal
medical officer under whom the assistant serves.

(b) That medical clinical dresserships served before the Second Examination in Anatomy and Physiology has been passed be
recognised.

Army Medical Service.

Superintendent, Surg.-Genl. Sir D. Bruce, Kt., C.B.,
F.R.S., M.B., F.R.C.P., is restored to estab. (November
11th).

The following appointments have been gazetted—
To be Temporary Colonels.—Lit.-Col. Sir W. P.
Herringham, M.D., 1st London (City of London)
General Hospital, R.A.M.C., T.F.; Sir Almroth E.
Wright, M.B., 1st London General Hospital, R.A.M.C., T.F.;
Major Sir J. R. Bradford, K.C.M.G., M.D., 3rd London General
Hospital, R.A.M.C., T.F. (October 11th); W. N.
Barron, M.V.O., to be temporary Lt.-Col. (October
11th).

The following are granted temporary hon. rank of
Licut.-Col.—Maj. H. R. Kenwood, M.B., R.A.M.C.,
Lt.-Col. J. Robertson, M.D., Lieut. J. R. Mill, M.B.,
from Res. of Off., to be Lieut. (October 10th). To be
temporary Lieutenants—C. G. Colyer, H. C. Colyer, S. A.
Ridett, C. Weller, F. W. Broderick, G. G. Thompson
(November 11th). The following are granted temporary
rank as follows, while on active service in the Red Cross
Hospitals, Netley.—Temporary Majors—C. H. Miller,
C. Wallace (October 27th). Temporary Captains—
C. S. Christopherson, L. J. Dickie, M.B., M. J. Haward,
M.D., C. Hitch, H. L. Tidy, M.D., A. C. Hough
(October 27th). Temporary Lieutenants—S. Esler, J. G.
Ferguson, M.D., C. Gibson, M.B.,
J. D. Lyle, M.B., J. F. Mackay, M.D., L. C.
Norbury, C. Pearson, M.D. (October 27th).
Temporary Quartermaster and Hon. Lieut.—A. Buckley
(October 27th).

Captains to Majors.—J. G. Bell, M.R.C.S., F. W.
Dawson, M.B., J. E. H. Gatt, M.D., T. E. Coates,
M.B., D. G. Carmichael, M.B.,
J. A. W. Milroy, M.B., A. L. W. Lawrence, R. C. Wilmot,
H. B. Kelly, M.B., E. M. Pennefather, B. H. V. Dunbar,
M.D., D. Ahern, D. G. Carmichael, M.D., J. M. M.
Crawford, T. F. Harty, J. H. Daguid, M.B., G. G.
Patch, G. W. Hughes (October 27th).

To be Temporary Lieut.—(October 27th)—W. P.
Morgan, M.B. (September 23rd); D. G.
Chyne, M.D. (October 8th); F. F. Brown, M.B., T.
R. Grode, J. A. Torres, M.B., T. A. Peel, M.B.,
E. A. Pearson, M.B., W. V. Wodarksy, M.D.,
W. Murray, M.B., W. Magill, M.B., M. R. Acckow,
(March 10th); R. Mackay, M.B. (October
4th); J. E. Cox, H. T. Retallack-Moloney, A. F.
Palmier, P. J. Chiswell, C. H. Treadgold, M.D. (October
4th); C. Kingsley, M.B. (October
6th); A. H. Brown, M.D., J. H. Campain, M.B., G. Cock,
V. L. Conolly, M.B., D. H. Collingham, W. J.
Dyer, S. W. Gibson, J. C. B. Grant, M.B., F.R.C.S.
Mclnn, A. K. Hamilton, M.B., J. C. Connolly,
C. B. Hermonard, M.B., A. J. Thomas, T. E.
C. G. H. Moore, M.B., A. G. Miller, M.B., A. J.
McC. Morrison, M.B., A. T. McWhirter, M.B., F. G.
Rice, M.B., C. J. Blake, J. W. Wilson, M.D.,
P. C. Rainton, J. T. W. Stewart, M.B., A.
Stephen, M.B., G. W. Twigg, M.D., R. J. T. Thornell,
M.B., C. H. Thompson, H. A. Treadgold, M.D.,
G. H. Urquhart, F.R.C.S.Edin., A. W. Weston, M.B.,
W. M. Walsh, R. Williams, W. S.
Milne, M.B. (October 28th).

The following have been appointed temporary
Lieutenants.—A. Stokes, M.D., F.R.C.S.I. (August
4th); J. E. Channing-Pearce, M.B., R. H.
Hewat, M.B. (October 9th); R. H. Spittal, M.B., H.
Powell, E. A. Walker, M.D., T. S. Wright, M.B.,
E. White, M.B., E. C. Ginson, M.B., W. E. Waillis,
M.B., W. W. Forbes, R. Keily, M.B., F. E.
Daunt, M.B., J. S. Stephen, M.D., P. A. Opie,
C. G. C. Timins, G. A. C. Mitchell, M.B., E.
Grey, M.B., J. Fleming, M.B., G. S. Woodman,
M.B., C. H. Robinson, M.B., J. P. Davidson,
M.B., W. F. McWhirter, G. O’Reilly, M.B.,
M. Scott, M.B., J. W. McLeod, M.B., B. McC.
Smith, M.B., L. Anderson, M.B., M. Bates, M.B.,
Robert., M.B., D. O. Logie, M.B., W.
Sinden, M.B., W. P. H. Munden, M.D., J. Fraser,
K. G. Fraser, J. S. Levis, M.B., D. R. Mitchell,
M.B., D. J. Stokes, M.B., C. M. Smith, M.B., J. H.
Scott, M.B., F. J. Wysely, M.B., H. McAlmon,
M.B., M. C. MacIntosh, W. S. Torrens,
P. K. Murphy, M.B., A. Wilson, M.B., M. K.
Acheson, M.D., R. W. Gemmell, M.B., A.
Anderson, M.B., C. K. Grange Dieck, W. G. Gordon,
M.B., J. E. Stacey, M.B., J. V. O. Andrew, J. Spence,
J. P. Cahir, M.B., E. F. C. Dowling, T. P. Cole,
M.B., J. Parkinson, M.D., J. H. McNicol, M.B., R.
Wooster, W. MacKenzie, M.B., C. M. Foster, E. W.
Almont, C. R. Taylor, M.B., D. W. Hunter, M.B.,
M.D., J. W. Flood, R. F. Emerson, M.B., W. E.
Hokin, M.B., R. R. Wallace, M.B., W. B. Watson,
M.B., J. Caill, S. Jackson, M.B., J. A. Glover,
M.D., N. Reader, M.B., S. Fenwick,
W. A. Feoktistsky, M.B., W. V. Macaskie, M.B.,
J. G. Copland, M.B., J. M. Forsyth,
M. J. H. Connolly M.D., F.R.C.S., J. P. Egan,
C. Jackson, M.B., C. Elliott, A. E. Drynan,
M.B., W. V. Willis-Joad, A. S. K. Anderson, M.B.,
J. W. Brown, D. S. Harvey, M.B., E. F. G.
T. Heap, G. Millar, M.B., K. W. Mackenzie, M.B.,
(October 11th); F. W. McMillan, M.B. (October
11th).

The following have been granted temporary
rank as follows, while serving in the Welsh Hospital:
—
Temporary Lieutenants—F. Armstrong, M.D.,
F.R.C.S., T. G. Evans, M.B., B. G. Klein,
J. S. Rowlands, M.D. (October 26th).

MEDICAL WAR ITEMS.

Vicissitudes of the War.

A Lieutenant in the R.A.M.C. writes in the Times.—There was a good deal of action with
the Germans, and it was with one of our field
companies which was fortifying positions. As
we went along I stopped to dress some wounded
and an officer came up and told me there were
four of our wounded in a small wood. I rode
back to see if I could do anything for them. As
I went on I saw some troops about two yards off, and,
not being sure if they were ours or Germans, turned off
wooded roads on the left. They then began to fire on

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me, so I lay flat on my horse and stuck my spurs in, and we galloped off, hearing their bullets whiz above and below us and all round, but fortunately neither my horse nor I was hit. I then was going back to our troops when I met another officer of ours coming along with an ambulance wagon. He had been ordered to go back, and I could not very well let him go alone, so I turned again with him, hoping we might manage to evade the Germans. We walked right into some of their infantry, however, and were made prisoners. They treated us quite well and bagged most of our kit, and cut our swords, revolvers, and horses. Next day they sent us to a place where they had a field hospital, and 97 of our wounded and some prisoners. We were joined by two other R.A.M.C. officers who had also been captured, so the four of us got to work our own people, and there was lots to be done and not enough dressings and food. The Germans had about 200 of their own wounded. They said they were going to take us to Berlin and keep us there till the end of the war, but the French came along and drove them away and we were free. Arrangements were made to send back our wounded with two of our officers, and Lieutenant and I bagged two German horses and rode for two days through to one of our own rear hospitals, which we reached in due course. They were quite respectable to us and our prisoners and wounded in that memorable 10 days.

Sir Henry Norman, M.P., and Lady Norman, with Major H. M. W. Gray, F.R.C.S., Lieutenant-Colonel A. H. Lister, M.D., and Dr. A. H. Rabaghiati, F.R.C.S., have left for France with a hospital under the British Red Cross Society and St. John Ambulance, and will be away for some time.

University College Hospital, as a section of Queen Alexandra's Military Hospital, provides 100 beds for sick and wounded soldiers. All the vacant beds are occupied by patients drafted during the past week from the base hospitals in France. A large number of regiments are represented, and there are in addition about 20 Belgians. Games and packs of cards for the amusement of the convalescents will be very acceptable.

Lady Muir Mackenzie, writing on behalf of the Women's Imperial Service League, conveys the committee's most grateful thanks to Messrs. Wright, Layman and Umney, Ltd., drug and chemical manufacturers, for the gift of one hundred one-pound bottles of chloroform and a large quantity of Wright's coal-tar soap, both of which, they say, are presented for use in the League's newly-established hospital for wounded in France.

An officer of the Royal Army Medical Corps who was present at the battle of Mons contributes his experiences to the Glasgow Herald as follows:

"We have two motor ambulances attached to us. They came but recently, but they are what we want. They make all the difference, and two motor ambulances can do as much work more efficiently and more comfortably than a whole army corps of cavalry field ambulances. I expect our unit will be reorganised, and these ambulances will play an important part. The wounded we get are mostly suffering from shell wounds, mostly from big guns, for this is a war of big guns and artillery, and, believe me, the German artillery are good—very good—I know. These wounds are very deep, and we have to deal with tetanus, and some have anti-tetanic toxin now, and we believe this will reduce tetanus to a minimum. Some of the wounded are very bad, but this is of course to be expected. Don't believe all the yarns you hear about German brutalities. But it is true when their men get drink and are away from their officers they are like fiends. I myself dressed a baby thrown on the fire by a German and looked after him till we got him to the hospital and supplied their demands, and another wee boy with a bayonet wound through his leg for the same reason. These are true; but I think there are some brutes in every army, who without control and with drink are equal to any brutality."

"On the other hand, the fighting Germans have resorted to every mean dodge they could. They took our fellows out of our trenches by raising the white flag and then fired on them. To this I can swear. Again, under the Red Cross they brought up an attacking party. Now we have orders to fire on every German that shows himself. And they have always fired on the Red Cross. The cold weather has now come upon us; the rain and the damp are with us every day; but, thank God, the clothes made by the good women in England have come out, and distributed amongst the men to keep them dry and warm."

Eaton Hall, near Chester, one of the most notable mansions in the country, has been handed over by the Duke of Westminster to the Army authorities for use as a hospital for wounded soldiers.

Several wounded officers and men have already been sent from the military hospitals to Bath for treatment by the mineral waters, and one at least has sufficiently recovered to return to the front. The offer of the Bath Corporation to give officers and men invalided home from the front free treatment at the hot mineral springs was accepted by the authorities and communicated by the Army Medical Service to the various military hospitals. Bath has also taken 50 wounded soldiers and a number of refugees.

The War Office has accepted the offer of Ulster Volunteer Force Medical Board of a hospital with 100 beds for wounded soldiers.

McGill University, Montreal, has contributed a battalion to the war contingents then training in the Province of Quebec. It is reported that a number of professors are serving as privates, including Dr. J. G. Adami, the well-known authority on tuberculosis.

A military hospital in connection with the Cambridge Hospital at Aldershot has been established at Turley Hall, Bath, and Wiltshire, and the hospital accommodation, of which the best part has been arranged for 45 patients and the staff of voluntary workers, and has now its full complement of cases, which consist of sick and wounded from the front, both British and Belgian.

NOTICES TO CORRESPONDENTS, &c.

Correspondents requiring a reply in this column are particularly requested to make use of a Distinctive Signature or Initial, in order to identify the writer and enable the Editor to arrange for prompt and personal replies. The "Reader," "Subscriber," "Old Subscriber," etc., Much confusion will be spared by attention to this rule.

Subscriptions may commence at any date, but the two volumes each year begin on January 1st and July 1st respectively. Terms per annum, 2½; post free at home or abroad. Foreign subscribers must be addressed in advance. Post-office, Messrs. Thacker, Spink and Co., of Calcutta, are our officially-appointed agents. Indian subscriptions are Rs. 15.15. Messrs. Dawson and Sons are our special agents for Canada. For South Africa, The Record Publishing Co., Cape Town, Messrs. Geor. Robertson and Sons, of Sydney and Melbourne, are our special agents for Australia.

ADVERTISEMENTS.

For One Insertion:—Whole Page, £3; Half Page, £2 10s.; Quarter Page, £1 5s.; One-eighth, 12s. 6d.

The following reductions are made for a series:—Whole Page, 35s. 6d. per insert; Half Page, 25s. 6d., 20s. 6d.; Quarter Page, 16s. 6d., 12s. 6d., 10s. 6d.; One-eighth, 9s. 6d., 8s. 6d., 7s. 9d., 6s. 6d. per line beyond.

Forwards,—Advertisements appearing in this Journal can be had at a reduced rate, providing authors give notice to the publisher or printer before the type has been distributed. This should be done when return proofs are forwarded.

Contributions are kindly requested to send their communications, if resident in England or the Colonies, to the Editor at the London office, 8, Henrietta Street, Strand; if resident in Ireland to the Dublin office; in order to save time in forwarding to the place of publication. In sending sub-

original articles or letters intended for publication should be written on one side of the paper only and must be
The BMJ 1914, November 11

Appointments

Barnes, H. W., M.C., Consultant, L.R.C.P. Lond. M.C.S., D.P.H., Acting Medical Officer of Health and School Medical Officer for Luton.
Muir, G. T. W., F.R.C.S. Edin., L.R.C.P. Edin., L.F.P.R.Glas., Second Assistant Medical Officer at the Surrey County Asylum, Netherton.
Paterson, Miss M. R., M.C.S., L.R.C.P., Resident House Physician at the Royal Free Hospital.
Powell, Miss M., M.C.S., L.R.C.P. Lond., Resident House Physician at the Royal Free Hospital.
Smith, W. M., M.A., M.D.Edin., M.R.C.P.Edin., Medical Superintendent to the West End Almshouse and Walsall Union.
Vinter, C. H. S., M.C.S., L.R.C.P. Lond., Certifying Surgeon under the Factory and Workshop Acts for the Framlingham District.
West, T. Reddick, M.B., B.S.R.U., Assistant School Medical Officer and Assistant Medical Officer of Health of Norwich.

Deaths

Akin—On November 1st, at Cheshworth, Groce Park Road, Westminster, Mrs. Henry Atkins, 63 years.
Bell—On November 7th, at Hove, Miss Ida Mary Josephine Bell, M.D., eldest daughter of W. Bell, of St. John's Wood, London, aged 34.
Dayson—On November 6th, at St. George's Hospital, Frederick Ada-dayson, M.D., F.P.S., late of Montpelier, Margate, aged 74.
Ferry—On November 1st, at his residence, No. 4 Pembroke Villas, The Green, Richmond, Surrey, William Ferrie, 91 years.
Gavin—On November 7th, at 44 Warrington Crescent, W. Kneen, late of 28, Prichard Square, Hackney, aged 95.
Hill—On October 29th, at 61 Shrewsbury Road, Birkenhead, Mr. Thomas Hill, aged 76.
McKee—On November 9th, at 19 Upper Berkeley Street, Portman Square, W., Dr. Charles Barrell Lockwood, F.R.C.S., aged 58.
Michie—On November 4th, at 15 Pegwell Place, W., the Hon. Ewen Michie, aged 56.
Muir—On November 9th, at 23 Broadway Street, Stourbridge, R. Muir, aged 65.
Reece—On November 5th, at 52 Caledon Road, Earl's Court, J. R. Reece, Surgeon-Major-General, K.C.B., K.H.A.
Springett—On November 4th, at L'Isle, near Doullens, Captain Richard Springett, R.A.M.C., aged 42.
It is difficult for medical men in the United Kingdom to realise, even the Medical Relief Committee.

Imagine London a mass of ruins, its population fled, its streets in the possession of a brutal and relentless soldiery. Imagine the towns and villages of the neighboring countries similarly desolate, with the countryside around a howling waste of burnt homesteads and harried crops. Amid such an environment the medical practitioner would find himself without home, without patients, without money and happily without food or the bare necessities of life for himself and his family. It is to be feared that the picture thus conjured up represents with tolerable accuracy the plight of the Belgian medical man who has not been lucky enough to escape to England or to some other friendly country. Some of them are at this very moment utterly destitute and dependent upon British hospitality for support. There is urgent need then of relief not only of present wants but of future needs, and it is abundantly clear that a large sum will be wanted for the purpose. The original appeal of Professor Jacobs, of Brussels, published in the Medical Press and Circular of November 4th, has not appeared so far in the other leading British medical journals, but a Relief Committee was formed a few days after the appearance of the letter in question. From certain brief statements since issued it seems that the Committee recognised the extreme difficulty of raising funds for any particular purpose at the present juncture. In a matter of such extreme urgency a generalisation of that kind hardly suggests the strong determination and zeal required to carry their purpose to a successful issue.

It is interesting, therefore, to learn the composition of the Committee, so far as may be gathered from a short notice in the British Medical Journal of November 14th instant, of the first meeting. The chair was taken by Sir Rickman Godlee, and those present were—Sir Thomas Barlow, Sir Watson Cheyne, Dr. Meredith Townsend, Dr. Frederick Taylor, Mr. E. T. Nethercoat (president of the Royal Pharmaceutical Society), Dr. des Voeux (treasurer), Dr. Squire Sprigg (secretary). To this list we presume the name of Dr. Dawson Williams should be added as convening the meeting. The composition of the Committee is strong, so far as it goes, but it can hardly in any sense be regarded as representative of the medical profession of the United Kingdom. The two London colleges and two London medical journals, for example, are not qualified to speak for the main body of Irish and Scottish practitioners, nor for the University graduates scattered throughout the kingdom. In a self-appointed body of this kind one would have expected the University of London to have been represented. However, the Committee has power to add to its numbers, so that any little weakness in its composition can be remedied later. Meanwhile, the Medical Press and Circular has expressed its cordial sympathy with the objects of the Committee, and has appealed to its Irish supporters for help in their laudable endeavours. It remains to be seen whether the medical profession in this country, whose resources and income have been already taxed in others ways during the present war, will find themselves able to respond to that appeal.

An Alternative Government Loan.

Should the requisite funds not be forthcoming it certainly will not be due to any lack of energy on the part of the Committee. The letter of appeal from Dr. Macnaughton-Jones with the statement of Professor Jacobs reached us a day or two before it was published in our issue of November 14th.

A letter was sent at the same time to the British Medical Journal and the Lancet, and so rapid was the subsequent action that the Committee, we are told, was appointed on November 4th. Indeed, the invitation to Dr. Macnaughton-Jones did not reach him in time for acceptance, and neither he nor Professor Jacobs was present. It has since been announced on the authority of The Lancet that the work has been taken in hand strenuously. The effort to help our Belgian fellow medical men in the evil days that have fallen upon them should commend itself to every medical man of the United Kingdom. Failing private philanthropy the duty, in our opinion, should fall upon Parliament. As pointed out in our last issue the financial burdens of Belgium must in the long run be borne by our countrymen, who will regard that help as a small part of the obligation due to our gallant ally. As a part of this necessary expenditure it would be difficult to imagine a wiser or a more productive outlay than that which would preserve and restore the medical service of Belgium, apart from the pure philanthropy of such an act. With these facts in view, we therefore urge upon Mr. Asquith's Government the supreme urgency of a grant to the Belgian medical men and pharmacists. Such a grant would not fall within the category of ordinary expenditure, for it would be regarded by the recipients as a debt of honour. Possibly the Chancellor of the Exchequer may find time amid his multifarious duties to issue a loan at moderate interest repaid after a given lapse of time by the medical men concerned. By this means not only would a grateful
act of international generosity be achieved, but the Belgian population would be saved from the dire disaster of being deprived of their national medical service for some time to come.

We are glad to say that in answer to our appeal several subscriptions of the "M.P. and C." again our Dublin offices. We hope next week to acknowledge these and others in a good cause. The matter has been taken up by Ireland, and a circular letter to the medical profession, calling a meeting at 5 p.m., on November 27th at the Royal College of Physicians, Dublin, has been issued by the President of the Irish Royal Colleges of Physicians and of Surgeons respectively. It may be as well to take this opportunity to repeat, in order that there may be no possible misunderstandings, that the position of the Medical Press and Circular in this matter is merely that of a sympathetic helper of (to give its full title) the "Committee to Assist the Belgian Medical Practitioners and Pharmacists." The only reservation we make is that in the event of the original committee failing to amass sufficient funds, it shall be open to our subscribers, but nominate an independent representative body. There is little need for any such saving clause, however, when one sees the list of six Presidents, one Belgian Professor and the name of Dr. Squire Sprigge in the list published in the British Medical Journal of November 11th. We have already hinted that in our opinion the composition of the Committee in Ireland is broader and more comprehensive basis. That opinion, however, has not for a moment prevented us offering voluntarily our hearty co-operation in so praiseworthy an object. As it turns out, the fact of our journal not being invited to serve on the Committee is explained by the simple fact, which we have on unimpeachable authority, that both Dr. Dixon Williams and Dr. Squire Sprigge were elected on the Committee not in their editorial capacity, but alternatively as members of the medical profession.

On the whole there has been a fairly favourable verdict on the feeding of our troops in France and Belgium. The recent news, some have been repeatedly informed by newspaper correspondents, have expressed both surprise and admiration at the perfection of our food commissariat. There seems little doubt, indeed, that we may flatter ourselves on having beaten records in the quality and quantity of the food provided by our War Office to Mr. Thomas Atkins in the trenches as well as over the wider area commonly spoken of as "the seat of war." At the same time there is room for improvement in the variety of the provisions contracted for by an unimaginative War Office. What about the good red herring—a fish that is toothsome, can be cooked in a trice, is nourishing in the highest degree, keeps sweet on the way and, together, is altogether about the most economical and attractive of British foodstuffs? Why should not our troops be supplied with many tons of cured herring, which would make a most welcome change to the lenten fare, of which "hully" beef forms an outstanding item? Now is the time for action, for the Government, who has been the large stock of fish now thrown upon the hands of the curers would probably save one of our most useful industries, and at the same time rescue a large body of workers from otherwise inevitable distress. Last week it was announced that several of the neutral countries that have hitherto been large consumers of British herring would be cut off by certain war restrictions imposed upon maritime trade. If the price of herring is reduced it is not unlikely that the whole supply might be taken readily by our own population, apart from any possible demand on the part of the Army authorities.

LEADING ARTICLES.

The Medical Once again the casualties among the Royal Army Medical Corps and Roll of Honour. Services have been considerable. Officers reported killed:—Capt. E. M. Glenville, R.A.M.C., Capt. M. Flood, M.B. (London, Scottish); Capt. C. P. O'Brien-Butler, R.A.M.C., and Capt. T. McC, Phillips, R.A.M.C., have died of wounds. The death is also announced of Surgeon F. J. Bernard, 2nd class Assistant-Surgeon, Indian Subordinate Medical Department. The following medical officers were serving on board H.M. ships Good Hope and Monmouth, the loss of which the Secretary of the Admiralty announces must be presumed:—Fleet-Surgeon James J. Walsh, Surgeons Francis C. Searle and F. L. J. M. de Vertueil (Good Hope); Staff-Surgeon Henry Woods and Surgeon Albert J. Tomkinson (Monmouth), Officers wounded:—Capt. H. S. Dickson, R.A.M.C.; Major F. S. Irvine, R.A.M.C.; Lieut. G. E. Greiswood, I.M.S., and Lieut. J. A. O'Driscoll, R.A.M.C., and Lieut. L. R. Shore, R.A.M.C., Capt. A. C. Osburn, R.A.M.C., 4th Dragoon Guards, has been admitted to the Royal Victoria Hospital, Netley, from Belgium. Officers wounded and missing:—Capt. A. A. Meaden, R.A.M.C., and Capt. A. M. Rose, R.A.M.C. Officers missing:—Lieut. J. G. Butt, M.B., R.A.M.C., Lieut. N. M. Mehta, I.M.S., Capt. A. M. Pollard, R.A.M.C., and Lieut. H. G. Winter, R.A.M.C. Capt. W. P. Croker, R.A.M.C., is unofficially reported prisoner of war. Officers previously officially reported missing, now unofficially reported prisoners of war:—Capt. R. V. Dolby, R.A.M.C., and Lieut. R. A. Flood, R.A.M.C.

LEADING ARTICLES.

VENereal DISEASE AND ITS DANGERS.

It would be difficult to imagine a more striking illustration of the marvellous strides of modern medical science than that which in the early years of the present century have marked the diagnosis and treatment of syphilis. That which has for time out of mind formed one of the most dreaded of all human maladies has at the present day been to a great extent robbed of its terrors. At the same time, medical men have re-written the clinical history of syphilis in its remoter manifestation. It is appropriate that these advances should be associated with a wider appreciation on the part of the public of the precise conditions attending the incidence, the course, the prevention, and the cure of venereal diseases. An important step in that direction has been taken by the appointment of a Royal Commission upon the subject. The task of educating the public at all adequately in such matters, however, is not a little difficult and delicate. It is accompanied in the mind of the laity with various deeply-rooted prejudices and beliefs. For instance, the old-fashioned objection that it was morally wrong to cure, or attempt to cure, a man of venereal disease contracted by his own sexual lapses still lingers in some quarters. A variation of this penalisng stupidity is to be
found in some of the medical benefit societies, which do not give sick pay allowance or medical attendance to members suffering from venereal disease. The absurdity is self-evident of thus neglecting diseases that not only play havoc with the health of their victims, but are also highly communicable, and are actually communicated to a large number of innocent persons. It appears from a case lately brought under our notice that sick pay is refused, in some instances, at any rate, to insured persons under the National Insurance Act suffering from venereal diseases. In the instance referred to a cook suffering from tertiary syphilis was refused sick pay for several weeks, although she was out of a situation and actually short of food. The result of this shortsighted policy was that the chances of cure were greatly handicapped, in spite of the fact that a voluntary hospital was supplying the costly drug, neosalvarsan, in order to cure one of Mr. Lloyd George's insurance patients. The tragedy was heightened by the knowledge that the disease had in all probability been contracted in an innocent way, but, whatever its origin, we contend that it is the plain duty of the State in its crusade against disease to make no exception as regards venereal diseases. That attitude will doubtless be adopted by the newly-constituted National Council for Combating Venereal Disease, which was duly inaugurated last week at the Royal Society of Medicine. It is to be hoped that steps will be taken to make this body really representative of all engaged in medical practice, for it is idle at the present day to attempt to entrust matters of such national importance to the guidance of a small clique claiming a position of privilege. A good example of the broader spirit has been given by Liverpool, which has taken the subject in hand with characteristic vigour. A powerful representative committee of medical and lay members has been formed for the express object of conducting an educational campaign. Dr. W. R. Mackenna, the honorary treasurer, has asked us to draw attention to this important departure. It is significant that the two foundation meetings were presided over by the Lord Mayor and the Lady Mayoress respectively. It was determined to carry out an educational campaign by means of systematic lectures. The widespread interest excited by the movement was shown by the fact that the inaugural meeting was attended by a large number of employers of labour, business men, social workers, representatives of educational bodies, together with members of the clerical, legal and medical professions. An excellent inaugural address was given by Dr. Charles J. Macalister, chairman of the Special Committee, which we hope to have an opportunity of presenting to our readers at an early date. Amongst various points of importance he raised that of notification, which he advocated in some form that avoided identification. Liverpool has long held a foremost place in public health administration, thanks greatly to the energy and progressiveness of its Medical Officer of Health. Dr. E. W. Hope. In some points London still lags behind the provinces, not because of the inferiority of its medical officers of health, but apparently from the lack of common standards and of a common municipal purpose.

CURRENT TOPICS.

Hyoscine in the Treatment of Mental Disorders.

The public prominence recently given to scopolamine hydrobromide, or hyoscine, as a remedy for certain morbid mental states, to which reference was made in these columns a short time ago, will be acknowledged to be out of all proportion to its value as a drug. It is true that, in the hands of a skilled physician, hyoscine may prove most useful in the treatment of acute maniacal disorders, but the dangers attendant upon its haphazard administration are not inconceivable. The subject was brought up at the annual meeting of the Medical Psychological Association, held at Norwich last July, by Dr. A. W. Daniel, of the London County Asylum, Hanwell, whose valuable paper is reported in the Journal of Mental Science. When hyoscine is given in repeated doses, especially by the hypodermic method, symptoms of hyoscineism, or insensitivity to the drug are prone to appear. An intense, restless excitement, accompanied by vivid hallucinations followed by rapid emaciation, and well-marked paroxysms of certain muscles are characteristic signs of chronic poisoning, and they rapidly disappear upon the withdrawal of the drug. It may be noted that a single dose of scopolamine hydrobromide hypodermically is only contraindicated when the physical condition of the patient is markedly poor. Dr. Daniel finds that weak-minded epileptics appear to have a peculiar idiosyncrasy for the drug. The best test for any ill-effects accruing from the administration of hyoscine is the weighing machine. Provided the doses are not repeated indefinitely there will still be a field of usefulness for this potent drug in cases of acute excitement in powerfully built subjects.

From the West.

A simple and touching obituary paragraph appears in the Boston Medical and Surgical Journal for October 29th. There are only a few lines, but their unstudied pathos makes us pause. We read "Reported to us by a noble friend on the 16th that on Oct. 16th a mouse died in that city from bubonic plague. This is said to be the first instance in the United States where a mouse has been found infected with this disease. And not a word more. It is hard on us. There are so many things we should like to know. At the first blush the beneficent care of the Government seems beyond belief. We think of a State chairman for the minor mures with satellite surgeons and parasitic physicians lovingly guarding the sleek cow'rin thin'ous beasts lest a hair of their thready tails fall to the ground unnoticed. We think of a Rodent Registrar who records their births, their deaths, and keeps some track of their fertile amours. We think of a Publicity Department for the Animals and of an enlightened Press—A Press more humane, more far-seeing than ours, that thinks the trials and triumphs of our lesser brethren in creation not altogether unworthy of its space. We think—and then we stop. We wake up and pull our selves together and see what manner of thing this really is. The philologic motive disappears. The paragraph is not really about its subject. The mouse
whose schemes have gone agley is once more subordinate to the man. He is only an incident in a sanitary campaign. We have had this fight against bubonic plague in England. It was responsible for much redoubt mortally, for the fastening of plaques on the houses of our streets, and for the invention of the blessed word “de-rationization.” The appearance of most things depends on the point of view. Looking with the pragmatic eye of the pathologist we would have seen in the paragraph nothing but a fact more or less interesting according to our lack of acquaintance with its subject. But to the plain man—the running reader of the misquotations—we suggest a match, match, and discs on column—if there be one—of the Zoophilist. And the moral of that is that we must be careful how we express ourselves.

The Legal Position of the Medical Assessor.

The question as to the legality of a single medical man acting both as Medical Referee and as Medical Assessor under the Workmen’s Compensation Act was raised last week at Stratford. Counsel for the applicant, before the case opened, asked Judge Smyly, K.C., to adjourn the case on the ground that a new Medical Assessor must be appointed instead of Dr. Kenneth Godfrey, the one sitting, as that gentleman had already acted as Medical Referee, and granted a certificate. He had already prejudged the case, and ought not to sit that day. To the layman innocent of the subtleties of British law there is something convincing in the mere statement of this contention. How can a man who has already certified, as in this case that the applicant had recovered from lead-poisoning, be expected later to sit in judgment against himself? It reminds one irresistibly of the Lord Chief Justice of Gibert’s comic opera “Milardo,” who associated in his own person a large number of other positions, such as those of Lord High Treasurer, Chancellor of the Exchequer, Public Prosecutor, Attorney-General, and so on. His Honour declined to adjourn the case, whereupon Mr. Ward reiterated his view that it was a matter of great public importance if the gentleman sitting to advise the Court had already expressed a definite personal opinion upon the matter. His Honour replied that Dr. Godfrey had been appointed because of his great knowledge to assist the Court in these matters. In one recent case Dr. Godfrey did not sit as Medical Assessor because he (the judge) pointed out that he had already examined the applicant on behalf of his employers. That was a different case, however, from the one under consideration. Under these circumstances, applicant acting on the advice of counsel, declined to appear before the tribunal (Bow County Court), and his Honour said he supposed the case would go to the Court of Appeal, and if necessary he would give leave for it. The issue thus raised appears to involve a principle of considerable importance, extending far beyond the confines of the Workmen’s Compensation Act.

Fatalities from Amylne Hydrate.

Among the hypnotics whose action is generally held to be reasonably safe and certain, dimethyl-carbinal, commonly known as amylnne hydrate, has been rightly regarded as a favourite. Occupying a position midway between chloral and paraldehyde, amylnne hydrate, in doses of thirty to forty minutes—according to the “Pharmacopoeia Helvetica,” 4th edition, 1907—is frequently administered for its sedative effects, especially in hospital and asylum practice. Unfortunately an overdose of this drug was responsible for the deaths of eleven persons who had been given in the Bethlehem Royal Hospital. In the medical evidence at the inquest held last week by the Southwark Coroner it was stated that one of the medical officers made up a draught of amylnne hydrate out of a certain bottle which was supposed to contain the drug, the dilution instead of the concentraion determined in the sample label. The actual strength of the bottle was not stated in the negotiations, but all the eleven patients were taken ill and, in spite of treatment, a fatal result occurred in five cases. A verdict of death from misadventure was returned by the jury, who recommended that in future such drugs should be kept in receptacles easily distinguishable from their ordinary label. For such lamentable accidents could be entirely prevented by adopting distinctive poison-bottles for dangerous drugs. Another point stands out prominently in the case—namely, the improbability of regarding any hypnotic as absolutely safe, though, so far as we know, no deaths from amylnne hydrate have previously been reported.

Change the Name.

As is usual in a crisis we have suddenly awoken to the importance of names. A few months ago we, with the poet, invited all and sundry to call us “any old name, it’s all the same,” but now in spite of Bacon’s dictum about the constancy of the odorous qualities of a man’s smell we see that names matter. Some people have been forbidden to change their names; unpopular Mr. Schneider can never—at any rate till the war is over—he known as Gordon or Tolemache or in any other way which his taste for euphony or self-preservation might suggest. Drugs too are in rather a state of chaos. What has happened to some of the most reputable quacks has introduced a new remedy with patent name and potent advertising. Other firms copy the product and try to supplant the original with their own preparation which has its own patent name. Just now a great deal of table turning is going on and we are swamped with substitutes for many of the older home products. It is usual for manufacturers to publish a statement in all the weekly newspapers that their products are, or perhaps, made in Germany, and others might be. Of course, the question of trading with aliens crops up, but not as often as we are led to suppose. In many cases the original producer is hardly dealt with. He has gone to the trouble and expense of introducing a good product and advertising it, and when we recommend what we want for other purposes we seem to be sure of getting it. Just now some firms seem rather keen on reaping the benefit of other people’s publicity by labelling their products “the same as—” or “chemically identical with so and so.” We should not let this substitution idea run away with us. Products may be absolutely identical, but the years on their own merits deserve success, first, perhaps, in common with their competitors, for selling a good article and, secondly, for their enterprise in introducing it to the public.

Billeting and Sanitation.

That the sudden incoming of a large body of troops must frequently strain the hospital resources is a distinction known to even the medical officers of health. The members of the sanitary service of this country have already been circularised by the authorities with regard to the necessity of co-operation with the military staff in matters affecting the health of troops. The Local Government Board for Scotland has recently forwarded for the information of the Local Authority the directions issued by the Army Council to Home Command respecting
the assistance which the former can give in connection with the sanitary condition of military quarters. It is obvious that the civil and military authorities should work in the closest possible co-operation in preventing the spread of infectious disease. The duties and responsibilities of the Medical Officer of Health of a district in which troops are billeted must be considerably increased at the present time. Not only is he expected to inspect billets and camps systematically, but he is also required to bring to the notice of Local Authorities any conditions in which they can render useful service to the military population, such as by the extension of water mains, the opening or extending of sewers, the provision of latrines, baths, the disinfection of clothing, the destruction of refuse, and so on. In connection with the extra work that must inevitably be imposed upon the Medical Officer of Health under these conditions, it is to be hoped that the question of remuneration for these special services will not be overlooked by the War Office.

The National Council for Combating Venereal Diseases.

It was a happy thought which inspired the promoters of the National Council for Combating Venereal Diseases to hold the inaugural meeting at the present time. Accordingly, a large and sympathetic audience assembled last Wednesday at the house of the Royal Society of Medicine under the presidency of Sir Thomas Barlow, K.C.V.O., to hear the aims and objects of the movement explained. The right note was touched when it was pointed out that Lord Kitchener himself approved of the work which the National Council proposes to do, and we understand he has given his sanction for the education of the army in sexual matters by qualified experts. The chief object of the Council is to teach the public by providing 'accurate and enlightening information' as to the prevalence of venereal disease and as to the necessity for early treatment. Greater facilities for the treatment of such affections are badly needed, and there can be no doubt that a wider knowledge of the physiological laws of life would tend towards a better standard of health and conduct. The Council proposes to issue a series of books of helpful and useful character, and seeks the approval and support and also to give advice when desired. A Provisional Executive Committee of the Council has been constituted as follows:—Sir Clifford Alburt, Sir Thomas Barlow, Sir Francis Champneys, Sir Watson Cheyne, Mr. W. A. Cote, Major Leonard Darwin, Colonel T. W. Gibbard, Sir Richard Godlee, Mrs. James-Gow, the Right Hon. Lord George Hamilton, Lady Laura Ridding, the Lord Bishop of Southwark, Mr. Charters Symonds, Dr. Frederick Taylor, Mrs. Torrey, and Dr. Helen Wilson. The honorary secretaries of the National Council are Dr. Douglas White and Miss Savage. The new movement may be welcomed by all who have the highest interests of the nation at heart.

The Death of Lord Roberts.

The sudden death of Field-Marshal Lord Roberts at the front adds another striking dramatic feature to the great war. The famous soldier spent some forty of the earlier years of his life in India, a fact that disposes of any belief that the climate of that country can be essentially unhealthy. At any rate in his 82nd year our great veteran, with characteristic energy, journeyed to France and went to the battle line in order to visit and inspect the Indian troops whom he knew so well. Following a tour of inspection on Friday last a chill set in and he succumbed on Saturday within a few hours to an attack of inflammation of the lungs. The cold weather that set in during the week doubtless acted as a predisposing cause, and was materially aided by the fatigue of prolonged journeying and exertion. The loss is irreparable of so distinguished a soldier, one who united bravery in the highest form with unassuming kindness and humanity. In some ways it seems a fitting end that he should die at the post of duty. To the world he was a great and heroic warrior to the soldier, "Lord Bob's."

PERSONAL.

H.R.H. Princess Christian, with the Marchioness of Llandough and Sir Arthur May, Director-General of Naval Hospitals, last week visited the new hospital for sailors at Queenstown, the gift of an anonymous donor, which has been named Queen Mary and Princess Christian's Hospital.

At the opening of the new Naval and Military Hospital in Scotland by H.R.H. Princess Christian last week, Sir Wm. J. Even, Consulting Surgeon to the Admiralty, Staff-Surgeon Batey, Fleet-Surgeon Paget Jones, and Probationer-Surgeons Hillely, Elliott, Harrison and Billings, had the honour of presentation to Her Royal Highness.

FLEET-SURGEON ARTHUR GASKELL, R.N., has been appointed Assistant Director of Medical Services.

DR. J. J. FERGUSON has been appointed Medical Superintendent of the Fife and Kinross Asylum.

THE McQUILTY MEMORIAL PRIZE at the Royal Victoria Hospital, Belfast, has been awarded this year to Dr. A. Fullerton, M.B.

THE CRITCHTON RESEARCH SCHOLARSHIP in Anatomy in the University of Edinburgh has been awarded to Dr. Stuart Bolton, M.B., Ch.B.

THE DARWIN MEDAL of the Royal Society has been awarded this year to Professor Edward B. Poulton, M.D., F.R.S., for his researches in heredity.

DR. HAROLD BAILEY SHAW, M.B., for 18 years Medical Superintendent of the Isle of Wight County Asylum, Whitecroft, Newport, I.W., left estate valued at £4,401.

A HANDSOME and useful verandah has been added to the Elham and Mattingham Cottage Hospital as a memorial to the late Dr. James Jelen, who devoted over thirty years of his life in serving the institution.

DR. T. T. THOMSON, of the London Mission Hospital, Jammalamaduga (South India), left last week for Belgium, where he will be serving under the British Red Cross in the First Anglo-Belgian Ambulance Corps.

SIR ROBERT J. PRICE, M.P. (East Norfolk), who is also an M.R.C.S.I., was the Mover of the Address in the House of Commons in reply to the speech from the Throne upon the occasion of the opening of Parliament last week.

The Alvarenga Prize of the College of Physicians of Philadelphia for 1914 has been awarded to Dr. H. B. Sheffield, of New York City, for his essay upon "The Fundamental Principles involved in the Use of the Bone Graft in Surgery."
clinical lecture on

subjective and ectopic abdominal pains.

by p. mouriquand,

professor at the faculty of medicine of Lyons, physician to the hospitals.

[specially reported for this journal.]

we should be running great risk of making mistakes if we referred pain to one particular part of the abdomen, trusting too implicitly to the patient's sensations as described by himself, for the simple reason that even when he correctly describes what he feels the distribution may be quite misleading. the clinical history of certain cases of pneumonia which present symptoms suggestive of appendicitis is evidence of this.

we often meet with cases of gallstone colic in which the patients refer the pain to the epigastrum and in chronic cholecystitis the symptoms simulate appendicular trouble. in sub-hepatic peritonitis the pain is not unfrequently felt far from the site of the mischief, but in this instance the pain is due to secondary inflammation of the local peritonenum, so that these cases do not come into the category under consideration.

let me take some illustrative cases. i remember that of a girl, at. 20, who was under observation for a whole year and successively developed symptoms of subacute pulmonary tuberculosis, then abdominal pain accompanied by diarrhoea due to ileo-cecal ulceration. on the supervision of the intestinal symptoms the pain was very severe and always in the same area—viz., the umbilical region. it came on in paroxysms and prevented her getting any sleep. it was never anything but umbilical or peri-umbilical and was not felt in any other part of the abdomen, yet comparatively strong pressure on that region failed to elicit any tenderness corresponding to the pain she complained of. it was only by methodical exploration of the abdomen that we ultimately discovered a limited painful spot in the right iliac fossa, more than four fingers' breadth from the place where she felt the pain. this was merely a commonplace pain such as is often experienced in the right iliac fossa by tuberculosis subjects with intestinal ulceration. for that matter there was nothing in the region to suggest the existence of peritonitis.

the spontaneous umbilical pain persisted for upwards of three months without its being possible to discover any tender spot other than the one in the right iliac fossa. it will be seen, then, that intestinal inflammation, especially ileo-cecal inflammation, may reveal its presence by ectopic pain which, as a rule, is located in the umbilical region. this deceptive pain must not be allowed to mislead us. a subjective pain which does not correspond to a subjacent objective pain, so to speak, is to be regarded with suspicion. we must therefore look for the true cause of the pain outside the zone in which it occurs spontaneously. very often the exact site of the lesion is the seat of objective pain on palpation, but not felt subjectively in that spot.

other observations tend to confirm this view. in children suffering from ascariasis we often get very severe attacks of stomach-ache, of verminous colic, and, as a general rule, the pain is referred to the umbilicus. now in the course of post-mortem examinations professor guiard and i have found that the round worm is usually lodged in the last segment of the small intestine corresponding to the right iliac fossa and not to the umbilical region. for that matter the right iliac fossa is usually tender on pressure.

i recently had under my care a very interesting example of this ectopic abdominal pain. a young fellow, at. 20, an agricultural labourer, was admitted to hospital with a diagnosis of appendicitis. six months before he had been seized with sharp pain in the right iliac fossa which obliged him to keep his bed, and there he had remained ever since. at the date of admission he had lost 45 pounds in weight in six months and had a pale yellowish complexion indicative of chronic infection. he complained especially of pain from which he was then suffering and pointed to a particular spot in the right iliac fossa, roughly corresponding to mcburney's point.

we palpated him very thoroughly, but to my surprise it caused him no pain even when i palpated deeply in that region. then, too, there was no muscular resistance and no trace of inflammation could be detected in the right iliac fossa. more than that, palpation seemed rather to relieve the patient, and he told me that he had often obtained relief himself by pressing heavily on this part, adding that he had never felt any pain or tenderness when his doctor palpated him.

it seemed to me, therefore, that the case must be one of pseudo-appendicitis, so i set to work to find out the seat of the objective pain. the regions of the gall-bladder, the epigastrium and the sigmoid flexure were quite painless and supple, so i turned to the lumbar region. nothing abnormal on the left side, but on the right rather strong pressure caused pain. i could localise the pain in the last intercostal interspace and the adjacent subcostal region. in view of the fact that the temperature pointed to the existence of chronic infection, oscillating between 99.5° and 101.2°f, it seemed likely that this was the seat of the infection. we examined him radioscopically and found that the right lung was pushed up in a marked degree by a conical prominence resembling that of the diaphragm. exploratory puncture revealed the presence of pus containing a few cocci and numerous disintegrated polymuclear cells.

m. bert operated and found not a sub-diaphragmatic abscess but a posterior diaphragmatic purulent pleurisy of very old standing, as shown by the thickness of the pleura and the degeneration of the pus. the patient soon began to improve, put on 33 pounds in three weeks and ultimately completely recovered. you
see, then, that this was a case of pseudo-appendicitis, in reality diaphragmatic pleurisy, not a secondary pleurisy since there never had been any tenderness in the right iliac fossa.

The "objective" pain was situated some distance away in the right lumbo-thoracic region. As a matter of fact as soon as we had established the diagnosis we were told that the "appendicular pain used sometimes to radiate to the right and into the back, but as it is also radiated all over the abdomen only the appendicular region, where the false pain was worst, had attracted attention."

The existence of this ectopic subjective abdominal pain was confirmed by Mackenzie in the course of an operation which throws light on their pathologically by the following: "In a case that occasion," he tells us, "to resect the intestine with the patient fully conscious under the following circumstances. He had umbilical hernia, and for some years he had been wearing a truss so tight that the skin had become ulcerated. The ulcer had actually involved the intestine and faeces escaped through the fistula. I decided to resect the intestine but the patient refused to be anaesthetised. Seeing that the skin was already ulcerated and that the tissues of the external abdominal wall were not very sensitive I thought it might be possible to open the abdominal cavity without giving much pain. Things turned out as I had anticipated. I was able to break down numerous adhesions, some old, some recent, separating them from the liver and intestine, resect part of the intestine and mesentery, to suture part of the intestine and mesentery, and to put in my sutures without giving the patient any pain."

I noticed, however, that now and then he shrank as if in pain, when I was not touching him, and on looking for an explanation I noticed that the upper part of the resected intestine, which had been placed on one side wrapped in antiseptic gauze, was occasionally the seat of peristaltic movements. When I asked where he felt the pain he still referred me to the umbilicus. I deliberately excited the intestine to peristalsis, and each time the patient complained of umbilical pain. I had the cause of the pain before my eyes and its source was at least twelve inches from the part where the pain was felt."

"...I had already said that these ectopic pains; they have been referred to by surgeons in connection with both true appendicitis and false appendicitis, yet many practitioners still allow themselves to be misled into attaching importance to their fallacious significance."

In arriving at the diagnosis of an abdominal lesion we ought only to take into account pain felt on palpation. Subjective pain, it is true, is often accompanied by objective pain, but they may occur separately. The objective pain may be situated in the thorax or abdomen and worse on palpation, whereas the subjective pain manifests itself at a spot often far removed and may be relieved by palpation. These constitute fairly distinctive features, enough, one might suppose, to obviate the risk of confusion.

All these cases seem to admit of the same explanation. In all the real pain was not felt at the same place as the spontaneous pain, and we cannot invoke in explanation any "stimulation of the wall by a subjacent inflamed viscus. On the other hand we are aware that irritation of a nerve at some part of its course gives rise to pain at the terminations of its branches and not at the site of the irritation."

In the case of diaphragmatic pleurisy above mentioned there was probably irritation of the trunks of the eleventh and twelfth intercostal nerves, which end in the upper part of the iliac fossa. The very situation of the lesion justifies our assuming irritation of the trunk of the big abdomino-genital nerve, many peripheral branches of which are distributed in this region.

I may add that Head's researches go to show that "a diseased abdominal viscus is manifested by peripheral pain always in the same spot, corresponding to the metameric medullary segment which comprises the sensitive centres of that organ and those of the painful cutaneous zone." This zone is not necessarily situated over the sick organ, indeed it may be at some distance therefrom.

Intestinal irritation due, in cases under my observation, to the presence of ulcers caused by tuberculosis or round worms has invariably manifested itself in the umbilical region. In some instances the visceral trouble is associated only with subjective pain which is relieved by strong pressure. In these cases we must institute a careful search for the objective pain in a spot which is tender and painful on palpation and is exaggerated by pressure. The operation that is called for will hardly ever be in the region of the subjective pain, but almost always at the precise spot where palpation shows tenderness and where strong pressure excites objective pain.

Note.—A Clinical Lecture by a well-known teacher appears in each number of this Journal. The lecture for next week will be by V. J. McAllister, M.B., F.R.C.S.I., Extra Assistant Master, Coombe Hospital, Dublin. Subject: "The Kidneys and Heart in Pregnancy."

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**ORIGINAL PAPERS.**

**SOME CASES OF DISEASE AFFECTING THE PYLORUS AND NECESSITATING GASTRO-ENTEROSTOMY.**

*By G. P. NEWBOLT, F.R.C.S.Eng., Hon. Surgeon, the Royal Southern Hospital, Liverpool.*

This paper is largely based upon notes taken of cases in which I have performed gastro-enterostomy. In the majority of instances posterior gastro-enterostomy was performed, and only in my earlier cases did I perform anterior gastro-enterostomy.

After-histories are of the greatest value, more especially in clearing up doubtful points in diagnosis, and in no cases are they more valuable than in patients upon whom gastro-enterostomy has been performed.

I wish to mention some points bearing upon disease of and in the neighbourhood of the pylorus, and the first I shall consider is this—that nowadays pyloric obstruction is easily diagnosed, always bearing in mind the existence of such conditions as "dilated esophagus," "hour-glass stomach," and growths in the first portion of the small intestine, usually the jejunum. Now, the obstruction may be caused by the ulcer itself, by a malignant growth, or by the ulcer
causing matting of the adjoining structures and kinking of or at the pylorus. I am not going to discuss the pyloric stenosis of children.

With regard to the conditions mentioned, I must plead guilty to having done a posterior gastro-enterostomy some years ago upon a patient who had a dilated esophagus. Nowadays, when a bismuth X-ray is quite a sine qua non, this mistake could hardly occur. I took the diagnosis given me of dilated stomach as correct. In this case the man, æt. 52, had stomach trouble for years, vomiting his food soon after he had taken it. His stomach was dilated, and the obstruction was supposed to be at the pylorus, but no X-ray was taken. On January 12, 1900, I did a posterior gastro-enterostomy. His stomach was dilated, and my note says: There is a mass in his pylorus which is very hard in one place.” Two days after operation he commenced coughing, and ten days later he died. Post-mortem, he had evidences of old tubercle; his pleura was very adherent on the left side; he had a hugely dilated esophagus, full of food, with a narrow cardiac orifice blocked by a piece of bread; his pylorus was thickened, but not so markedly as at the time of operation. He died from double pneumonia.

Hour-glass stomach, according to Dr. Holland, is far commoner than we usually suppose, and it is always well to bear this in mind. Perhaps one of the best results I have had was in the case of Mrs. J., æt. 40, who had suffered for many years from pain and vomiting coming on several hours after taking food. An X-ray examination showed an hour-glass stomach. On August 19, 1900, I operated on her, and found a small stomach, with an ulcer in the lesser curvature which had caused hour-glass contraction. I pared the adjoining sides of the pouches and united them, making a small but useful stomach. This woman nearly five years later is stout and well, and I invariably receive some article of diet on the date of her operation and on other feast days.

Now we come to cases resembling pyloric stenosis in which there is a growth of the small intestine high up.

I think these cases are rare, and I have only met with one myself; but in the British Medical Journal for Jan. 17, 1914, one appears in which the growth, an endothelioma of the jejunum, produced symptoms suggestive of pyloric stenosis. The growth was situated eighteen inches below the duodenojejunal junction, and as a result of back pressure the stomach was twice the normal size.

In my patient a tumour was felt in the right iliac region. The man, æt. 32, had suffered from symptoms of dilated stomach, and I was asked to perform gastro-enterostomy on the afternoon on which I first saw him. I opened him in the middle line: his stomach was dilated, but could not find the first portion of the jejunum. I therefore cut down over the lump in the right iliac region, and removed a growth of the small intestine, doing an end-to-end suture. He did well, but I have been unable to trace him. The operation was performed on June 26, 1907. The growth was a sarcoma of the jejunum. In three cases I have operated for dilated stomach, caused by inflammatory conditions involving the pyloric end of the stomach and adjoining parts, and in two of these I performed gastro-enterostomy; the third did not need it. In the first case the man, æt. 58, had symptoms of pyloric obstruction, and also of gall-stones. At the operation I found an inflammatory mass involving his duodenum, pylorus, and gall-bladder; the latter was full of stones. I did a posterior gastro-enterostomy, leaving the gall-bladder alone, and he was in good health ten years later. My idea was to deal with the gall-stones at a second operation if they caused inconvenience. He was operated upon on January 21, 1908, and I have since heard from Dr. L. Morgan that he has had attacks of gall-stone colic, so that it would have been better if he had submitted to a second operation. The stomach condition is quite satisfactory.

In the second case a young woman was sent to the Southern Hospital suffering from constant vomiting. She had been operated upon for perforated gastric ulcer some months before. On opening her abdomen I found that her pylorus was adherent to the anterior abdominal wall on the left side, so that her stomach was doubled on itself. By freeing the adhesions and sewing over the raw surface a cure was obtained.

In a third case I operated upon a man for chronic appendicitis. It was a difficult case, and there were many adhesions involving the cecum and ascending colon. A difficult case of stomach symptoms commenced. On opening his abdomen I found the pyloric end of his stomach fixed by dense adhesions to the right side of his abdominal wall. I separated it, and then did a posterior gastro-enterostomy in the usual way. The result was favourable.

My second point is the difficulty of diagnosing the nature of the growth in some cases even when it is exposed by the surgeon. When a patient æt. 39 or thereabouts comes and tells us that he has pain after food, that he vomits large amounts of fermenting food and that he is relieved by the vomiting, that he is losing flesh, and that blood has been noticed in his stool or vomit, we conclude that he has a duodenal or pyloric ulcer causing obstruction to the exit of food from his stomach. If, in addition, we can feel a lump, our diagnosis is pretty certain to be correct. A bismuth meal will show that the food does not leave the stomach as it should, and our diagnosis of obstruction in the neighbourhood of the pylorus is readily made. We have not, however, got at the nature of the obstruction; it may be simple or it may be malignant, and we very often cannot make a definite diagnosis—at least, judging from the failure of men of repute to do so. In support of this contention I quote the case of a man, æt. 39, who was allowed to leave one of our hospitals with a diagnosis of cancer of the pylorus, and told that nothing could be done for him; this was in 1904. He had a lump the size of an orange in the region of the pylorus and obstinate vomiting. After months of relieving him I did an anterior gastro-enterostomy. He put on weight rapidly, and when I saw him ten months later the lump could not be felt and he was working as an engine-driver. I take it that every test was applied in this case, as he was under a capable and scientific physician, but the diagnosis was evidently wrong. Now, I maintain that there are a certain number of cases in which, even after the stomach contents have been examined, even after a paparotomy has been
performed and a section made of the glands or growth removed, yet a wrong diagnosis is arrived at. It is most important from the surgeon's point of view to have a diagnosis made at the time of operation, for the following reasons: (1) It is much easier to remove a pyloric growth the first time than it is when it has become adherent and before the gastro-enterostomy is done than to do it as a secondary operation. (2) You may never get a chance of doing it as a secondary operation. On the other hand, there are advantages in delay, for a patient on the verge of death may pick up sufficiently to stand the somewhat severe operation entailed by removal of the growth. Again, the growth may disappear. Quite recently I operated upon a man who had had a posterior gastro-enterostomy performed for supposed pyloric carcinoma. When, however, I came to remove the growth I found it had shrunk to half its original size, but there were endless adhesions as a result of the gastro-enterostomy. I contented myself with freeing these, and the man did well. It was most instructive to notice how quickly the lump disappeared after the gastro-enterostomy. It was the size of a Tangerine orange, and it practically disappeared in six weeks' time. The nature of the growth is difficult to diagnose in some cases even when it is exposed by the surgeon. Whilst looking over some papers the other evening I came across the pathological report on some glands removed from a case of supposed pyloric cancer. The gland was reported to be malignant. This report was dated October 19, 1900. Now the woman is, I understand, quite well at present—at any rate, I saw her in August, 1912, nearly three years after a gastro-enterostomy had been done, so that the diagnosis was wrong, for if the growth had been malignant the woman would have been dead long ere this. This case shows how difficult it is to diagnose the nature of a mass involving the pylorus. At the operation the gall-bladder was adherent to the pylorus, the pylorus to the liver. The pylorus was thick and hard, and there were several large glands between the stomach and the curve of the duodenum. Where the evidences of inflammatory trouble are as marked as in this case, the probability is that the condition is an innocent one. Dealing with probabilities, a pyloric mass in a patient up to the age of 40 is very likely innocent; after that period there is a likelihood of its being malignant, but we know that patients of 71, 73, or 75 may be affected with simple ulcer. In fact, a man, aged 73, was admitted under my care with a perforated gastric ulcer from which he was dying. Post-mortem the ulcer was quite a simple one. But, generally speaking, old age is in favour of malignancy, and it is most common between the ages of 40 and 60. I often wonder how long a patient may suffer from an ulcer of the stomach before it becomes malignant. I think the condition may go on for years. Take the pyloric ulcers, of the type which is so common, and which are still to be found in our infirmaries; they rarely become malignant. But most of us have seen cases in which carcinoma has at length developed. I have under my care at present two cases of burns in which carcinoma has developed. I should think much the same thing occurs in the case of the stomach, for ulcer is undoubtedly very common. Again, the ulcer which produces an hour-glass constriction must have existed for a long period before it produces the well-known condition, but very few are malignant. As an instance of the long duration of ulcer of the stomach, I mention the case of a woman, aged 42, who was admitted under my care in the most emaciated condition—she really resembles an 'Indian famine victim.' There was resistance of the upper part of the right rectus, but I thought I could detect a tumour which varied in size. The bismuth meal did not leave the stomach for eight hours, and had not all gone in twenty hours. She vomited incessantly. Her history dated back for twenty years, but during the last year she had been worse and had wasted rapidly. The diagnosis was a malignant pylorus. I did a rapid posterior gastro-enterostomy, removing a gland from the lower border of the stomach, which proved to be malignant. The mass itself was very soft, and about the size of an orange. The lesser curvature was scarred, and had evidently been the seat of old ulceration lasting for years. The liver was papulated with soft nodules. Apart from the condition of the patient, the growth was inoperable, and one could only regret that she had not come for operation five years earlier. No doubt this class of case will disappear with time, just as enormous tumours of the gall bladder have become rarities. The advance of surgery has made the necessary operation comparatively simple. As far as the gastro-enterostomy went, the woman never turned a hair. I may here say that it is, in my experience, wise not to manipulate a malignant growth of the stomach any more than is absolutely necessary, otherwise a severe hemorrhage may follow.

A supposed simple case may turn out to be malignant. That we must not be led away by the youth of the patient recalls to my mind the case of a woman, aged about 30, whom I operated upon for some intestinal trouble, apart from a gastro-enterostomy she had had done in London. I felt a tumour in her pylorus; it felt soft, and the mere handling of it made it bleed—in fact, the hemorrhage which followed the operation nearly cost her her life. She got over her operation, but I heard that she died from cancer of the stomach a year later. In this case and the last one the growth felt like a soft mass through the stomach wall, and was evidently very vascular; it had not the firm, consistent feel of the pyloric ulcer.

Is it worth while doing gastro-enterostomy for malignant disease of the stomach? I think it is—firstly, because there is a chance that the diagnosis is wrong; and, secondly, because the operation usually gives relief, if only for a short period. In one of the first cases I did, the vomiting stopped and the man lived for six months and was fairly comfortable. This was an anterior operation. Since that time I have done several cases with relief to the patient from the outset. Two of these cases were practically acute, inasmuch as the vomiting was so continuous as to threaten life.

About four years ago a man, aged 41, was admitted with a hugely dilated stomach and with a pulse of 120. He vomited three pints of fluid, and five more were washed out; his pulse then dropped to 90. There was a question as to whether he might not perforate, so I operated upon him, doing a posterior gastro-enterostomy. He had a duodenal ulcer, and an inflammatory mass bound
his pylorus down. It was a very difficult operation, but he did well and is well at present. His son consulted me only the other day with symptoms pointing to duodenal ulcer, so it evidently runs in the family.

I have been able to find the sections of two cases supposed to be malignant, in which the patients have lived for over four years since operation. These sections were submitted to Professor Beattie, who thinks them innocent. The condition is one which occurs in chronic inflammation of the pylorus, and is rather puzzling until one becomes familiar with it. I think Alexis Thomson pointed this out at Edinburgh some years ago, and it rather confirms the view of most surgeons that in pylorectomy for malignant disease the prognosis is distinctly unfavourable, and that the cases which have survived for many years have probably been innocent in nature.

The following is a good instance of this class of case:

Mrs. R. was sent to see me on account of a lump in her abdomen, accompanied by constant vomiting. She was 37, and had suffered from indigestion for twenty years. She had been informed by a specialist in Glasgow that she had a floating kidney. On examination she had a dilated stomach, and in her epigastrium a lump could be felt the size of a Tangerine orange, which could be pushed across the abdomen from side to side. I advised her to submit to operation. An X-ray confirmed the diagnosis. On October 26th, 1900, I did a pylorectomy and then a posterior gastro-enterostomy. She did well, but developed a small gastric fistula, which I closed on November 28th, 1911. The fistula did not develop until ten months after her first operation, and was caused by the silk working out. In July, 1913, she was well, and is still well now, more than four years after her first operation. I looked upon this as a successful operation for malignant disease of the pylorus, but now feel sure that the growth was not malignant. This case has impressed me very much, as the lump was so definite, and at the time I was convinced it was carcinomatosus. Glands were also affected.

What is the value of the supra-clavicular gland enlargement? I always look for it, but only remember one case in which it was present at a comparatively early stage.

I should like to mention a case in which I did a posterior gastro-enterostomy which gave me no end of trouble and anxiety. He was a man, aged 20, with duodenal ulcer, and I did the usual operation, but did not close the hole in his transverse mesocolon. The operation was on February 22nd, and on April 26th I re-opened his abdomen, as he was constantly vomiting. I found the whole of his small intestine in the lesser cavity behind his stomach. The intestines were empty, and it was not until they were reduced that I could find the anastomosis opening; this I enlarged, and closed the hole in the transverse mesocolon. He continued to vomit, and on May 7th, as he was rapidly going downhill, I again opened his abdomen. Everything was matted, and whilst exposing the anterior surface of the stomach it tore open. Taking this as a hint, I did an anterior gastro-enterostomy, as it was evident the posterior opening was not acting. He slowly recovered. I saw him two years later. His weight had increased from 92 lbs. to 137 lbs. His only complaint was that bile regurgitated the first thing in the morning, but he could eat meat and potatoes, and felt better than for the last six years. Moral: In doing a gastro-enterostomy do not omit the smallest detail.

After-treatment should be carried out, but usually is not; and in one of my patients, a horse-dealer, the reckless manner in which he lived caused ulceration of his opening and hemorrhage eighteen months later, from which he died. Another man told me that after an operation for perforated duodenal, followed by a gastro-enterostomy, he went to the Isle of Man and tried how much he could eat, but he is still in good health.

In one of the last cases in which I did a posterior gastro-enterostomy the patient was aged 71. The ulcers felt hard, and the pylorus was fixed; the liver felt normal, and no glands were evident; hydrochloric acid was present. As far as I can see, only time can reveal the nature of the growth in a case of this sort. Consequently, it behoves us to be very cautious in our prognosis, for we are very liable to be mistaken.

**SOME COMMON ERRORS IN NEUROLOGICAL DIAGNOSIS AND TREATMENT.**

By Tom A. Williams, M.B., C.M.Edin.,

Washington, D.C.

Corresponding Member of the Societies of Neurology and Psychology of Paris, Neurologist to the Epiphany Free Dispensary, etc.

(Concluded from page 406.)

Errors Relative to Hysteria.—It is not possible for me to cover a topic of the disorders concerning which the fundamental error of thought already spoken of is rampant; but I must allude to hysteria in this connection in order to say that emolity is not hysteria, nor is capriciousness nor fantastical behaviour nor mere foolishness. The treatment of such symptoms in the belief that they are hysterical is doomed to failure. Hysteria is perhaps the only disease of mental causation and of which the treatment must be purely psychological. It is essentially quite simple. The prevalent belief in its essential multiformality is an error accountable for the apparent difficulty of its therapeutics, which is in reality quite easy. The proof of this iconoclastic affirmation is afforded by the cases I have published, (a) and its theoretical basis which we owe to Babinski, I have also set forth at length. (b)

A common neurological error is the confusion of hysteria with psychasthenia, asthenic states and dementia praecox. To general practitioners such an error is excusable, and it is beyond the province of a general society. But the frequency of the diagnosis of hysteria in cases of gross organic disease must be spoken of. This is particularly common in cases of cerebral neoplasm, especially of the frontal lobes. As I have said, peculiarity of humour is no criterion of hysteria; the symptoms of this are merely those produceable by suggestion, and hence should make us look for some other cause and demand a thorough neurological examination. The following case will illustrate this.

Thalamic Tumour in the Ventricles with Frontal Symptoms.—This patient was seen with Dr. Roy. Amnesia could reveal only a marked


mental torpor, with an occasional fatuous response, so it was soon abandoned and the physical examination proceeded with. There was shown a marked, although equal, exaggeration of the patellar and Achilles reflexes and an absence of the abdominal and cutaneous reflexes. This, of course, was an index of interference with the functions of the precentral gyrus, but afforded no localising information in amount of the absence of inequality on the two sides. The plantar response, however, gave further information, for while it was of the flexor type on the left foot, which showed that the projection fibres were but little affected, there was on the right side, although the great toe flexed, a marked spreading and extension of the four lesser toes. This indicated an interference with the right pyramidal tract of a greater degree than was shown in the left corresponding tract, i.e., if the lesion was supratentorial, it would be on the left side of the brain.

The motility could not be satisfactorily examined, for voluntary movements could not be commanded. Inspection of involuntary movement showed a distinct asymmetry of the face, the left side being more flaccid than the right, but the patient could close either eye independently. The pupils were widely dilated and iridoplegia. There was a drooping of the left side of the palate and an occasional slight deviation of the ocular axes. The grasp was very feeble. There was marked congestion of the eyelids and choking of the optic disks. No deafness was perceptible.

As the patient could not co-operate satisfactorily, further examination was postponed until the next day. This was done at George Washington Hospital, where she was taken. She was lying in a semi-coma, groaning, and restlessly and slowly moving the left arm and leg. The significance of this was not adequately estimated at the time. The pulse was small and not slow. The palate was no longer deviating. Reflexes of the right arm were more active than those of the left, this again pointing to a left-sided lesion. There was an exudate in the left of the disk.

The following day the facial paresis had disappeared. There was no longer extension of the outer toes. The arm movements were less. The disk was not more choked. She appeared to see better. She was more collected, and said that there was pain in her forehead and slight pain in the occiput. Furthermore, she was able to respond to the test for the diadokokinesis, which showed that although the movements were very slight, this function was not impaired.

The papilloedema and the coma disappeared; but as no definite focal symptoms appeared then, it was decided not to operate at the time and the patient returned home.

Moria was then the most marked feature of the disease. The symptom, consisting of an ill-timed facetteness, somnolence, or what infantile humour is regarded as characteristic of frontal lobe involvement; and we believed that the neoplasm might be in the corpus callosum, as there were no convulsions such as are apt to occur as a frontal growth extends backwards toward the Rolandic area. There was also an absence of the mutism which occurs in some cases of large left frontal tumour. But the left could not be decided upon, for while the toe sign and increased right arm reflexes and deviation of the palate to the left pointed to an interference with the left projection fibres, the weakness of the left face contradicted this. However, the excursive movements of the left arm and leg were, as I now believe, erroneously interpreted as part of the general restlessness of semi-coma which could not show itself on the right side because of the supposed interference with motility by a lesion of the left frontal lobe sufficient to be enough to impair right-sided movements.

Soon afterwards, examination showed a positive Babinski sign bilaterally. The Kernig angle on the left was 60 degrees, and on the right, 70 degrees. The uvula was deviated to the left. The left face was comparatively inert. The right lesser toes again extended on stroking the sole. There was a moderate staring of the right papilla, without bulging or distinct exudate. The inertia of the left face, recurring again, contradicted by other signs, of the cerebro-spinal fluid into a lesion of the left side. This appearance of the face may have been due to a general inertia with a relative irritation of the right side of the face; but this was not adequately considered at the time, I regret to say.

Although she was either very somnolent or silly and flighty, on one occasion, although she could hardly recognise people, while being tested for a passing diplopia, she said when I covered the left eye that the left object was more marked. Through misunderstanding, I was not able to be present at the operation, and Dr. Carr decided to explore the left frontal lobe. Any relief thus given did not improve the symptoms, and the patient died some days later.

**Interpretation of the Symptoms.**—The intense moria was certainly not due to the thalamic lesion found post mortem. It is a symptom of impairment of the function of the frontal lobes, and was due to intense pressure of these lobes. It was produced by the latter signs, of the cerebro-spinal fluid into the anterior limbs of the lateral ventricles by the blocking of its passage through closure of the third ventricle by the growth in the left thalamus extending across the sagittal plane. Thus it was a frontal syndrome from which the patient suffered, although the growth was not frontal, but thalamic.

Had the visual fields, however, been carefully explored before the occurrence of the internal hydrocephalus, it is hardly likely that some hemianopia would not have been found on account of the interference with the fibres leading from the optic tract to those from the calcarine region en route to the thalamic region. Again, an examination of the attitude sense would have revealed a distinct impairment, on account of the interference with the afferent fibres from the spinal cord which find their last relay station in the thalamus before proceeding to the cortex. It is likely, too, that other forms of sensibility might have been impaired in some degree, and an incomplete paresis of the limbs might have been revealed had the patient been examined neurologically before the pressure upon her frontal lobes prevented intelligent responses. The thalamic form of ataxia should also have been revealed had she been able to perform the movements required for ascertaining the defect. But when I first saw the patient, none of these tests could be performed, and the syndrome was an almost purely frontal one, and entirely prevented the diagnosis of the condition which led
to it so that we were helpless, even during the operation.

This case affords another illustration of the supreme importance of a proper neurological examination of cases of cerebral tumour before the tension has increased so as to prevent cooperation on the part of the patient, and before the bodily signs become masked by remote signs such as dominated the picture in this case.

Although in this particular case the tumour was not accessible to surgery, in other cases, especially those in the posterior fossa, the local signs are very readily masked by those remote ones due to blockage of the ventricular circulation.

Above all is it important that patients exhibiting what is often loosely called hysterical behaviour should be examined by a competent neurologist, to ascertain if the genesis of their peculiarity, and which duct is really hysterical in mechanism or whether their peculiarities are not those of pseudo-hysteria from organic defect. I cannot repeat too often that the diagnosis of hysteria should never be made by exclusion, but always, if possible, by its genesis, and if that is not possible, by the form of the syndrome exhibited—by which is meant the inconsistency of the symptom shown with those of the topographical arrangement of physiological groupings characteristic of organic or functional disease arising in the body as against their consistency with functional groupings comprised under the psychological rubric, association of ideas.

The reverse error, viz., of diagnosing something else when the symptoms are exclusively hysterical is also quite frequent as in my case of hysterical phobia diagnosed as epilepsy. (a)

The error is very common in regard to paralysis. A knowledge of psychopathology is of course the remedy, but this knowledge becomes dangerous when it leads to the ignoring of physical conditions in a case which is also hysterical. It must be remembered, however, that the most frequent of all the suggestions of bodily disease is bodily disease itself, and the removal of a hysterical fixed idea concerning one’s health is not sufficient in a patient in whom some physical disorder also exists. (b)

Suggestive therapeutics, which is so much vaunted by some, I consider a grave neurological error. Psychotherapy should be a constructive growth built on analysis, and not a mere imposing of behaviour upon the patient willy nilly, through a side tracking of his attention by electricity, hypnosis, joint manipulation, or religion. Two instances follow in which the inefficacy of such procedure is shown:—

A prominent real estate man in one of the larger southern cities was attacked recently by the condition which precedes and leads to arteriosclerosis. A specialist ordered certain exercises and a diet. But the real estate man adopted Christian Science. He believed himself to be curiously impressed with the idea that “all is God—God is good—all is good.”

His natural business caution was replaced by an unreasoning and happy-go-lucky optimism. Result—ruin and suicide in four months.

Sending Patients to Sanatoriums.—Finally, a serious neurological error is the sending of a patient to a sanatorium for nervous diseases without knowing the class of treatment to be given. A proper diagnosis should first be made, for this will often obviate the procedure of sending the patient to an institution and the stigma it involves. Besides, it is the “man behind the gun” who counts after all.

Longing to put an end to his life, having tried to drown himself and taken laudanum, a farmer’s son, aged 24, was sent to a sanatorium. Toward the end of his stay of seven weeks, he crushed and swallowed an electric light globe. He was removed, and immediately drank laudanum again. He was then brought to Dr. Hooe in Washington, who placed him in a general hospital and called a neurologist, who at once began to analyse into the cause of the lad’s insistence to kill himself. Less than forty hours sufficed to ascertain the cause, which was, in short, that he felt dispirited, and hence all the time, because of nagging of the family and others. Too shy to assert himself, he had for a year sunk into solitary dulness, which made him a laughing stock. The result was that the least correction or even suggestion about farm work would be taken as an insult. On one occasion, for example, a neighbouring farmer, who wished him to plant the corn differently, was believed by his mother though the patient knew the neighbour was quite wrong, and he felt all the time he was disregarded or put upon unjustly. His own sheepish attitude of course encouraged others to treat him in this way. He once left home to escape from this and worked in California, but did not make a success.

Stated briefly, the condition of his attitude towards the surroundings was his own shame at his erotic fancies and masturbations, which he feared would injure his mind, as other boys teased him about it. The result was that he became ultrascrupulous and intolerant of other boys, which led to the solitude which aggravated his tendencies. He believed now that something was wrong with his brain; but he felt that if he could be cured he would be contented to live.

On this basis, a full explanation was made of the harmlessness of his onanism, and the mechanism of his difficulties was explained and means for their overcoming were outlined. As a result, he went home within two weeks and is now working cheerfully on his mother’s farm and even mixing in society, his family having been instructed how to help him instead of harming him as they had previously done.

THE NECESSITY FOR REFORMING THE CORONER’S INQUEST. (a)

By J. C. McWALTER, M.D., LL.D.

According to Coke, the Coroner was so called because he had principally to do with pleas of the Crown. The Lord Chief Justice is said to be the principal Coroner of the Kingdom, and may in any part exercise the jurisdiction.

In the Statutes of Westminster the First it was ordered that none but lawful and discreet knights should be chosen as coroners, and Blackstone laments that in his time it had degenerated from a lofty and honorary office to a paid appointment in the public service. The coroner is now primarily an officer of the county, elected

(a) Described in Archives of Pediatrics, February, 1913.
(b) Some of the cases I presented to the District of Columbia Medical Society and published in the "Post Graduate," June, 1912, are of this type.

(a) Paper read at the Meeting of the British Medical Association, Aberdeen, July 30th, 1914.
by the freeholders, but in certain liberties and franchises he is elected by the Crown, or by lords holding a charter from the Crown. By the Municipal Corporations Act certain boroughs may elect coroners.

His duties are supposed to be defined mostly by the old statute of 1 Edward I., st. 2, whereby he must make inquiries on oath concerning those slain or suddenly dying or wounded, or whose houses are broken, or treasure said to be found.

The inquisition must be "super visum corporis"; if the body be not recovered the coroner may only sit in virtue of a special commission. By a more recent statute it is provided that only the coroner within whose jurisdiction the body is found lying dead shall hold the inquest, although the cause of death may have occurred elsewhere. The Crown or any party suspected may tender evidence. The doctor attending the deceased may be authorised to attend, and the coroner may order a post-mortem examination. If the jury are not satisfied they may name any qualified practitioner, who shall be required to attend and give evidence or make the autopsy. If a person be found guilty of homicide or murder the coroner shall commit him to prison for trial; he shall supply the material evidence to the court, and bind over the proper persons to attend and give evidence at the court. He is required to hold an inquiry on any person executed as a criminal. The question of a coroner's inquiry is one of inquiring judgment and tact as well as delicacy. In presenting circumstances there is often too much inquiry. In case of a railway accident it may happen that bodies lie in two or three different jurisdictions in respect of the same accident. In a criminal case, there will be a public inquiry before the coroner, a private one before the grand jury, a public inquiry before the police magistrate, and a trial at sessions.

The coroner has suffered a special check to his power. Formerly, his function was to ascertain how a person came by his death, in order that he might learn if the King's peace were broken. In the next place, he had to do with pleas of the Crown. In due time, his chief duty was to investigate the cause of and the responsibility for sudden death. Now, however, in every large city the time of the coroner is chiefly taken up with cases which may come under the operations of various Acts of Parliament—the Workmen's Compensation, the Employers' Liability, the various Insurance Acts, and a host of others, which are being added to every day. The coroner's court is cheap, open and prompt, and the local reformer who gets there as a jurymen is given the best opportunity of airing views which may be the harbingers of great social changes. In a word, the coroner's court has become a tribunal of the greatest importance to the citizen, to the manufacturer, and to the State generally, and it should be no longer regarded as a court always being in a few extra hours, an amenity to a doctor, or an adjunct to the practice of a needy solicitor.

Certain reforms are so manifestly necessary that they need only be enumerated in order to acquire universal sanction:

1. As regards qualifications, the holder should be a registered medical practitioner, who is also a barrister or L.L.B., or a solicitor who is on the Medical Register.

2. As regards election—the office, being an important non-political post, should not be by popular election, whether by vote of freeholders or by the Municipal Council.

3. As regards payment, this should be, not per inquest, but per annum, subject to revision. Where revision of salary is provided for, periodically, a claim for increment should not rest merely in an increased number of inquests, but regard should be paid to the number of witnesses, and the number of hours engaged in the business.

4. A capable coroner's clerk should always be provided. He should be able to supply shorthand notes.

5. The coroner should have the power, independent of the jury, of having a post-mortem examination performed and paid for. He should also be able to get the views of necessary experts.

6. The coroner should have the power in university towns or the like to utilise the material of the inquest for the purpose of teaching statistical jurisprudence. This science in England is in a childish and absurd position.

7. Questions of criminal negligence, which now involve several trials, should so be dealt with that a series of inquiries cannot be held on the same question.

8. Where a coroner's inquest tends to resolve itself into an inquiry fixing responsibility for damages, the coroner should have definite powers to confine such inquiry to simple investigations of fact bearing on the immediate cause of death.

9. In no cases are poor and illiterate people so unhappy and unprovided for as in cases of inquest concerning the sudden death of perhaps the chief support of the family, and the coroner should have power, when he thinks fit, to assign a solicitor to look after the interests of the family afflicted if they are too poor to do so.

10. Every uncertified case of death should prima facie be the subject of a coroner's inquest, but the coroner should have discretion not to hold the inquest when he thinks fit.

11. A legal assessor should be available for every coroner in cases where he thinks such help desirable.

12. Where the publication of certain parts of the proceedings might work injustice the coroner should have power to restrain their publication, subject to appeal.

OPERATING THEATRES.

ST. THOMAS’S HOSPITAL.

APPENDICTIS WITH GENERAL PERITONITIS—DEATH FROM SECONDARY HEMORRHAGE.—Whilst waiting to operate upon a case of acute appendicitis, Mr. Cooks related his experience of the case referred to in the title of this record, as it was specially worthy of notice.

A boy of about ten years of age was operated upon for acute appendicitis with an unlocalised collection of pus in the suprapyloric region. After the operation, violent sickness occurred during the afternoon, and the child died in the evening. It was found at post-mortem that there was a collection of pus in the peritoneal cavity, and that the cause of death was an acute abscess of peritonitis, which had spread to the intestines. The patient's condition was very serious. The appendix was rapidly explored,
delivered and removed through an incision splitting the lower part of the right rectus muscle. The abdomen was drained by a gauge plug contained in a split rubber tube. The convalescence of this boy may be told very briefly. There was no sickness twenty-four hours after operation, and he returned to his bed and bandages soaked with blood. The House Surgeon was hurriedly sent for, and found only an oozing wound, haemorrhage had ceased, which he plugged with gauge. The boy died as that was concluded. As a precautionary measure, which showed that haemorrhage had taken place from an ulceration into the external iliac artery, the wall of which had suddenly given way and occasioned the fatal secondary haemorrhage.

As regards the abdominal condition, there was a copious discharge of pus from the drained wound. Suddenly, without any previous warning, the night nurse found the boy unconscious, with his bed and bandages soaked with blood. The House Surgeon was hurriedly sent for, and found only an oozing wound, haemorrhage had ceased, which he plugged with gauge. The boy died as that was concluded. As a precautionary measure, which showed that haemorrhage had taken place from an ulceration into the external iliac artery, the wall of which had suddenly given way and occasioned the fatal secondary haemorrhage.

The President said that the greater frequency of carcinoma must be carefully noted in cases where fibro-myomata were present, and the fact that degeneration of fibro-myomata was most usual after the menopause had necessitated the abandonment of the opinion that after the menopause fibro-myomata were not likely to give trouble.

**TRANSACTIONS OF SOCIETIES.**

ROYAL ACADEMY OF MEDICINE IN IRELAND.

**SECTION OF OBSTETRICS.**

**MEETING HELD FRIDAY, OCTOBER 30TH, 1914.**

The President, Dr. M. J. Gibson, in the Chair.

**EXHIBITS.**

**MALIGNANT ADENOMA UTERI.**

Dr. Gibson. FitzGibbon showed a woman with malignant adenoma removed from a patient, aged 60. The history of the case was: M. B., unmarried, had been told when thirty-five years of age that she had a fibroid of the uterus and was advised not to have children. Menstruation always normal, and the menopause occurred at forty-eight years of age normally. Since then there had been no bleeding or discharge until seven months before being first seen by Dr. FitzGibbon. Bleeding had then occurred and lasted fourteen days, and had been recurring irregularly ever since, and sometimes profusely. On examination the uterus was found uniformly enlarged, about the size of a four months' pregnancy, somewhat soft, and the cervix small and atrophic. Laparotomy and pan-hysterectomy were performed, and the patient made an excellent recovery. The specimen showed a soft carcinoid growth filling up the cavity of the uterus and growing all over the walls, which were very thick, about 1/2 inches, and at one part showing a line of demarcation which might have been the capsule of an original fibroid. The whole of the adenoma with very marked malignant characters in some parts, and invading the wall of the uterus. The cervix was quite free. A second section was shown of a non-malignant adenoma removed from a girl of twenty-one years of age, which was removed from the uterus as a polypus, and showing great similarity in structure, but without any malignant characters.

Sir William Smyly said there could be little doubt that Dr. FitzGibbon's second specimen was the correct one—namely, that it was a myoma which had been invaded by a cancer. He recalled a case of a similar nature which he had treated of.
it might be left alone, but if it became inconvenient it would be necessary to try the ministration of strophanthus and digitals, and if not successful the patient should be delivered. Speaking of affections of the parenchyma of the kidney, he had at present a patient who was three months pregnant and who had a very marked signs of toxemia. He was not sure at first as to whether it was disease of a chronic nature or disease peculiar to a pregnant woman. He tried the patient on a milk diet, but she greatly improved. He then tried to fit the patient to the pregnancy on account of the size of the uterus and the fact that there was no quickening, which indicated that it was, perhaps, a molar pregnancy. The patient also developed ocular symptoms of an alarming kind. Taking with this the fact that she was passing very little urine, he decided to empty the uterus of what proved to be a hydatidiform mole. The dropsical symptoms afterwards disappeared and the patient recovered. He thought the fact that paralysis improved rapidly after the removal of the ovum suggested that the ovum was the cause of the toxemia, and hence one would imagine that to remove the ovum was the best cure. He understood Dr. McAllister to suggest that increased blood-pressure was a good thing, but in eclampsia he had always considered that greatly increased blood-pressure was the chief danger.

Dr. McAllister, in replying to the remarks, said that he thought that possibly many patients did not get eclampsia because their blood pressure was high. Dealing with the subject of toxemia, he brought about the kidney condition or vice versa—bearing in mind those cases where eclampsia developed very rapidly and the urine was found to have altered tremendously within twenty-four hours, such a rapid change suggested some reflex nervous force, which with the circulation through the kidney, and in that way with the excretion of certain poisonous substances. He agreed that the rise in blood pressure made one think of the complaint, but the blood pressure was rising would not justify interference. He considered it well to wait until the blood pressure had risen to 190 or 200 mm. of mercury, and that even then one should not consider that the pressure was on the patient. He could hardly agree with Dr. Crofton that bacteriological examination was easy on account of the difficulty of getting urine from the bladder without contamination occurring.

ROYAL SOCIETY OF MEDICINE.

CLINICAL SECTION.

MEETING HELD NOVEMBER 13TH, 1914.

EXHIBITION OF CLINICAL CASES.

DR. ALAN H. TODD showed a case of probable injury to the cruciate ligaments. The patient, a man, aged 90, had injured his knee during a football match when he was aged 15; he did not remember quite what happened, but he had to be carried off the field. Nothing was very obvious in the joint at the time, and the school doctor sent him into school next day. After walking on it, however, it became very swollen and painful, and he had to remain in bed for ten days. No splint was used. The inflammation subsided.

For some years after this the joint felt weak. Sometimes it would become swollen and distended, and then walking would be painful. Occasionally it would "go out," in which case there would be severe pain. Sometimes it would reduce with an audible click. The joint, moreover, sometimes became locked, but he had never discovered a loose body in it. He had always been able to reduce the knee by slow, forced extension, but he had noticed that when he wore an elastic knee-cap this prevented him from "getting the joint back" unless he first removed the cap. At one time, soon after he left school, he used to get attacks of erysipelas in the lower extremities, but lately these had been much less frequent. In his case of knee injuries he had been able to lead an active, athletic life, playing a good game of golf and tennis daily, though he always had to avoid turning round suddenly.

Eleven years ago, when out shooting, he jumped on some mudly ground and twisted the knee badly. It
was very painful, and a doctor put it in plaster, fully extended, for three weeks. After this he wore a patella-clamp for a while, but as it failed to prevent the joint "going out," he discarded it.

A ganglion that had slowly developed after the original accident, but lately it had obviously increased in amount. The patient walked with a slight limp, but there was no obvious laxity of the joint; apparently he had unconscious acquired the habit of keeping the thigh muscles well braced when walking. When sitting, he could make the leg slide forward on the femoral condyles at will. There was slight limitation of extension and flexion, and some lateral mobility in the joint; the movement was in lieu of free fluid within the joint, or of hypertrophy of the sub-synovial tissue, the circumference of the right knee was 3 in. greater than of the left. This seemed to be mainly due to several large areas of clearness that were present round the internal tibial condyle of the tibia and the internal condyle of the femur, at their margins. They were very well seen in skigrams.

Dr. W. Essex Winter and Sir John Bland-Sutton showed a case of sclerotic jaundice in which splenectomy had been performed. The man, aged 20, had suffered from jaundice and anemia all his life, with exacerbations at frequent intervals. His mother was jaundiced and anemic at 30, his paternal grandfather, at 50. There was no family history in the mother's side. The skin of the patient was yellow. The urine was clear, containing no abnormal constituents, and both Gerhardt's and the zinc chloride tests for pathological urobilin were negative. Haemolysis occurred in 0.45 per cent. saline solution, when there was abnormal biliary secretion; it consisted of lycorhena, 13.94 per cent. ; polymorphonuclears, 57.5 per cent. ; eosinophiles, 2.45 per cent. The temperature was 99°F. to 100°F., before operation. The spleen was removed in July, 1914, several figures being applied close to the hilum, but the main artery was left unobstructed. There were no complications and the temperature subsequently became normal in the course of ten days.

Mr. W. J. Middelton's case was reported positive before operation and negative after. The reaction was considered doubtful fourteen weeks later. The patient had been operated on several times for stricture jaundice. Blood count? Haemoglobin, 80 per cent. ; red corpuscles, 3,900,000 per cubic millimeter; leuco- cytes, 4,800,000 per cubic millimeter; polymorphonuclears, 51 per cent., lymphocytes, 33 per cent.; transitional and haemolytic cells, 11 per cent.; eosinophiles, polymorphonuclears, 4 per cent.; mast cells, 1 per cent. A few normoblasts and a considerable number of red corpuscles showed nuclear fragments (Howell-Jolly bodies). Resistance of red corpuscles to hypotonic NaCl solution: a faint trace of lysis, 0.45 per cent. ; NaCl; marked lysis, 0.3 per cent. ; saline solution. Osmotic fragility of normal red blood cells at the same time showed a trace of lysis with 0.45 per cent. NaCl, and almost complete lysis with 0.4 per cent. ; thus the patient's red cells were of more than average resistance. This was the case. The treatment would not be called negative. Dr. W. Essex Winter and Sir John Bland-Sutton also showed a case of splenic anemia after splenectomy. The patient, a boy, aged 13, had been ailing for six weeks, suffering from lassitude and some enlarged glands. He was sent for treatment by the school doctor, and was thought at first to have Hodgkin's disease, but improved under treatment as an outpatient.

On admission in July, 1914, the boy was seen to be anaemic, weak and thin, but made no definite complaint of pain or discomfort. The thoracic and abdominal viscera appeared normal apart from the spleen, which was much enlarged and extended 4 in. below the left costal margin and inwards to the middle line. Small, firm, calcified sub-splenic nodules were present on the left inguinal groins. The thyroid was enlarged, especially the isthmus. Blood count: Red cells, 4,200,000; white cells, 2,400; haemoglobin, 60 per cent. A differential count showed 50 per cent. eosinophiles, 15 per cent. neutrophiles, and 35 per cent. lymphocytes. Temperature, 99°F. Urine, normal. Splenectomy was performed in July. There were firm adhesions, separation of which involved considerable bleeding and some injury to the diaphragm. A couple of days after the operation, he developed a fever, which lasted two days, and stitches were removed on the eleventh day. The spleen was large and firm. For ten days after operation the temperature rose to 102°F. and 103°F., and thereupon gradually subsided. Movement of the diaphragm was arrested, especially on the left side, and there was collapse of the lower lobes of the lungs with bronchitis. This gradually cleared, and the patient was convalescent after five weeks.

Then the blood count was as follows:—Red cells, 3,650,000; white, 21,000; polymorphonuclears, 48 per cent.; lymphocytes, 21 per cent.; eosinophiles, 5 per cent.; transitional, 25 per cent. The next day the count showed: Red cells, 4,800,000; white cells, 8,000; haemoglobin, 62 per cent.

Mr. G. Hely-Hutchinson Almond showed a case of myositis ossificans (juvenile progressive type). The patient, aged 11, was known as a baby, October 22, 1913, when aged 3, her right hip began to stiffen, and was followed by the left; the stiffness was inconstant at first, but they had gradually become more fixed. The left hip was immobilized by a plaster cast till the mother, and then sterilized. She was thin and her muscles were badly atrophied. There was a slight list of the spine to the left with corresponding curves and rising of the right shoulder. A small patch of ossification could be felt close to the insertion of the biceps of the left arm, and a patch of hardness near the origin of the biceps of the right. The illo-tibial band on the left side was ossified from its origin to its insertion. This was about half an inch above the thigh bone. An ossification, a skigram giving the appearance of a calcified shell enclosing the muscles. There was a lozenge-shaped patch of hardness in the outer border of the left gastrocnemius. No definite patches of ossification could be made out in the muscles of the spine or trunk. Mr. W. J. Middelton showed a case of dermatitis with tuberculous glands in the neck. The patient was a girl, aged 9. She had been well up to the age of three, but then developed scarlet fever. An eruption occurred after the original rash had died away, and was diagnosed as dermatitis herpetiformis. The dermatitis persisted. She had been free from the dermatitis from the beginning of August to the end of December, when it recurred and persisted. Counter-irritation had been commenced at the end of February, 1914. At that time the pastures, blisters, and scabs were well marked, chiefly on the posterior border of the right neck and to the abdomen. Within three weeks she became well. Occasional slight relapses of short duration had occurred since. About five years ago some tuberculous glands in the neck were operated on usually healed well, but one scar remained bluish-red and had whitish specks in it suggesting lupus vulgaris. In May, 1913, she had a wound on the right wrist which became septic, but soon subsided. The following day, one or two glands in the neck enlarged and one small abscess formed. This was incised and complete healing took place in a few months. Other glands became inflamed, but no definite abscesses occurred. This fact was thought to be significant as showing greatly increased resistance. No sign of the dermatitis had appeared for over eighteen months.
Mr. W. J. Midleton also showed a case of derma-
titis herpetiformis and chronic bronchial catarrh in a
boy, aged 12. He had been treated previously for con-
tinuous counter-irritation commenced in August, 1912,
and carried out once a week ever since. The treat-
ment seemed to check the eruption, and the boy’s gen-
tenal condition improved.
Mr. W. J. Midleton also showed a case of severe
neuritis following sepsis in a man, aged 42. He had
also been treated by continuous counter-irritation by
multiple puncture and irritants. Applications had been
made once a week on various parts of trunk and
arms in turn. Recovery had followed. And a case of
polyarthritis and severe neuritis in a man, aged 48,
treated with benefit by means of blisters and savin
tointment. A blister was applied over the upper
injury, the upper dorsal vertebrae and left on twelve
hours. This was then removed and a raw surface left.
Savin ointment was then applied on lint over the raw
place, and left on for twelve hours. By repeating this
dressing regularly every twelve hours, a free, purulent
discharge was maintained for twelve days. Zinc oint-
ment was then applied, and the raw surface healed
rapidly and soundly within three days.
Dr. F. D. Razore Lindsays showed a case of hemi-
hyper trophy in an otherwise healthy girl, aged 11
months.
Mr. W. G. Spencer read a short paper on a case of
retro-peritoneal spleen of the spine in the left
loin.

HARVEIAN SOCIETY OF LONDON.

MEETING HELD THURSDAY, OCTOBER 22nd, 1914.

The President, Mr. J. Jackson Clarke, in the Chair.

CLINICAL CASES.

The President showed a series of four cases of
gunshot fractures incurred in the war. One of these
was a comminuted fracture of the humerus caused by
a rifle bullet; the remainder were due to shrapnel.

Dr. S. Melville spoke of the difficulties met with in
the localisation of bullets by X-rays.

The cases were discussed by Mr. V. Z. Cope, who
recounted an example of severe shrapnel wound in the
fore-arm. Troublesome haemorrhage had occurred
some time after the injury. The bleeding points were
widely distributed all over the wound. Apparently
both the radial and ulnar arteries had been severed,
and a free anastomosis had resulted.

Dr. Leonard Guthrie showed a case of congenital
septum and stenosis with two pulmonary arteries,
the right being absent. The patient’s name was Mc-
kisack, and he was 15 years old. The question of splenec-
tomy was raised. While both the radial and ulnar arteries
had been severed, and a free anastomosis had resulted.

Sir John Broadrent showed a case of pulmonary
stenosis, and also one of aortic regurgitation and
stenosis with mitral stenosis.

Dr. F. J. Derridc Kennish showed cases of tempo-
ropneumonic tumour (fat-bite fever) in a boy, in which
the symptoms were recurrent fever and erythema,
neoplasm of the stomach, in which a large stomach
tumour has arisen without previous gastric symptoms,
and which was thought to be a sarcoma; and pulmonary
tumour in a man who had the usual evidences of
acromegaly.

Dr. Q. B. L. L. Page showed a case of congenital
family chondroma. It was that of a man, aged 42,
whose two daughters, aged 4 and 6 respectively,
suffered from the same complaint. The usual features
were present, except increased fragility of the red
blood corpuscles. The occurrence of splenectomy was
very rare.

Dr. G. de Bec Turtul showed a case of patent
ductus arteriosus (?) in an adult. A systolic murmur
was audible, with greatest intensity in the pulmonary
area, but not in the back. Signs of heart failure were
present.

ULSTER MEDICAL SOCIETY.

MEETING HELD NOVEMBER 12th, 1914, IN THE
MEDICAL INSTITUTE, BELFAST.

The retiring President, Dr. Lawless (Armagh), in
the chair.

The incoming President, Dr. H. L. McKissock,
subsequently took the chair and delivered an inaugural
address on "Oral Sepsis." The President dealt with
the condition in the mouth as investigated in 155 cases
in the medical wards of the Royal Victoria Hospital,
in order to determine what relation, if any, to the
mouth of the disease. He had to a variety of diseases
commonly attributed to septicaemia and other unhealthy
states of the oral cavity. While he admitted that
syphilis and lepra always were certainly factors in
the causation of some fairly common affections he did not
go the length of some of the most advanced of a
recent school, who attributed almost every infection to
a septic condition of the mouth.

A vote of thanks to the lecturer was proposed by
Professor Sinclair and seconded by Dr. John McCaw,
and passed unanimously.

Mr. Professor Lawless showed two cases of disseminated
sclerosis, and made some remarks on the differential
diagnosis of this condition.

Mr. Fullerton read notes of a case of jejunal ulcer
following gastroenterostomy done three years
previously by a "butterfly" incision in the presence of
another surgeon. Mr. Fullerton had excised the ulcer
and re-established the anastomosis, the patient
making a good recovery. He also showed a child in
whom the truncal and cranial muscles were quite
rudimentary or absent altogether.

Mr. T. S. Irwin showed a specimen and sections from
a suspected case of actinomycosis.
CORRESPONDENCE.

November 18, 1914.

The Gutehill Training Scheme for Compulsory Training had been suspended by experts to be a good one. The idea was to take all the men of 18 and make them the material to work on. Every year 450,000 attained the age of whom 210,000 would be physically fit to do this. It also envisaged having a Territorial Army with a unit of 75,000 men. It was suggested that this should be 200,000 men who had joined the Navy, Army, or mercantile marine, leaving 150,000. In the first year it was proposed to give four to six months' training, and in the next three years of training, it was estimated at 100,000 men training, and the cost would be about for million pounds a year. Our Territorial Army cost nearly that, and it is a very small force. Compulsory training was, however, encouraged by the Director-General of the hospital.

This novel naval and military hospital, which has just been completed, was visited on the 9th by H.R.H. Princess Christian. The hospital was the gift of a generous anonymous donor at the beginning of the war, and is situated on the Mont des Linteaux near the village of Butch. Up to the present the whole cost of building, equipping, staffing, and running the hospital has been borne by the giver, and it will probably amount to over £10,000. Visitors of all classes have been admitted whenever they have been turned over by the Admiralty. The main building is 290 feet long, consisting of a central administrative block and four 25-bed wards radiating from this centre. There is a first-rate operating theatre and a Red Cross hospital. The hospital also erected a hospital in South Africa at the time of the Boer War. H.R.H. Princess Christian arrived in the forenoon from Hope-town House, where she was the guest of Lord and Lady Lindtayghow Sir Arthur May, Director-General of Naval Hospitals, accompanied the party. The old naval hospital at Butch was also visited, and a visit was paid to Lady Beatty on board the yacht "Beata," which is equipped as a hospital ship.

In the afternoon, accompanied by the Marchioness of Lintinhow, visited Dalmeny House, the residence of Lord Rosebery, which has been converted into a hospital. After the various matters which had been present, H.L. Hightower, the Admiralty, made a tour of the wards and spoke to the patients, of whom there are about eighty in the hospital.

COUNTY OF ECLINTON'S HOSPITAL.

A building on Irvine Moor, for many years used as the official mess of the 4th Battalion Argyll and Sutherland Highlanders, is being opened by the County of Eclinton for wounded soldiers. Everything is now in readiness for the reception of patients. The hospital is built of brick on an excellent site, with a fine commanding view of the Dee. The building, with the medical officer, Dr. T. J. T. Knox, of the Military Hospital of the Y.M.C.A; Nurse Crawford, the matron; Dr. James Wilson, and a number of young ladies of the district, have been actively engaged in the preparation of the building for its special use.

MEDICAL OFFICERS OF HEALTH AND BILLETING.

The Scottish Local Government Board have forwarded to clerks to county councils and district committees, and to town clerks and medical officers of health of the council and the district councils, the official list of medical officers. The list contains a copy of instructions issued by the Army Council to medical officers directing that medical officers of health shall be informed of any proposed billeting in their districts, with a view to obtaining their expert advice and consent for the billeting on the best sanitary conditions available. Medical officers of health are also to be consulted and their visits encouraged wherever camps are formed and main-

On September both the Board issued to all medical officers of health a circular letter setting out the lines of action on which medical officers of health should cooperate with the medical sanitary services.

ST. ANDREWS AND LOUVAIN UNIVERSETIES.

The Senatus Academicus of the University of St. Andrews has sent an address to the Rector and other authorities of the University of Louvain expressing their sympathy with that university in the losses it has recently sustained and their appreciation of the excellent work done by the University of Louvain. The University of Louvain has also expressed its sympathy with the University of St. Andrews, and has offered, so far as lies in its power, to assist the authorities of Louvain in restoring their University to activity. The Court will send to Louvain a fresh set of the "St. Andrews University" publications already issued and as published, and will also contribute towards the replenishing of the Louvain library by giving to the University of Louvain such duplicates as it may be able to part with from the library at St. Andrews.

THE COCOS ISLANDS.

These islands, where the "Esmeralda" was destroyed, were visited in December last by Dr. J. R. McVail, son of Sir David McVail, Glasgow. Dr. McVail paid the official visit to the principal island, the Rock of Tock Seng's Hospital, Singapore. The three principal islands of the Cocos group are named, Home Island, Direction Island, and West Island. The only other one, which is inhabited, is named Horsburgh. Dr. McVail described the hospital of the "Esmeralda" as situated in the Telegraph Company's residence on Direction Island. The population of this island consisted, at the time of Dr. McVail's visit, of 27 Europeans, 6 Malays, 30 Chinese, and 6 Indians. On the other islands the total population was 600, consisting of 5 Europeans, 169 Cocos Islanders, and 35 Bantamese. On Home Island there is now a small oil mill intended chiefly for the extraction of castor oil, but it can also be used for other purposes. Labour is chiefly employed in clearing jungle and planting coconuts palms and castor oil plants. The majority of deaths on the islands in 1913 were associated with infancy and childhood, as was to be expected from an overdeveloped community. The temperature is very equable, the highest record in the shade being 90° F. and the lowest 71° F.
ROYAL COLLEGE OF SURGEONS IN IRELAND: STUDENTS AND THEIR COMRADES AT THE FRONT.

To the Editor of The Medical Press and Circular.

SIR,—May I, through the medium of your paper, mention that the students of the Schools of Surgery of the Royal College of Surgeons in Ireland are sending cigarettes, etc., to the Students, Licentiates and Fellows of the College who are at present serving with His Majesty's Navy and Expeditionary Forces. As the students are most anxious that none of the "old boys" should be forgotten, they ask your readers to send the names of such students, Licentiates and Fellows to the Registrar of the College.

I am, Sir, yours truly,

ALFRED MILLER, Hon. Treas.

ALCOHOL AND THE WAR.

To the Editor of The Medical Press and Circular.

SIR,—My attention has been called by an officer to the leading article in the Medical Press and Circular under the above heading in the issue of September 23rd, page 320, in which the following statement occurs:— "Not only has alcohol been strictly relegated to a subordinate position among medical comforts and necessities, but the men have been urged upon the troops by Lord Kitchener." Is this quite accurate? What authority has the writer for saying Lord Kitchener has urged the disuse of alcohol upon troops? My careful reading of Lord Kitchener's expression of opinion upon this subject is the same as all true temperance reformers, that he deprecates the abuse of alcohol and urges the troops to follow true temperance principles and drink alcoholic liquors in strict moderation.

Lord Kitchener has also expressed an opinion that all patriotic men and women will endorse, that it is the reverse of patriotism to give recruits drink of any kind when they have had sufficient.

I sincerely trust alcohol will not be relegated to a strictly subordinate position after the experiments by Dr. H. Lyon Smith, quoted in the Lancet, October 10th, p. 916, where he shows what a valuable prophylactic alcohol is, and how a small dose does set up phagocytic action and prevents sepsis in the wounded.

I am, Sir, yours truly,

THOMAS DUTTON, M.D.
25 New Cavendish Street, Harley Street, W.
November 12th, 1914.

THE STUDENT'S TRAINING.

To the Editor of The Medical Press and Circular.

SIR,—"Observer," who writes to you on "The Student's Training" (November 4th), appears to be a prey of Oedipus' complex, system of location and teaching. His letter is clearly a mass of fatuity and facetiousness, but which is the essence and which the incident I know not. "Observer" may mean what he says, and have added lumbering irony to suggestion, or he may have attempted to write a bright and chatty epistle to you, Sir, and have found this alleged idea around which to twine the inky asphodels of his herbaceous intellect. Either way the result is deplorable.

For ages people as short-sighted and as long-winded as "Observer" have plaintively asked, "Why do we walk before we run? Why do we creep at all?" and have refused to be comforted. Those people would not make the best of students, would not make the best of Circus animals, would not make the best of Circus directors, or for aviation direct from the cradle. Why waste time on chemistry and physics instead of learning about X-rays and radium? Is the complaint of their kind.

The truth, of course, is so ridiculously obvious that it seems waste of ink to state it, but even the obvious fails to pierce their sense-proof cranium. They cannot understand the simple fact that if a man is to do a thing well he must know what he is doing. They would let a handle-pulling owner-driver, ignorant even of Oedipus' eyes, take his car to bits and expect him to put it together again just because he could drive the thing along a road. They think if a man has been shown which switches to pull in an X-ray apparatus, he should be taught the things induced currents or anything else, yet he is a full, perfect and sufficient specialist and the ultimate end of all knowledge, whereas he merely represents the penny in an unwieldy, complicated machine.

It is true, of course, that we forget a great deal of what we have learnt. It is the only thing to do with much of the information presented to us. We must not absorb knowledge, but assimilate it. All the little chemical facts which "Observer" need not observe at are but temporary steps, to be knocked away as we advance. We may forget how to make K1 from I, and I from K1, but we have learned something about the design and the mechanism of the facts go, but the principles remain. "Observer" is the true reactionary—the sol disant "practical man"; he can see no further than his nose. If his system were adopted there would be more like him than there are already. He is a horrible example of his own theory. Abst omnis!

I am, Sir, yours truly,

TOM A. HAWKE, M.D.
Dublin.

THE HOUSE SURGEON DIFFICULTY.

To the Editor of The Medical Press and Circular.

SIR,—Your correspondent "D. M." does a public service in calling attention to the inadequate pay given to house surgeons. The evil is not, however, as he suggests, confined to Dublin. People know that the maximum allowance made is that such appointments are in fact a prolonged pupilsip, and that the advantages gained in the shape of experience are sufficient to attract suitable candidates without the addition of remunerative salaries. This defence fails from two points of view. The young licentiate who has spent five years in learning his profession has a right to expect to be able to live on his professional earnings from the day he receives his diploma. From the point of view of the hospital, the hope is even worse. By offering inadequate salaries to house surgeons the hospital authorities limit their field of choice to candidates possessed of private means. There is no reason to suppose that such candidates are superior professionally to their less well-to-do brethren.

I am, Sir, yours truly,

M.D.

THE NEW STATESMAN ON THE PATENT MEDICINE REPORT.

To the Editor of The Medical Press and Circular.

SIR,—The New Statesman is not known to the crowd, but, as you are aware, it wields great influence among large sections of the classes who have valid claims to the titles intellectual and cultivated. It was therefore greatly to my satisfaction that I read in the issue of October 31st an article on the above subject. It is a most masterly, lucid and complete résumé and criticism of the Report of the Select Committee. It demonstrates once more the nefarious character of the trade in secret remedies, and powerfully supports the demand for immediate legislation. In numerous passages it refers in caustic terms to the "shocker," papers that are taking in the "easel" and the "crank" trade. I have written to the editor, and my letter appears in the issue of to-day, November 14th, thanking him on behalf of those who are working with me, and for myself, for the support he has afforded, and appealing to him to take part in a movement to cleanse journalism from the foul blot that now besmears it. The Editor has allowed me to point out in my letter that with the exception of a considerable, albeit relatively small, minority, of which the "shocker," papers and the "New Statesman" are not a part, the distinguished leaders, the great mass of the newspapers and periodical press are virtually suborned by quackery. Although directly challenged by the Select Committee, very few periodicals or papers have taken any notice of its Report, whilst the conduct of many leading journals has been worse than ever since its issue.
The Old Roserv.
Earlomood Common,
November 14th, 1914.

THE ASYLUM FATATITY.
To the Editor of The Medical Press and Circular.
Sir,—The moral of the amylene hydrate fatality is that no medical officer should dispense in a public institution unless he be also an apothecary. As the s.g.e., amylene hydrate is $0.20, a trained dispenser should be able to distinguish a strong from a dilute solution with his eyes shut.

Von Moring praised this drug as an hypnotic, and it was stated to produce sleep without ill effect. This view may now be modified, but it is to be hoped that no embryo Crippen has noted the pathologist's declaration that he might never have detected the cause of death if he did not know what had been taken. I am, Sir, yours truly,

J. C. McWalter.
Dublin,
November 14th, 1914.

OBITUARY.

MR. C. B. LOCKWOOD.
We regret to announce the death of Mr. Charles Barrett Lockwood, F.R.C.S., Consulting Surgeon to St. Bartholomew's Hospital, which place he held at his residence, 15 Upper Berkeley St., W., on November 8th, aged 58. Born at Stockton-on-Tees, Mr. Lockwood was educated at Bramham School and St. Bartholomew's Hospital. He qualified as M.R.C.S. in 1878, becoming F.R.C.S. in 1891. Mr. Lockwood was Hunterian Lecturer to the innoyal Royal College of Surgeons of England in 1887-88 and 1894. He was a recognised authority on hernia and diseases of the testicle, and he had contributed numerous articles on appendicitis, erysipelas, tetanus, and pneumonia to various surgical and medical works. At one time Mr. Lockwood was Surgeon to the Great Northern Central Hospital, and he was a member of the Council of the Royal College of Surgeons. He had held the office of President of the Medical, Harleian and Anatomical Societies of London. His untimely death was due to his having contracted septicaemia after pricking his finger during an operation for appendicitis. He was laid to rest in the peaceful churchyard of Instow, Devon, and a memorial service was held at the church of St. Bartholomew's, London, attended by numerous representatives of the staff of the hospital he had served so faithfully.

CAPTAIN T. PHILLIPS, R.A.M.C.
The death of Tom Phillips from wounds received at the seat of war will come as a painful shock to many old Queen's and Royal Victoria Hospital men, with whom he was a general favourite. From the meagre details to hand it would appear that the deceased was in good health and spirits up to the end of October and not seen from his letters, the last of which was dated October 35th. He is reported to have died on November 4th in No. 4 Clearing Hospital. Captain Phillips was 52 years of age, and was the son of the late Rev. J. G. Phillips, formerly of Damascus, and Mrs. Phillips, of Montcharles, Belfast. He received his early education at Trent College, Nottingham, and later in Campbell College, Belfast. He was a distinguished student of Queen's College, Belfast, and obtained his medical degrees in the Royal University of Ireland in 1897. After taking a voyage to India he was appointed House Surgeon to the Royal Victoria Hospital, Belfast, where his valuable qualities, both professional and social, were quickly recognised by the staff and his resident colleagues. He determined to enter the Army, and he obtained a place at the examination for commissions in the R.A.M.C. Most of his time had been spent in India, but he was home on furlough at the outbreak of the war and was eager to get to the front and to make as soon as possible, but after a few weeks of most strenuous and exciting work in the thick of the fighting he fell. During the few hours permitted to him for the necessary rest after his arduous labours among the wounded he used them to write a most interesting account of his experiences to his mother. In these letters no word of complaint ever escaped him, but he preserved a cheerful spirit under the most trying ordeals which he had obviously been through. Through his death the Army has lost an excellent officer and the medical profession one of its best and most promising members. The greatest sympathy is felt for his mother and brothers in their bereavement.

CAPTAIN C. T. CONYNGHAM, R.A.M.C.
We record with regret the death in action of Capt. Cecil T. Conyngham, M.B.Dub., R.A.M.C., which occurred recently in East Africa. Capt. Conyngham was a native of Dublin, where he received his education, first at St. Andrew's College, and later at Trinity College. As an undergraduate he was an athlete of distinction, as swimmer, as sprinter, and as football player. He received his medical degree in 1914 and shortly afterwards obtained a commission in the Royal Army Medical Corps. He was in India when the war broke out, and only left Bombay for East Africa on October 10th. Conyngham was an officer of first-rate ability, and his loss will be deeply regretted both among his comrades in the service and among his old college friends.

REVIEWS OF BOOKS.

INTENSIVE TREATMENT OF SYPHILIS. (a)
The perennial plague of syphilis, which still continues to make so ineffectual the third and fourth generation suffer for the lapses of their progenitors, remains a source of trial for the science and ingenuity of the clinician and the sanitarian, to say nothing of the moralist. And, again, the alert sanitarins among the specific clinicians returning, again and again, after invasions crowned with disappointment—although not absolutely unalloyed with profit—to the old-time therapeutic agents which were discovered, and often accidentally—by the naked eye,—the author himself takes care to place clearly before his reader the compilation of his favourite therapeutics: "By Aachen methods I mean the injection of a mercurial ointment by the bare hand of skilled nurses, under proper precautions, and in a hospital not too warm or too cold; the use of a stronger water internally and externally, as administered." In the days of the prevalence of the wide-spread epidemic which so significantly followed the discovery of America, the prevailing system of pathologic diagnosis by the deficiency or "corruption," however produced, of some one or more of the three elements which collectively constituted the whole human organism, was the actual cause of every variety of disease—as distinguished from mechanical lesion: efferent action of the salt; combustion of the sulphur; and agglutination of the mercury. The obvious clinical indication accordingly was to supply the defect by introduction from without. Our author is, of course, utterly opposed to the popular creed, and views all manipulations of tonitrux as an emetic:

"This agent has caused death from hemorrhagic
The injuries, Henry. 

Malignant. 

Suspect very deformities. 

"Indications,"ussions, which the suspect in the curriculum, and assured us, that we still rest on very simple but important principles that must be fully understood. The book is divided into two parts, the second of which is set apart for X-ray work, while the rest of the description of all other electrical medical apparatus is covered by both, and have to admit that the book is wholly admirable. Our only regret is that it is so short, and we can but hope that the pen that has written so good a book will soon produce a text-book for the edification of the specialist.

Mechano-Therapeutics. (a)

The object of the author of this book has been, as he tells us, to break down the barrier now existing between a large number of men in general practice and the application of mechano-therapeutics—a regrettable state of things which he thinks is "largely due to the fact that this subject is not compulsory in the curriculum, and altogether neglected by the medical schools. To this neglect he attributes, and we incline to think quite accurately, a fertile opportunity for the successful inroads of the quack.

W. Keeling evidently studied his subject extensively, in its application as well as to the various diseases which can be benefited by the adoption of this insufficiently recognised therapeutic agent. He considers the range of this new domain wide enough to make a distinct inclusion of diseases into the comprehensively professional one of "medico-surgical, and surgical. For its successful use we are told that: "A cough and a pair of skilful hands are all that is really indispensable. . . . We often prefer our own fingers to the most wonderful devices, as it were, neglecting the fact that mechano-therapy will be found useful, and in most cases more helpful than any of our drugs. The use of drugs, however, is never incompatible with massage."

It may be of pecuniary advantage to every extensive grouping might lead the reader to suspect that he was going to be entertained with an exhaustive dissertation on the virtues of a twentieth century panacea. But no, our author's summary of contra-indications is a full and thoroughly judicious.

We are told that: "No acute inflammatory conditions and no tumours should ever be directly treated by massage." The group of "tumours" is made to include all the types of granuloma, such as syphilis, tuberculosi, and actinomycosis, as well as the "true forms of new growths," benign as well as malignant. Hymenoma, leukaemia, and aneurysm also belong to this category.

The chapter here dealt with is that of fractures. The familiar Colles' fracture is, of course, the first one to receive attention. A very remarkable result of the author's mode of treatment of missed fractures at the lower end of the fore-arm is illustrated in Fig. 6. From fracture at the end of the radius to the paralytic effects of acute anterior poliomyelitis is a very long range indeed; yet our author claims results at every intermediate stage.

We consider that the views of massage are among the therapeutic factors which hold our at least, we believe that their genuine usefulness will continue to bc recognised after that of most coal-tar drugs, for instance, has hopelessly faded out beyond recognition.


Tropical Diseases of Asia and Africa. (c)

To write a text-book on tropical diseases in these days is a matter of no little difficulty. The knowledge of the subject is undergoing such rapidity of expansion that the task is, we may believe, almost hopeless. This is why we call attention to the existence of a treatise entitled "Manual on Eye, Nose, Throat and Ear," which is at present one of the few books in this class which are not out of date, and which have been put together by an excellent medical authority. The aim of the book is to bring together the best and most modern charm of tropical medicine which have gain the recognition of text-books. But while allowing the author full measure for his effort to produce a practical work, "leaving aside disputed points or theories which are still in abeyance, and while also believing that his work may be found of use by practitioners in tropical climates, the fact remains that it fails to reach a standard which can be regarded as meeting the requirements of a text-book.

MANUAL ON EYE, NOSE, THROAT AND EAR. (b)

This manual includes a survey, necessarily condensed, of the main features of the specialties, of the eye, nose, throat and ear. It is exceptional in this country, and combines all the special departments under one head. The book is a very valuable one for beginners, but as we gather the author has claims for this combination, judging from his former hospital appointments, we may assume that he has a good foundation on which the treatise has been placed. The eye section forms the bulk of the volume, and much of the work of one of the twelve coloured plates relates to diseases of the eye. All these coloured illustrations are good, and the same may be said of the other coloured drawings, insomuch as they are performed in the text. This book may prove useful to practitioners for reference purposes, owing to the ground it covers. But we doubt whether it would satisfy the examination requirements of the student. In the text we read "tubercular," instead of tuberculous, or "mydriatic," instead of the usual mydriatic, having the same origin as mydriasis, and "insidors," a word we have never heard of, and Chel, in place of the familiar CHOL, but the text is generally free from misprints.


MEDICAL NEWS IN BRIEF.

Royal College of Surgeons of England.

At the Primary Examination for the Fellowship in Anatomy and Physiology held by the Royal College of Surgeons, England, on the 4th, 5th, 6th, and 11th inst., fifty-seven candidates presented themselves, of whom fifteen were approved and forty-two were rejected. Among the successful candidates were two ladies—Miss Bostock and Miss Ingley, both of the London School of Medicine for Women. The following is a list of the successful candidates:—Jugalkishor Adhya, Marlan N. Bostock, L. H. Doherty, D. C. Ochsenheimer, L. P. H. Dorrian, T. F. E. Edye, Arthur Norman Hooper, John B. Hume, Helen Ingley, Harold G. V. Mence, Arthur Eisdell Moore, Sydney D. Rhind, Tribhovandas Oghades Shah, James R. White, David Whyte, and Graham S. Wilson.

City of Dublin Branch of the British Red Cross Society.

A meeting took place last week in the Lecture Theatre of the Royal Dublin Society, when his Excellency the Lord Lieutenant distributed the Department's certificates of proficiency to the successful students in the first aid and emergency classes held under the authority of the War Office, the National Health Association, and the Department of Agriculture and Technical Instruction. The Lord Mayor of Dublin presided. After the distribution of certificates, a branch of the British Red Cross Society for the City of Dublin was constituted and officers and committee elected.

St. Luke's International Hospital at Tokio.

It is announced that the Emperor of Japan has made a donation of 100,000 yen (£5,000) towards the foundation of St. Luke's International Hospital at Tokio, promoted by the Episcopal Mission, which is represented in Japan by Dr. Rudolf Teusler. The movement has already received substantial support in America.

Army Medical Service.

G. S. Buchanand, M.D., is granted temporarily honor. rank of Lieut.-Col. (November 13th).


Orn. and Hon. Capt. H. Spackman to be Hon. Major (October 4th).


J. B. Wood, M.B. (October 31st); O. S. Maunsell (November 3rd).

Indian Medical Service.

Lieux. to be Capt.—Dated July 20, 1914: Percival S. Connellan, John A. Sinton, M.B., Eric E. Doyle, Cyril M. Plunnet, Archibald W. Duncan, Henry L. Barker, M.D., and Edward A. Penny, M.B.

MEDICAL WAR ITEMS.

Lieux. I. II, Jones, M.B., R.A.M.C., contributes an account of his doings at the front in the North Wales Chronicle as follows:—"War is a terrible thing, more inhuman than I ever dreamt of, but also, I think, one of the best, if the most drastic, humanising agents I have met with in my short life. Caste, creed and rank simply become obliterated, and the best side of everyone's nature often becomes evident. . . . Our men were attacking a village near Armentières, when trenches, and the predominant feature of this and six were promptly shot. They then charged 150 Germans. All the Germans who were left were wounded prisoners, whom I saw and some of whom I treated, and their number was one officer and ten men! . . . A great many of our wounded were critically wounded, and most have shrapnel wounds. We deal in hundreds, and a great number will soon return to the firing line. The very serious we keep, and also those who will be fit to fight in three weeks' time. All the others are moved in motor ambulances to hospital ships and conveyed to England. We are working hard, feeding well, sleeping soundly, and all are in perfect physical condition. . . . I am happy in the humbler performance of my little best for the poor fellows who are making the name 'British' resound throughout the world as representing pluck, dogged perseverance, thoroughness, and all that is desirable in the present-day soldier. Tommy is a remarkable fellow, and my tribute to the Scotch soldier is doubly deep. He smokes a Gold Flake cigarette while you dress the most painful wounds, and smilingly agrees when you suggest that it must hurt. He would love to go home, but prefers to go back to his pals in the trenches, and the predominant feature of this and six were destroyed for the protection of the interests of England, France and America.''

Dr. William Parry, formerly of the Royal Southern Hospital, Liverpool, relates his experiences while acting as an anaesthetist to the principal surgeon of the No. 4 General Hospital of the Expeditionary Force in the Liverpool Daily Courier as follows:—"Arrived at destination," he says, "and looking around for a building for our hospital, we found a vacant hotel and a casino full of furniture and gambling tables. At 10.30 in the morning we had orders to prepare 300 beds by 3.30 in the afternoon. By noon the wounded were arriving, and by next morning we had accommodated 250 wounded in a perfect hospital for our work. Although some of the shrapnel wounds are terrible, the men are very plucky, and some tens of pain without a murmur. Much to our surprise, the men are in the pink of condition, and are an excellent testimonial to the feeding which they get in the firing line. . . . By this you will have realised the tremendous demand for medical men in this war, and how important it is that every able-bodied man should join as soon as he possibly can."

Stover House, the residence of Major and Mrs.
NOTICES TO CORRESPONDENTS.

The business men of Liverpool have decided to maintain a base hospital in France, and over £2,000 was subscribed at a meeting presided over by Lord Derby. The hospital, which will have 200 beds, will cost £13,000 to equip and £1,500 a month to maintain.

In addition to the temporary hospital established at Fishmongers Hall, the City branch of the British Red Cross Society has decided, if funds admit, to start another of 100 beds. A large building in Upper Thames Street, just behind Fishmongers Hall, has been placed at their disposal by the Pearl Assurance Company.

Lord and Lady Aberconway have converted their house in Belgrave Square into a hospital for the wounded, and have placed Hilders, their residence at Haslemere, at the disposal of the county association as a convalescent home for Territorials.

It is stated that near Dismoad a British field hospital with a hundred men was captured by the Germans, and the heroic surgeons who were in charge refused to leave the sick and wounded and demanded to be imprisoned with them.

Among the nine first recipients of the coveted V.C. recently bestowed by H.M. the King upon members of the Expeditionary Force is the name of Captain Harry Sherwood Ranken, R.A.M.C., "For tending wounded in the trenches under rifle and shrapnel fire at Hautvillers on September 19th, and September 20th, continuing to attend to wounded after his thigh and leg had been shattered." (Captain Ranken has since died of his wounds.)

NOTICES TO CORRESPONDENTS, &c.

Correspondents requiring a reply in this column are particularly requested to make use of a Distinctive Signature or Initial, and to avoid the practice of signing themselves "Reader," "Subscriber," "Old Subscriber," etc. Much confusion will be spared by attention to this rule.

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Small announcements of Practitioners, Assistants, Vacancies, Books, etc.—Seven lines or under (70 words), 4s. 6d. per insertion; 6d. per line beyond.

Contributors are kindly requested to send their communications, if resident in England or the Colonies, to the Editor at the London office, 8, Henrietta Street, Strand; if resident in Ireland to the Dublin office, in order to save time in reforwarding from office to office. When sending sub-

Original Articles or Letters intended for publication should be written on one side of the paper only and must be authenticated with the name and address of the writer, not necessarily for publication, but as evidence of identity.

Queries.—Reprints of articles appearing in this Journal can be had at a reduced rate, providing authors give notice to the publisher or printer before the type has been distributed. This should be done when returning proofs.

STUDENT (Leeds).—A qualification, both in medicine and surgery, is required by the War Office of candidates for medical service in the Army. Academic distinctions can be left till the war is over.

AN OBSCURE EXPLANATION.

Gen. deafness.—The injuries are due to the sudden condensation or rarefaction of the error of the external auditory meatus.


T. D. Bailey.—The work is now out of print. A new edition is in preparation, and will probably be issued at the beginning of the new year.

M.R.C.S., L.D.S.—Chinool, a coal tar product, is chemically known as potassium oxyquinine sulphate. A solution of 1 in 4,000 would be one of useful strength.

NATIONAL CHRISTMAS CARD, 1914.

In aid of the Prince of Wales's National Relief Fund a National Christmas card has been produced and published by special request by Messrs. Raphael Tuck and Sons, Ltd., which will be on sale to the public at 6d. from the 25th inst. The card is elegantly designed and reproduced in colours in the well-known "Oilette" process as well as in photogravure, illustrating the defenders of the Empire by sea, land and air, and is worthy of the high reputation of the firm by whom it is issued. Impressions of a special type, this card should be in strong demand this year and there is little doubt that it will prove a most striking memento of the most historic Christmas of our time.

Dr. J. D. Owen.—The rumour, we understand, is without foundation. The same standard is required of the candidates as prevailed previously to the war.

Meetings of the Societies, Lectures, &c.

WEDNESDAY, NOVEMBER 18th.

Royal Society of Medicine (Section of the History of Medicine) (1 Wimpole Street, W.).—5 p.m.: Paper: Dr. Raymond Crawford: "Ollier, Goldsmith and Medicine. Mr. Maxwell: Yearley: Autograph of Joseph Ignace Guillon, with Note on Error that he fell a Victim to his own Instrument.

THURSDAY, NOVEMBER 19th.

Royal Society (Burlington House, London, W.).—Mr. A. Mallock, Colonel Sir Sidney Barraud, Mr. G. W. Walker, Mr. W. Symons, and Prof. E. Wilson.

Royal Society of Medicine (Section of Dermatology) (1 Wimpole Street, W.).—5 p.m.: Exhibition of Cases.

FRIDAY, NOVEMBER 20th.


Royal Society of Medicine (Section of Tropical Medicine and Hygiene) (25, Chandos Street, Cavendish Square, W.).—8.30 p.m.: Paper: Sir William Oster, Bart.: "Enteric in War with Means for its Prevention.

MONDAY, NOVEMBER 23rd.

Royal Society of Medicine (Section of Ophthalmology)—8 p.m.: Paper: Dr. H. Lumbert Lack: "The Influence of Nasal Obstruction on Abnormalities of the Ears.

Royal Society of Medicine (Section of Laryngology)—The Members of this section are specially invited to attend this meeting.

Vacancies.

County Asylum, Chester.—Third Assistant Medical Officer. Salary £200 per annum, with board, lodging, and washing. Applications to G. Hamilton Grills, M.D., Medical Superintendent.

November 18, 1914.

NOTICES TO CORRESPONDENTS. THE MEDICAL PRESS. 529.

Harold St. Maur, in Mid Devon, has been placed at the disposal of the War Office as a hospital for wounded soldiers, and with the arrival of a further contingent recently the three wards have been filled.
NOTES TO CORRESPONDENTS.

NOTTINGHAM GENERAL HOSPITAL.—Senior House Physician. Salary £120 per annum, with board, residence, and laundry in the hospital. Applications to the Secretary.

HUNTS COUNTY.—Third Assistant Medical Officer. Salary £250 per annum, with furnished apartments, board, washing, and attendance. Applications to the Visiting Committee, Hunts County Asylum, Fareham.

Victoria Hospital, Bury.—Second House Surgeon. Salary £150 per annum, with residence, board, and washing. Applications to F. A. Leggatt, Hon. Secretary, 7 Grimshead Street, Bury.

SECOND GENERAL HOSPITAL.—House Surgeon. Salary £120 per annum, with board, residence, washing, and attending. Applications to the Hon. Secretary, the Hospital, Stroud.

University of London.—University Chair of Physiology. Salary £600 per annum. Application to the Academic Registrar, Medical School, Pembroke, Kensington, W. 8.

London Temperance Hospital, Hampstead Road, N.S.—Assistant Resident Medical Officer. Salary £100 per annum, with board, residence. Applications to A. W. Badger, Secretary.

Whitechapel Union.—First Assistant Resident Medical Officer. Salary £100 per annum, with rates, apartments, and washing. Applications to F. J. Tootell, Clerk to the Guardians, Union Offices, 74 Vauxhall Road, Kent.

MANCHESTER CHILDREN'S HOSPITAL.—Resident Medical Officer. Salary at the rate of £100 per annum. Applications to W. M. Humphrey, Secretary. (See advt.)

Appointments.


MILLIGAN, HENRY, M.B., Ch.B Glasg., D.P.H.Cantab., Tuberculosis Officer and Deputy Medical Officer of Health for the Borough of Bootle.

PHILIP, WILFRED, M.B., Ch.B.Aberd., Resident Medical Officer to the Corporation Hospital and Assistant Tuberculosis Officer to the Borough of Bootle.

TAYLOR, JOHN MAXWELL, M.B., Ch.B.Aberd., D.P.H., Assistant Medical Officer of Health and Medical Inspector of Scholars for the Borough of Bootle.

TINDALL-AITKIN, W. F., M.R.C.S., L.R.C.P. Lond., Radiographer to the Royal Westminster Ophthalmic Hospital.

Births

BOWIE.—On November 12th, at The Brook, Enniskillen, Co. Fermanagh, Ireland, wife of Capt. C. W. Bowie, R.A.M.C., of a daughter.

COMERFORD.—On November 10th, at 11 Chester Square, S.W., the wife of Beaumont H. Comerford, M.D., F.R.C.S.Eng, (née Betty Woodgate), of a child.

DE MOYENCE.—On November 8th, at 30 East Hill, Blackheath, to Dr. and Mrs. A. de Montejil—a daughter.

HUNTER.—On November 11th, at "Elmwood," Garston Old Road, Southport, the wife of Herbert R. Hunter, M.D., of a daughter.

PANTON.—On November 10th, at Harvey House, Watton S.O., Norfolk, the wife of John Panting, M.D., of a son.

VELLACOTT.—On November 12th, at 9 Tamar Terrace, Deptford, the wife of Harold F. Vellacott, F.R.C.S., of a son.

VOST.—On November 10th, at "Frayhall," Crystal Palace Park Road, Sydenham, the wife of Lieut.-Colonel Vost, M.I.M.S., of a daughter.

Marriages

HALLAM.—On November 14th, at St. Mary's Catholic Church, Clapham, Lieutenant Alfred Ernest Hallam, M.B., R.A.M.C., fourth son of Mr. and Mrs. Thomas Hallam, Esq., of Mountsorby, Clapham Common, to Agnes Irene Harriott Ward, only daughter of James Ward, Esq., 16 Wooton Road, Forest Hill.

RUMWORTH—HARTGATE.—On November 14th, quietly, at Holy Trinity, Wrexham, Surgeon A. N. Rumworth, R.N., son of Norman Rumworth, M.C.S., L.R.C.P., of Beeston, Wotton-on-Thames, to Vjera, youngest daughter of the late Major M. J. Hartigan and Mrs. Hartigan, of Peralde, Wotton-on-Thames.


STEWART—KIRK.—On November 11th, at Christ Church, Doncaster, Edward S. Stewart, F.R.C.S., of Harrogate, to Edith Jane, third daughter of Mr. and Mrs. W. W. Kirk, of Ripon.

Deaths.

ALEXANDER.—On November 14th, at his residence, 28 Glenlov- road, Harrow on the Hill, Robert Reid Alexander, M.D., late Medical Officer, Harrow School, Harrow, aged 73.

BROWN.—On November 10th, at Syer's Lane, Whitley, Dr. John Brown.


HAYWARD.—On November 6th, at 6 Landford Place, N.W., James Hayward, M.R.C.S.Eng., late Surgeon Cancer Hospital, Fulham, aged 48.

HERBINGHAM.—Killed in action, on October 30th or 31st, Geoffrey Wilmot Herringham, Capt. 6th Dragoons, attached to 5th Dragoons Guards, only son of Sir Wilmot Herringham, M.D., aged 31.

MOLINE.—On November 10th, at 42 Walton Street, S.W., Paul Moline, M.D. R.A.M.C, aged 71.

RIPLEY.—On November 7th, of dysentery, in a hospital at Krugenevets, Serbia, Dr. William Ridley.

RUSSELL.—On November 12th, at 76 East Hill, Wandsworth, very suddenly, Surgeon-Major Mark Robinson, I.M.S. (retired), aged 56.

SAAL-BURGER.—On November 10th, at the Nursing Home, 247 Devonshire Road, Honor Oak, S.E., Maurice Drummond Saal-Burger, M.R.C.S., L.R.C.P., Surgeon-Captain Legion of Honour, aged 70.

SMITH.—On November 14th, after a short illness, Eustace Smith, M.D., F.R.C.S., Consulting Surgeon to the City of London for the Diseases of the Chest, aged 79.

STONE.—On November 9th, suddenly, at Milton House, Rowland's Gill, Newcastle-upon-Tyne, Dr. James Wilkie Smith, junior, aged 29.

STONE.—On November 10th, in Australia, R. Bondy Stone, M.B., T.C.Dub., aged 47 years, the second son of the late G. Johnstone Stone, S.C.D., M.R.C.S.

OPERATIONS—METROPOLITAN HOSPITALS.

WEDNESDAY.—St. Bartholomew's (1.30 p.m.), University College (2 p.m.), Middlesex (9.30 a.m.), Midland (5 p.m.), St. Thomas's (2 p.m.), London (2 p.m.), King's College (2 p.m.), St. George's (Dublin), M.R.C.S.Eng, (2 p.m.), St. Mary's (2 p.m.), National Hospital (2 p.m.), Royal London (3.30 p.m.), Great Northern Central (2 p.m.), Westminster (3 p.m.), Samaritan (3.30 p.m. and 2.30 p.m.), Throat, Golden Square (2.30 p.m.), Guy's (1.30 p.m.).

THURSDAY.—St. Bartholomew's (1.30 p.m.), St. Thomas's (3.30 p.m.), University College, 2 p.m., Charles Cross (2 p.m.), St. George's (1 p.m.), London (2 p.m.), King's College (2 p.m.), Midland (1.30 p.m.), St. Mary's (2.30 p.m.), Samaritan (3.30 p.m. and 2.30 p.m.), Throat, Golden Square (2.30 p.m.), Guy's (1.30 p.m.).

FRIDAY.—London (2 p.m.), St. Bartholomew's (1.30 p.m.), St. Thomas's (3.30 p.m.), Guy's (1.30 p.m.), Midland (1.30 p.m.), Charles Cross (2 p.m.), St. George's (1 p.m.), King's College (2 p.m.), St. Mary's (2 p.m.), Ophthalmoi (10 a.m.), Cancer (3 p.m.), Cholera (2 p.m.), Great Northern Central (3.30 p.m.), West London (2.30 p.m.), London Throat (9.30 a.m.), Samaritan (3.30 p.m. and 2.30 p.m.), Throat, Golden Square (2.30 p.m.), City Orthopaedic (2.30 p.m.), Bohus (2.30 p.m.), Royal Free (9.30 a.m.), City Orthopaedic (4 p.m.), Great Northern Central (3.30 p.m.), West London (2.30 p.m.), London Throat (9.30 a.m.), Royal Free (2 p.m.), Guy's (1.35 p.m.).

MONDAY.—London (2 p.m.), St. Bartholomew's (1.30 p.m.), St. Thomas's (3.30 p.m.), St. George's (2 p.m.), Midland (1.30 p.m.), Westminster (2 p.m.), Cheltenham (2 p.m.), Samaritan (gynaecological, 2.30 p.m.), Metropolitan (2.30 p.m.), London Throat (9.30 a.m.), Cheltenham (2.30 p.m.), Samaritan (9.30 a.m. and 2.30 p.m.), Throat, Golden Square (2.30 p.m.), Bohus (2.30 p.m.), Royal Free (2 p.m.), Guy's (1.35 p.m.).

TUESDAY.—London (2 p.m.), St. Bartholomew's (1.30 p.m.), St. Thomas's (3.30 p.m.), Guy's (1.30 p.m.), Midland (1.30 p.m.), Westminster (2 p.m.), London (2.30 p.m.), University College (2 p.m.), St. George's (1 p.m.), St. Mary's (1 p.m.), St Mary's (2.30 p.m.), Cancer (2 p.m.), Metropolitan (2.30 p.m.), London Throat (9.30 a.m.), Royal Free (3 p.m.), Bohus (2.30 p.m.), Samaritan (2.30 p.m.), Throat, Golden Square (2.30 p.m.), Bohus (2.30 p.m.).

MANCHESTER CHILDREN'S HOSPITAL.

PENZLEBURY, Near Manchester (188 beds).

Wanted a RESIDENT MEDICAL OFFICER, Lady or Gentle- man. Must be registered for the hospital. Candidates must be unmarried, doubly qualified, and duly registered. Salary at the rate of £410 per annum. Applications stating name and age of not more than five testimonials to be sent to the undersigned at the Hospital, Pendlebury, Manchester, at once. Duplicates to commence December 1st, 1914.

By Order,
W. M. HUMPHREY, Secretary.

NOTES AND COMMENTS.

It will be within the recollection of readers that a small Belgian Medical Relief Committee was formed in London, and held its first meeting on Wednesday, November 14th, when a small delegation of Professor Jacobs' original appeal was published in our columns. For some reason that is not clear, the appeal of Dr. Jacobs did not appear until November 21st in either of the two medical journals whose editors are members of the committee of eight. It was announced in one of these journals that there had been an immediate response from all over the country. That assurance is particularly gratifying, coming from the small knot of enthusiasts who have voluntarily assumed so heavy and responsible a burden. The outcome of their first deliberations, however, hardly suggests a firm grip of the urgent necessities of the case. From a body composed of voluntary representatives of the most learned London Corporations and two medical journals, one would look for the essence of practical wisdom. So far as can be gathered, however, they do not propose to give monetary aid to the medical men, at any rate, not in the immediate future. Their appreciation of the position is shown by the following passage:—"The survivors return to their ruined homes, when it may be possible to return to face the winter and the threat of diseases due to exposure, and the epidemics which must be expected to follow the wholesale destruction of all the machinery of civilised life, while their doctors, who have shared in the common ruin and pillage, have not the appliances or drugs for ordinary professional work."

It is clear, then, that the committee, which is carefully described in a leading article as "provisional," realises the sufferings of our Belgian colleagues with dramatic insight. Yet their proposals for the mitigation of the trials of the practitioners on their return to their ruined homes, "when it may be possible to return at all," forms a striking antithesis to their strenuous activity in calling together at an instant's notice a body of relief and discussing the pros and cons of a most critical situation. Dr. Jacobs estimates that about 100,000 medical men and 300 pharmacists are now in Belgium "absolutely poverty-stricken and unable to earn their living." The committee have decided on the preliminary step of sending out packets of portable medical and pharmaceutical materials. They also ask for surgical instruments, and intimate that, though not of the latest pattern, they would nevertheless be "extremely valuable." We venture to think that is not the kind of help wanted by a penniless medical man returning to bare walls and a devastated countryside. On the other hand, the warmth and generosity of the Irish meeting on the 20th at the Royal College of Physicians in Dublin shows a vital appreciation of the response that should be given to the pathetic appeal for Cross service, for our gallant Belgian colleagues. The Editor of The Medical Press and Circular will be pleased to receive any subscriptions for the Belgian Medical Relief Fund, addressed to 8, Henrietta Street, Covent Garden, London, W.C., or to the Irish Office, Dublin.

The announcement that several Belgian medical practitioners have received permission to practise in London raises once more the question of the "recognition" of foreign degrees and diplomas in this country. Apart from the fact that medical qualifications obtained on the Continent are not, under ordinary circumstances, registrable in Great Britain, the extension of the right to practise over here to those Belgian medical men who have been ruthlessly deprived of their means of livelihood through the war is a graceful way of acknowledging our indebtedness to them as the sorely harassed representatives of the bravest nation of modern times. It is understood that several important civilian medical posts in France have been offered to and accepted by Belgians. That a Belgian medical practitioner should be allowed to treat the sick refugees from his own country in any land whether they have fled may be readily understood, but it might not be impossible to admit to the British Register, say, for the period of the war, Belgian medical men who are duly qualified to practise in their native land, so that they may be enabled to provide for themselves and their families until it is safe for them to return. In suitable cases they might even be permitted to replace British practitioners who are upon temporary privation of theirs. Perhaps the General Medical Council will have something to say upon the matter during the present session.

The "Medically Rejected" as an Army Asset.

The pathetic position of the medically rejected recruit induces one to consider carefully any proposition that affords a chance of some mitigation of his lot. Clearly, a physical standard must be fixed, and it goes equally without saying that the fewer soldiers wanted by the State the higher
will be its requirements. Yet so far as the fighting value of the soldier is concerned, it is not a matter of vital importance whether—other things being equal—he stands five feet or five feet four in his socks. Mercer’s height does not help him much nowadays—except, perhaps, in hand-to-hand encounters, a slight advantage that is far outweighed by the relatively larger target surface which he offers to the enemy. A standard in eyesight is of vastly greater importance to the combatant infantry soldier, for the bulk of his fighting is likely to be conducted by rifle fire at long ranges. Even if he be permitted to mix his refraction with spec-tacles, the risk of losing his glasses or of having them obscured by a drizzling rain prevents him being a perfect machine from the military point of view. Chest measurement and expansion are other factors that may at times throw out men who would make useful soldiers. It has been suggested that one or more corps should be formed of ‘medically rejected’ men—of course, assuming that the cause of rejection was one that would not prevent them undergoing the hardships of camp life or of reasonably severe training. Provided a man can go through his drills, live an open-air life, and learn how to handle and shoot straight with a rifle there should be room for him in the reserve forces. If the demand for more men should persist, it would be well for the War Office to consider a position that would provide them with a good number of keen soldiers to draw upon in time of need.

A LETTER IN THE ABERDEEN JOURNAL.

A Voice from the North.

puts the case of the "medically rejected" so well that it may be quoted at some length. "Perhaps there are others who, like myself," he writes, "joined Kitchener’s army, and they got discharged as being medically unfit for the front. ‘Medically unfit for the front’ in no way means ‘medically unfit for home service at a critical moment.’ We will assume for charity’s sake, as well as for a working hypothesis, that all the strapping young men to be seen padding the streets, with civilian clothes and a boned expression, are those who have failed, or know they would fail, to satisfy the medical examiner. Surely some use could be made of us! Could we not form a company amongst ourselves and practise rifle-shooting? This would involve (a) rifles, (b) a rifle-range, (c) an instructor, and (d) cartridges. Perhaps the military authorities in Aberdeen would be willing to give the loan of Nos. (a) and (b) if they saw that we were a responsible band of young men willing to provide Nos. (c) and (d) out of our own pocket. This suggestion is meant to embrace West-enders rather than shop assistants and artisans, who have responded more nobly to their country’s call, though, of course, it is open to all willing to sacri-fice a little time and pocket-money.” The matter certainly is worth further discussion in the interests of the public.

The Medical Roll of Honour.

Since the publication of our last list the following casualties have been reported among officers of the Royal Army Medical Corps:

- Officer killed in East Africa—Captain C. A. T. Convyghngham, R.A.M.C.

now unofficially reported wounded and prisoner of war, Capt. A. A. Meaden, R.A.M.C. Officer previously officially reported wounded and missing, now unofficially reported prisoner of war, Capt. C. W. Holden, R.A.M.C. Officer unofficially reported wounded, Lieut. W. H. Lister, R.A.M.C.

LEADING ARTICLES.

A BOON FOR COLONIAL, INDIAN, AND FOREIGN MEDICAL STUDENTS.

The two London Royal Colleges, those of the Surgeons and the Physicians respectively, have recently taken a step that is not likely to lessen their popularity in the East. Last week it was announced that they had approved and adopted a recommendation from the committee of the two colleges to admit on certain conditions to their final examination students of Colonial, Indian and foreign universities, recognised by the Conjoint Board.

This decision throws open the doors of the colleges to a number of students in various parts of the world who would otherwise have been either excluded or greatly handicapped in their attempts to secure an English qualification. The necessity of visiting England to undergo the final examination is still present, but that is a very different matter from the two or three costly journeys and prolonged residence hitherto imposed upon foreign and colonial candidates for a college diploma. During recent years repeated protests have been made by those interested in medical education and in the medical service of India and Ceylon, and these have been on frequent occasions pressed by influential persons upon the attention of the home government. As might have been anticipated, the provincial medical schools and universities gradually relaxed the terms of the residential and other conditions attached to foreign and colonial students seeking a medical qualification. It is certain that during recent years the greater proportion of such students have flocked to Irish, Scotch, and provincial colleges and universities instead of to the metropolis. The action now taken by the English colleges may redirect the stream in their direction, at any rate, so far as the mere portal of entrance to medical qualification is concerned. As to the greater and more enduring foundation which it should be the aim of every really great body of the kind to establish—the world-wide bond of common interest and loyalty, begotten of long tradition and cemented by zealous co-operation—that may follow some day when the colleges abandon the selfish traditions which at present render them the happy hunting ground of a privileged few rather than their constituent licentiates and members. The way in which both colleges rigorously exclude the lower ranks of their diplomats from any voice in the management of the affairs of the corporations forms a grotesque and anomalous survival in the present democratic age. But whatever defects may exist in the constitution of the English colleges, it must be freely acknowledged that they have conferred a vast obligation
upon the world by their steadfastness to the high ethical ideals and the scientific progress of the medical profession—a debt the full significance of which it is impossible even to formulate. The wise friends of these ancient corporations may well express a hope that the present removal of restrictions may betoken the advent of broader and more modern methods to their policy. Their new regulation states that students of Colonial, Indian, or foreign universities who shall have passed such an examination, or examinations, at their universities for the degree of Doctor or Bachelor of Medicine or Surgery as shall comprise the subjects of the first and second examinations of the Board, and who shall have completed the curriculum of medical study required by the regulations of the Board, will, two years after having passed such examinations, be eligible for admission to the third or qualifying examination for the L.R.C.P. and M.R.C.S. examinations.

CURRENT TOPICS.

Proposed Red Cross Hospital for Dublin.

We understand that the City of Dublin Branch of the British Red Cross Association has had under consideration the provision of further hospital accommodation for wounded soldiers in Dublin. It is admitted that the resources of the general hospitals are at present taxed to the utmost, and that further accommodation will be urgently required in the immediate future. One suggestion discussed by the City of Dublin Branch was to establish as quickly as might be a hospital with fixed beds, either in some existing building or buildings if any could be found suitable, or in temporary buildings to be erected in some open space such as the Phoenix Park. A suggestion was added that such a hospital, though doubtless reduced in size, might be a permanent institution especially for the training of Red Cross workers. It is felt, however, that Dublin has already far too many small hospitals, and such a scheme would receive little financial support. An alternative to the establishment of a new hospital, temporary or permanent, is the temporary extension of such of the existing general hospitals as have space available for building. Many of them have such space and would be willing, we understand, to devote it to this purpose. The hearty co-operation of the surgical staffs would also be secure. The scheme seems to be the most economical and businesslike put forward, but we understand that it does not meet with the entire approval of the military authorities. They prefer the erection in the grounds of the military hospital of temporary structures sufficient to accommodate the requisite number of beds. We can quite understand the wish of the military authorities to centralise their hospital work. The responsibility for the maintenance and staffing of such a hospital must, however, rest with the military authorities, and not with a philanthropic organisation.

The Management of Wounds in War.

One of the greatest medical problems of the present war is the care of torn tissues that have been invaded by septic micro-organisms. On every hand the dire effects of sepsis among the wounded are manifest, and, in addition, there are the risks of possible infection with tetanus or with acute spread-

ing gangrene. Were all the wounds received in battle to be inflicted under aseptic conditions their danger would be far less, but every medical officer at the front is well aware that the attendant circumstances are such that the likelihood of even the smallest wound not a probability but a practically inevitable complication. The idea that the principles of strict asepsis, as opposed to antisepsis, could be relied upon in the treatment of wounds in war was entirely disposed of by Sir Watson Cheyne, Bart., C.B., President of the Royal College of Surgeons of England, in his able introductory remarks to the discussion upon the subject which took place last week before the Medical Society of London. If ever Listerian needed vindication at the present time one has only to compare the results of the treatment of wounds in war by aseptic dressings with those obtained by the timely use of antiseptics such as carbolic acid, tincture of iodine, and hydrogen peroxide. The latter agent, according to French authorities, appears to be particularly useful in the treatment of acute spreading gangrene. When an infected wound is adequately drained, dressed, and irrigated, if necessary, in accordance with antiseptic principles, the patient has a much better chance than if his injuries were imperfectly disinfected, or, worse still, treated only with boiled water and sterile coverings. In addition the timely use of appropriate vaccines and sera may further promote the chances of recovery.

Stock Mixtures.

The question of stock mixtures or no stock mixtures is agitating many minds. Where the Insurance Act holds its stamp sway, where doctors and chemists fight for the floating sixpence—elusive as the bob cherry of our early days, there we hear the latest cry. The chemist gets, or does not get, as the funds may be, a fixed price for his drugs and a fee for dispensing them. In many places local formularies are in vogue and are used quite successfully by the autochthonous physicians. The chemist makes up many of these formularies in bulk and duly fills the bottles. He gets paid for his drugs and, in addition, he gets a fee for the dispensing which he does in bulk. It has been proposed that certain stock mixtures should be used with which should carry no dispensing fee, but the chemist is up in arms. The mixture is the champion of the ill-treated patient. How can any one get well, he asks, on a stock mixture? What reach-me-down potion, be it concocted never so cunningly, can heal the varied individualities in need of a stimulating expectorant? There is, no doubt, something in the cry. No pharmaceutical wail was heard when medicines were prescribed pro forma. And after all, it is not hard to resort with la quoque. Who but he runs lines of “lung tonics” and “liver mixtures”? Stock mixtures, of course, are not suitable treatment for the whole of a panel practice—if they were, diagnosis would be reduced to cases of “M.F.O.S.,” Mist. Pest. Stigm., and so on, but they are undoubtedly useful in the commoner sort of complaints. Each of us has his favourite prescription for certain ailments, and the fact that he writes it fresh for each case does not alter the principle in the least. We find some drugs useful for minor ailments in otherwise healthy people, and prescribe them just as we give the same treatment to two of them that does not in any way lessen its therapeutic value.

Myelitis after a Fright.

The occurrence of various functional forms of paralysis after experiencing some severe nervou
shock is well known to medical practitioners, but it is not so universally recognised that fright may act as an agent de plauteur, in the sense of French writers, of some grave organic lesion of the cerebrospinal nervous system. A case of acute myelitis following a struggle with hurglars, ending fatally, is described by Dr. William G. Spiller, (a) Professor of Neuropathology in the University of Pennsylvania. The patient was the proprietor of a restaurant, aged 47 years, married. He was violently assailed by three men at one o'clock one morning, but with assistance he succeeded in driving them off, not sustaining any physical injury himself, though he was greatly upset mentally. Two days after this event he found that he could not walk with difficulty, his legs feeling numb. Signs of motor paralysis supervened with ankle clonus and Babinski's reflex distinctly marked on each side. A rectal abscess developed extending into the abdomen and death occurred three weeks after the onset of the illness. At the post-mortem evidences of myelitis were found in the mid-lumbar region of the spinal cord. In this particular case fright to lesions of the nervous system, Dr. Spiller quotes the observations of Leyden, Todd and others, who have reported similar cases. The present case, however, may be regarded as one of myelitis following a peri-rectal infection, but it is not impossible that the fright which the man experienced increased his liability to the spinal lesion, for an acute neuritis of infective origin is a neurological rarity.

"Jaw-Winking" in Children.

Of the making, or rather recording, of new clinical signs there seems to be no end. Some of them are useful as diagnostic helps, such as "tracheal tugging" in cases of aortic aneurysm, while others are of a more academic interest and do not always indicate grave organic lesions. Among the latter group, perhaps, may be included the curious phenomenon described by Marcus Gunn, in 1883, as "jaw-winking," a good account of which has recently been given by Dr. E. A. Cockayne, of the Middlesex Hospital, in the British Journal of Children's Diseases. Briefly, the sign consists in the involuntary elevation of the upper lid while performing certain movements of the jaws, face, tongue or pharynx. More than seventy cases have been reported in the literature since its first description, and in sixty-sixty of these plosis was present in fifty-two. Some paresis of the superior rectus muscle is frequently present at the same time, and other nervous lesions, such as facial paralysis, so that the condition is regarded as being probably a special form of congenital plosis or ophthalmoplegia externa. In one case, that of a baby aged six months, described in detail the right eyelid went up and down as the infant sucked at the breast, and a slight plosis was present. The phenomenon has been stated to be due to a deficiency in the action of the part of the third nerve which supplies the motor fibres to the levator palpebræ superioris, direct innervation occurring from the fifth. Some observers are disposed to regard the condition as due to an exaggeration of normal associated movements. As a rule the habit of "jaw-winking" tends to disappear, only a few persisting into adult life.

Hydrogen Peroxide in Warfare.

Among the oxidising disinfectants in common use the peroxide of hydrogen, in its official form of liquor hydrogenii peroxidi, may rightly claim attention at the present time, when the question of wound treatment is so forcibly brought to the notice of the profession. It is reported from the front that peroxide of hydrogen (eau oxygénée) is one of the most reliable agents for the combating of gangrene resulting from wounds in the trenches, Angus Smith regarded this discovery as "the disinfectant of the future" and, if it has not actually succeeded to that high pinnacle of fame, it is largely due to the fact that the principle of antisepsis has been superseded by that of asepsis. Nevertheless, in the surgery of warfare occasions arise when antisepsis and disinfectants are urgently needed to combat the hosts of pathogenic bacteria which contribute so largely to the mortality from shot and shell. Being non-toxic and practically non-irritant, the peroxide is admirably adapted for the irrigation of infected or suppurating wounds, especially as it does not precipitate albumen. Provided that a free exit exist for the escape of the oxygen, which is so rapidly liberated when the peroxide comes into contact with organic material it is safe to use. The employment of this substance to which, it may be mentioned incidentally, sanitas owes most of its disinfectant properties. Its internal use in tetanus and pneumonia was recommended by the late Sir W. B. Richardson, but it does not seem to have found favour except as a local disinfectant. If it can be shown that the dreaded gangrene can be first fought by the aid of hydrogen peroxide, then large supplies will be needed by every medical officer in the field.

Infections of the Umbilicus.

Among the "vague regions of the body," the affections which receive but scant attention in medical text-books that of the umbilicus is by means the least important. Up to about the fifth day after birth the umbilical area requires as much care as any surgical wound, for it seems pretty certain that many infective conditions have their origin at this comparatively unguarded spot. In the practice of many midwives the navel is quite disregarded so long as there is no hemorrhage therefrom not caused by congestion. Dr. Raoul L. Vioran, of Chicago, calls attention in the Medical Record to several bacterial infections of this region which, in weakly or premature infants, may cause a good deal of trouble to the doctor and the nurse. Instead of the normal cicatrisation of the wound an exuberant granulation may persist, the so-called "umbilical fungus." This leson readily becomes septic, leading to the development of an actual omphalitis or peri-omphalitis which, in turn, may be productive of cyspalas, umbilical arteritis, phlebitis, hepatic abscess, or even supplicative periomphalitis. The importance of prophylaxis of such infections need hardly be mentioned, and it is evident that these occur in the practice of a well-trained midwife or maternity nurse. At the first sign of umbilical suppuration a weak antiseptic fluid should be used for bathing, while tincture of iodine, or the solid silver nitrate may be employed as local applications to any fungoid growth or ulcer, and should a general infection have supervened the so-called "umbilical fungus" may be given a trial. Warm fomentations of boracic acid alternating with antiseptic dusting powders are generally acceptable in all cases of localised umbilical infection.

Pemphigus Neonatorum in Midwifery Practice.

The occurrence of an epidemic of pemphigus among newly-born infants has many times been
traced to the practice of one particular midwife. First described as an independent affection by Oehme in 1773, it was frequently confused with congenital syphilis, but later its relationship with impetigo contagiosa became more evident. The exhaustive study of the disease by Richter leaves little doubt that pemphigus neonatorum is staphylocoecal in origin, the more malignant type of case being due to the presence of a streptococcus in addition. The identity, therefore, of this affection with impetigo contagiosa is admitted by most dermatologists at the present day. As carriers of the infection midwives have long been suspected, and in an epidemic that took place some few years ago in an American city one midwife confided to the fact that she had been "followed by the disease" in spite of all her efforts to rid herself of the infection. When she provided herself with a new dress and outfit the cases ceased to occur in her practice. The Medical Officer of Health for Birmingham, Dr. John Robertson, has lately called attention to this mode of spread in Public Health, and he states that no less than five outbreaks of pemphigus neonatorum have occurred in the practice of midwives of the city during the past eight years. Some of the outbreaks were of a virulent type, causing in one case five deaths out of thirteen children infected. It is noteworthy that all the epidemics are said to have occurred in the practice of untrained midwives. In an outbreak in Birmingham last summer fourteen cases were met with under one midwife. Dr. Robertson attributes the source of the infection to the apron or dress of the midwife, since the spread of the disease was arrested after disinfection of the clothing and the abolition of the powder-pel.

Belgian Doctors' Relief Fund.

We have pleasure in publishing the following preliminary list of subscriptions in response to our appeal for help to our suffering Belgian colleagues. In our next issue we hope to announce a substantial addition to the amount already contributed. Our Irish friends will be glad to learn that nearly £300 were subscribed at the meeting of the medical profession held at the Royal College of Physicians in Dublin conjointly with the Royal College of Surgeons. The amount thus collected is, we understand, to be distributed through the Medical Press and Circular. At the same time it may be noted that the object of the Committee appointed by the meeting was defined as that of "collecting subscriptions and distributing the money so collected towards the relief of the medical men of Belgium."

The following subscriptions have been received at the English Office:

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Dr. T. W. Watkins, M.D., Ch.B.Liverp., has been appointed Temporary Medical Officer of Health for the County of Dorset.

The following Surgeons have been promoted to the rank of Staff-Surgeon in His Majesty's Fleet,—T. Creaser, M.D., B.A., and H. M. Langdale.

The following members of the medical profession have been called to the Bar,—Dr. J. C. Macneill (Middle Temple), Dr. W. Collingridge (Gray's Inn).

Dr. David Sommerville, M.D., D.P.H., M.R.C.P., has been appointed Medical Officer of Health of Harrow, in succession to the late Dr. Fletcher Little.

Mr. G. Mitchell Winter, E.R.C.P.Lond., M.R.C.S.Eng., L.S.A., D.P.H., has been re-appointed Deputy-Mayor of Torquay for the sixth consecutive year.

The children of the King and Queen of the Belgians paid a visit of inspection last week to the Red Cross Hospital at Alton, Hants, where there are so wounded Belgian soldiers.

Dr. Walter Ramsden, M.D., B.Ch.Oxon., has been elected to the Johnston Chair of Biochemistry in the University of Liverpool, rendered vacant by the resignation of Professor Benjamin Moore.

Dr. A. Hyde Wear, M.B., B.I.H.Durh., D.P.H., Assistant School Medical Officer under the Newcastle-on-Tyne Education Committee, has been appointed Assistant Medical Officer of Health and Assistant School Medical Officer at South Shields.

A gold medal is to be presented by Mr. Henry S. Wellcome to Dr. Power to commemorate his directorship of the Wellcome Chemical Research Laboratories for 25 years. In addition, Mr. Wellcome is causing a life-size portrait of Dr. Power to be painted.

Dr. Henry Joseph Milligan, M.B., Ch.B.Glasg., D.P.H., formerly Assistant Medical Officer of Health and School Medical Inspector of the Borough, has been appointed Tuberculosis Officer and Deputy Medical Officer of Health for the Borough of Bootle.

It is announced that Professor Warrington Yorke and Dr. B. Blacklock, of the Liverpool School of Tropical Medicine, have left on a research expedition to Sierra Leone, and also to report upon a suitable site for the "Sir Alfred Jones" Laboratory of the School in Sierra Leone.

Dr. Aldo Castellani, Director of the Clinic for Tropical Diseases at Colombo, Ceylon, has been offered by the Italian Government, and has accepted, the Professorship of Tropical Medicine in the University of Naples and the Directorship of the Royal Clinic for Tropical Diseases in the same city. Dr. Castellani will take up his duties there at the beginning of 1915.
CLINICAL LECTURE

ON

THE KIDNEYS AND HEART IN PREGNANCY: WITH SPECIAL REFERENCE TO THE BLOOD PRESSURE CHANGES.

By V. J. McALLISTER, M.B., M.A.O, F.R.C.S.I.,
Extra Assistant Master, Gombe Hospital, Dublin,

The prognosis for the pregnancy as also for life is serious where the kidneys become diseased in a pregnant woman whose heart is also diseased. Heart lesions or kidney lesions do not usually make the prognosis grave unless very advanced. This is particularly true for uncomplicated valvular heart lesions in which even repeated pregnancies do not necessarily render a grave prognosis justifiable. What is it then that tends to make the combination of heart and kidney lesions so serious?

Before dealing with this question I thought it would be both helpful and instructive to consider briefly each of the following headings.

i. The influence of pregnancy on the normal circulatory system.

ii. The influence of pregnancy on a diseased circulatory system.

iii. The effect produced on the circulatory system of (a) the non-pregnant, (b) pregnant woman by the so-called pregnancy kidney.

iv. The influence of a diseased condition of the kidneys developing during pregnancy, on a previously diseased heart.

I will now deal with these headings in turn:

INFLUENCE OF PREGNANCY ON THE NORMAL CIRCULATORY SYSTEM.

In the later months of pregnancy the blood pressure often becomes slightly elevated. It has also been shown by Professor Juntz and others that the total blood volume is increased. The heart has therefore to deal with a larger quantity of blood. The peripheral resistance and the rate of the ventricular contractions undergo no compensatory diminution. Such a condition of affairs necessarily determines an increase in the work to be performed by the heart. Its activity becomes greater and as a result the left ventricle hypertrophies to a varying degree. The existence of this hypertrophy and increased activity have been confirmed by the electrocardiographic observations so carefully carried out by Rubner. Gradually but surely, from day to day, the heart becomes trained and strengthened to withstand the sudden strain to which it will be subjected during parturition. The view that where during pregnancy the heart shows signs of breaking down, this is due solely or even in chief part to some special pregnancy toxin cannot be true. Mechanical factors brought into existence by altered conditions of work must also play a very important part.

Of investigations dealing with the effects of pregnancy on the blood vessels there are but few. Pankow reporting the results of his inquiries in the Archives of Gynecology drew attention to the arterio-sclerotic changes occurring in the arteries of the uterus during pregnancy. The changes start in the outer coatings of the arteries and consist chiefly in a hypertrophy of the elastic fibres. The muscular layers of the larger arteries become hypertrophied. No one yet has brought forward work sufficiently complete to decide satisfactorily whether similar changes take place in the arteries of the body generally. Pregnancy may cure congenital hypoplasia of the vascular system.

Taking next the second heading:

THE INFLUENCE OF PREGNANCY ON AN ABNORMAL CIRCULATORY SYSTEM.

Chief amongst these abnormalities will be the various forms of heart lesions whether involving the valves, myocardium, or both together. In valvular lesions the changes induced by the additional complication of pregnancy will be merely a repetition of those processes by which compensation becomes established where valvular lesions exist uncomplicated by pregnancy. The heart muscle being unimpaired is still capable of very considerable hypertrophy. There is nothing unexpected in finding that in pregnancy also some valvular defects are more serious for the patient than others. Where the muscular tissue is the seat of the cardiac disease in pregnancy the gravity of the case is greater. It is, however, more difficult to gauge than in dealing with valvular lesions. A heart whose musculature is found post-mortem to be extensively diseased may have worked most admirably up to the time of death. The converse is undoubtedly also true that where post-mortem slight myocardial lesions were demonstrable, aut mortem evidence of such were prominent. It would seem as though the only trustworthy way to form anything approaching a definite opinion where the suspicion of myocardial disease exists, is to have the patient under prolonged observation under varying conditions of strain. Chronic myocarditis sometimes results from protracted septic poisoning. A history of such in connection with child-bearing or other circumstance would help to confirm suspicion in a doubtful case. Particularly difficult to judge from the point of view of prognosis are cases combining valvular disease with myocardial degeneration. Fortunately in the majority of cases in which valves and myocardium become simultaneously affected the latter eventually recovers, the former alone sustaining alterations that are permanent. In rather less than 1 per cent. of all heart lesions is the disease so grave as to cause breakdown or death during pregnancy and parturition. I have seen but one fatal case.

Concerning conditions in which the blood-vessels are diseased I will only mention that the strain of parturition is liable to determine the giving way of vessels whose walls are extensively weakened by syphilitic or other poisons.

Coming next to the heading which I mentioned third in order:
One of the most frequent kidney lesions met with in pregnancy—pyelitis—is of no special interest in this connection. It but seldom determines pathological change in the heart except when neglected, and then merely as would any other septic condition existing for a long time. The important kidney lesion from the point of view of this paper are those associated with increased pressure within the blood-vessels, those lesions which determine before long the exaggerated apex beat and ringing aortic second sound so characteristic of increase of arterial tension. In such cases the walls of the left ventricle have become hypertrophied. Much has been said and written as to the exact nature of the changes in the kidney tissue which cause the increased arterial tension. It would seem to be primarily determined by physiological changes in the functioning of the renal arterioles. Later develop the better understood and more obvious anatomical changes. However induced, the increased blood pressure plays a useful rôle in helping to excite against the exaggerated functional or anatomical renal resistance.

The changes that may develop in the kidneys during pregnancy are extremely varied. They may be of the most trivial nature—a mere catarrh of the epithelium lining the tubules, whilst in other cases there may be necrotic areas of considerable size. Daily examination of the urine of pregnant women will show that albuminuria exists in about 15 per cent. of cases. In a certain percentage of these the albumin is not of renal origin but comes from the mucous membrane of the bladder. In the later months of pregnancy the bladder wall is often greatly congested and extremely oedematous. It exudes a serous discharge which is seen in any content may be found. In only some 5 per cent. of cases is the albuminuria constant during the later months of pregnancy. As a rule the quantity of albumin is not large. Hyaline tube casts may also be met with. In about 1 per cent. of cases the quantity of albumin is really large. In such the daily excretion of urine is diminished, both granular and epithelial casts being also present. The clinical signs and symptoms are usually found to correspond in intensity to the degree and extensiveness of the renal changes. In the cases of slight intermittent albuminuria symptoms may be completely wanting and the albuminuria is only discovered in the course of a routine urine examination. Where, on the other hand, the quantity of albumin in the urine is large there is usually well marked oedema of face, hands, legs, vulva, etc., and the patient often presents in addition obvious evidence of toxemic poisoning in the form of severe headache, vomiting, abdominal pain, disturbance of vision, etc., with albuminuria quite comparable with epiileptic convulsions. One must assume that the mildest cases with intermittent albuminuria result from a fleeting functional disturbance of the renal epithelium. The term pregnancy kidney is applied to the kidney found associated with the type of albuminuria which is persistent during the last two or three months of pregnancy. Leyden it was who first accurately described the changes undergone by the kidney and emphasised the degenerative nature of these changes consisting as they do in cloudy swelling and fatty infiltration of the protoplasm of the epithelial cells in the glomeruli and convoluting tubules. The non-inflammatory toxic nature of these lesions renders it easier to understand the extremely rapid recovery which often takes place post partum in even the severest cases of albuminuria during pregnancy. Rarely are the changes determined by pregnancy itself. It is quite the exception for the kidney of pregnancy to become replaced by a permanent chronic parenchymatous or interstitial nephritis. Such an ending does, however, sometimes occur, and this is perhaps most likely to be the case where owing to rapidly succeeding pregnancies a kidney kidney has not sufficient power of recovery to resume its normal condition within the short interval separating the pregnancies. Rarely toxic cases recover rapidly post partum. Attempts are made to differentiate different groups of cases, but no sharp line of demarcation exists to divide any group absolutely from another. All grades of kidney disturbances are met with. Every attempt at classification into sharply defined clinical groups can only be unsatisfactory and unnatural. Intermediate conditions, transition forms, mixed or complex cases exist as links rendering all such strict classification misleading.

Dealing next with the behaviour of the blood pressure, the cases characterised by intermittent albuminuria exercise very little effect in this direction. They are seldom associated with any marked rise of blood pressure, and cause no hypertrophy of the left heart. A very considerable albuminuria may exist with a very slightly elevated blood pressure reading, both returning within physiological limits after a brief course of dietetic treatment. These, the mildest cases, pass insensibly into the cases presenting the picture of the acute pregnancy nephritis. Chloride elimination estimations will, to some extent, help to separate borderline cases. The chronic pregnancy kidney invariably causes the blood pressure to be markedly elevated. Indeed, characteristic for this condition is a marked elevation in the blood pressure, in conjunction with persistent albuminuria, both tending to increase as pregnancy advances. Casts will be numerous in the urinary sediment, and there will be extensive oedema of face, hands, legs, vulva, etc.

Very great importance should be attached to the significance which a marked rise in blood pressure existing for a considerable period would be likely to possess for the heart. From a practical point of view, a useful division can be made clinically into the cases which are favourably influenced by treatment, and those in which in spite of milk diet, rest in bed, purgatives, etc., the blood pressure continues to remain highly elevated, registering 200 mm. of Hg. or more, and the other signs also show no tendency to improve.

Where the blood pressure remains persistently high, one is led to the conclusion, from what general pathological teaches, that, in addition to the alterations in the cells of the renal parenchyma, changes have also taken place in the interstitial tissues. Anatomical observations do not support the idea of a primary structural alteration in the blood-vessels. It would rather seem as if at the beginning one had to deal with a diminished sensibility of the renal arterioles. Less urine is passed, and the excretion of chlorides is diminished. What is it causes this lowered
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of
view
of
prognosis
are
the
nature
and
duration
of
the
kidney
changes.
In
other
words,
how
long
has
the
heart
been
subjected
to
the
increased
strain
associated
with
the
renal
condition,
and
in
what
state
has
it
left
the
cardiac
muscle
fibres?

Briefly
restating
what
I
have
said
so
far:

Heart
lesions
or
kidney
lesions
complicating
pregnancy
comparatively
seldom
prove
fatal.
Occurring
in
together
their
association
with
pregnancy
is
usually
extremely
serious
in
its
consequences.

Pregnancy
determines
an
increased
cardiac
activity.
The
heart
slowly
hypertrophies
to
withstand
the
sudden
strain
of
parturition.
Its
accommodating
power
is
subjected
to
a
severe
test
at
this
time.
Such
a
test
will
be
more
serious
for
a
heart
that
is
diseased.

Experience
shows
that
the
gravest
cardiac
lesions
in
this
connection
are
those
affecting
the
cardiac
musculature.

Uncomplicated
valvular
lesions
do
not
in
the
large
majority
of
cases
endanger
either
the
preg-
nancy
or
the
mother's
life.
Even
successive
preg-
nancies,
if
separated
by
an
interval
of
some
years,
can
be
successfully
passed
through
without
aggra-
Vating
the
cardiac
condition.
In
the
case
of
muscular
lesions
a
pregnancy
may
or
may
not
have
serious
consequences.
The
result
will
be
in-
fluenced
by
the
attribution
of
the
muscle
changes,
the
length
of
time
they
have
been
present,
their
extent,
whether
they
involve
particularly
vital
areas
of
the
heart,
etc.

The
recognition
and
proper
appreciation
of
degenerative
changes
in
the
myocardium
demand
experience
and
careful
observation
in
conjunction
with
repeated
functional
testing.

Where
the
kidneys
are
diseased
the
behaviour
of
the
blood
pressure
is
of
great
importance.
Should
it
become
markedly
elevated
the
heart
will have greatly increased work to perform. After some weeks the walls of the left ventricle will be found hypertrophied.

The acute form of pregnancy kidney is not usually associated with much increase in blood pressure. The slight elevation met with rapidly responds to treatment.

The chronic form of pregnancy kidney is associated with a rise of blood pressure, which seldom exceeds 100 mm. of Hg. It is difficult, often impossible, to reduce the blood pressure in such to normal limits. Further, not improbably, to attempt to do so would be unwise. In some 6 per cent. to 8 per cent. of such cases eclampsia supervenes.

A fatal termination is more often determined in eclampsia by the intense strain to which the convulsions subject the heart than to the action of any special toxin.

At best difficult, it is often impossible, to distinguish between a case of chronic pregnancy kidney and one where the symptoms are the sequence of pregnancy supervening in a patient already the subject of chronic nephritis.

This difficulty is due to the existence of intermediate cases and transition forms which act as links between the various clinical types. No sharp line of demarcation exists. Anatomically to separate one group from another.

Cases of pregnancy kidney are met with in which treatment is unavailing in lowering the markedly raised blood pressure which has succeeded in attaining a level usually regarded as characteristic for chronic nephritis complicated by the patient becoming pregnant. Even an initially sound heart is liable to collapse when exposed for a number of weeks to a pressure within the circulatory system of 200 to 210 mm. of Hg. with the added strain of pregnancy.

Post partum, in the acute toxic cases, the blood pressure rapidly falls to normal limits. Where pregnancy supervenes in a patient whose kidneys are already chronically diseased, the blood pressure remains elevated post partum.

I cannot conclude my paper without specially referring, though necessarily very briefly, to eclampsia. I have already introduced the subject in connection with blood pressure readings and their possible significance. Comparatively little work dealing with the metabolic changes induced by the earlier stages of pregnancy kidney has been undertaken. The patients are usually not sufficiently ill to seek advice at the outpatient department of our maternity hospitals. Even when they do present themselves and are admitted, it is very difficult to keep them in hospital for any considerable time. In this way the opportunity of satisfactorily observing the changing picture of their disease in its earliest stages is seldom available. We do not see them until the more urgent and frightening symptoms of eclampsia a length compel them to seek advice. Especially amongst hospital patients one is not infrequently surprised with a history that absolutely no symptoms preceded the onset of the eclamptic convulsions. The patients believed themselves to be in most excellent health. At this late stage when convulsions have already become established one is no longer even certain how far the albumin, blood, casts, etc., present in the urine have resulted from the convulsions, and not from the original kidney lesions. I suppose we will eventually find that at least two if not more toxins are responsible for the eclamptic condition, and that not all of them, perhaps, have the same origin. One may be intestinal, another fatal, still another derived from autolytic changes in placental infarcts. Feilberg and Winter have particularly drawn attention to the placental lesions found associated with disease of the kidneys in pregnancy. They take the form of extensive intraplacental hemorrhages, white infarcts, hemorrhage behind placents and in the uterine wall. These changes are sometimes sufficiently extensive to bring about the death of the child, and its premature expulsion from the uterus. A possible causal relationship between such placental lesions and eclampsia has been advanced by several observers.

A very little experience convinces one of the difficulty in foretelling what patient will develop eclampsia and what patient will not. Some women would seem convolution-proof. Their urine is loaded with albumin, epithelial and granular casts are present in large numbers, their limbs, face, abdominal wall are extensively oedematous, the tension in their arteries greatly exceeds the normal, and yet they do not develop convulsions. With another group of patients just the converse is true, eclampsia developing with quite unexpected suddenness, and in spite of the apparently normal condition of their kidneys up to the time of onset of the first convulsions. The seasonal variation shown in the number of hospital cases and the severity of the disease amongst such cases is interesting and mysterious. Why robust, well-developed women should be more susceptible than those who are weakly and anaemic is also difficult to explain. Eclampsia is a disease of surprises. There still remains a great deal to learn about it, and the renal complications of pregnancy generally. The very complexity of the problems exercises a fascination.

NOTE.—A Clinical Lecture by a well-known teacher appears in each number of this Journal. The lecture for next week will be by Professor Quenu, Surgeon to the Cochir Hospital, Paris. Subject: "Early Symptoms and Diagnosis of Cancer of the Rectum."

ORIGINAL PAPERS.

BURNS OF THE EYE.

BY PROF. D. CANTONNET, M.D.
Ophthalmologist to the Paris Hospitals.

[SPECIALLY REPORTED FOR THIS JOURNAL.]

Burns of the eye may be produced by numerous caustic agents, among them flaming gases and caustic vapors. This very afternoon I saw a patient with a burn of the eye caused by acetic acid, which had spurted in the course of an examination of urine. The commonest and the worst burns are those caused by vitriol, though ammonium burns are by no means rare. Then come the liquid caustics, especially quicklime. Most are familiar with this action, and when one of them gets a little into his eye his comrades do their best to remove it without delay. Lastly, there are the solid caustics, e.g., nitrate of silver or sulphate of copper. One of the risks attending the use of a stick of lunar caustic in eye work is that it may drop into the conjunctival cul-de-sac. I therefore advise you never to use nitrate of silver in sticks, but to apply solutions (one per cent.).
When perforation takes place the aqueous humour escapes, the iris is drawn into the aperture (hernia of the iris) and obstructs vision, more or less completely, according to its seat and size. The prognosis is therefore very gloomy.

In presence of serous burns of the eyelids the first thing is to prevent dejection of the eye, so that as soon as we detect indications of commencing retraction the eyelids must be surer in order to protect the globe.

I shall show you directly a woman in our wards who was burned by a celluloid comb catching fire. In this case we partially surer the eyelids and so managed to save the eye.

In burns of the conjunctiva we must practice instillations thrice daily of an antiseptic solution: Collargol, for instance (gr. vi. in dr. iss., or iij. of water). Should adhesions form (symplepharon), an autoplast operation will be required later on.

The principal thing in burns of the cornea is to remove all trace of the caustic. You find yourself confronted by a person into whose eye some caustic—silver nitrate, vitriol or chemical caustic has found its way. He rushes into your surgery, or you find him rolling on the ground in agony. He may be surrounded by a number of well-wishing persons who have poured water on the outside—not a bad thing, but inefficient, because the great danger is inside the eyelids.

You must at once secure the patient's head, regardless of his screams and struggles, force the eyelids open with your fingers or by the aid of retractors (hairpins bent so as to serve the purpose), while an assistant pours water freely into the eye. It is idle to think of trying to neutralise the alkali or the acid as the case may be, because that means delay; your pressing duty is to wash it away mechanically at once. If the caustic be a powder, after getting rid of the greater part instil a few drops of a 3 or 4 per cent. solution of cocaine, and wash the eye out again and again, using a little cotton wound round a probe to cleanse the cul-de-sac. If the cornea be involved treat it as you would an ulcer of the cornea—viz., with atropeine.

Noguchi's success in growing the treponema pallidum in pure culture (d) made it possible for him to devise a cutaneous reaction (e) for the diagnosis of syphilis. This reaction is supposed to be of greatest value where the serum diagnosis is least efficient; therefore for its investigation it is important that its limitation should be determined as accurately as possible.

Serum diagnosis for syphilis is most reliable in the latter part of the primary and during the secondary stage. In the tertiary stage it is not so efficient. From this fact it is evident that additional aid in diagnosing tertiary lesions is desirable.

In the past the application of a cutaneous test for syphilis was not considered practical. This was due to the fact that a pure culture of treponema pallidum could not be obtained. Investigators (d) were forced to utilise syphilitic tissues richest in treponema pallidum to make
extracts. Such extracts could not be regarded as specific as they contained, in addition to the metabolic products of the germ, various tissue products which altered the reaction so as to destroy its specific nature, hence all work along this line proved unsatisfactory.

The luetin test, as devised by Noguchi, fulfills the requirements for a specific reaction. It consists of a pure extract of the luetic organism, and is capable of producing a specific reaction when injected into a luetic individual. The materials for the luetin test consist of a test emulsion of the dead treponema pallidum, and a control emulsion, which is made of the culture media without the organism. The emulsion of the treponema pallidum is called luetin. The two injections, test and control, are made intradermatically, a hypodermic syringe with a needle of small calibre being used.

The usual site selected for the injection is the antero-internal surface of the arm, the luetin being injected in one arm and the control at a corresponding site in the other. Observations are continued from twenty-four hours to three weeks.

In non-luetic cases with the exception of a slight erythema no reaction occurs. In luetic cases, the site of the control injection shows no reaction, while that of the test injection shows in forty-eight hours or longer a local inflammatory reaction. This appears first as an erythematous zone with a slight induration around the site of injection, later a papule or pustule may develop. Cultures from these cases in which pustules develop reveal sterile pus.

The reaction in normal individuals, if any occurs, is very slight. It is possible that an erythematous discoloration may appear, but this gradually recedes, and at the end of forty-eight hours usually disappears. In some cases, there may be a small papule formed at the site of injection, but this soon disappears, never leaving more than a slight discoloration.

In luetic individuals, three types of positive reaction occur:

First: Erythematous: A diffuse erythema with induration.

Second: Papular: A papule surrounded by an erythematous zone.

Third: Pustular: A pustule which may discharge or undergo absorption. This is a later stage of the papular type. In positive cases, there is also a type of reaction known as the latent form.

The reaction in positive cases usually begins to appear in twenty-four hours, gradually increasing in intensity up to seventy-two hours or longer, and then receding. In negative cases the reaction, if any occurs, reaches its height in twenty-four hours receding to about normal in forty-eight hours. In the latent type, for six days or longer apparently no reaction takes place; at the expiration of that time a slight itching and tingling sensation is perceived and the site of injection becomes inflamed, giving a positive test.

A study of the cutaneous test has been made as follows: Primary syphilis. Only a few cases of primary syphilis were tested. None reacted to the cutaneous test. However, the complement fixation test was positive in each case.

Secondary syphilis: The majority of the reactions were negative. Practically all cases that gave positive reactions were undergoing active treatment. In this stage it is observed that the complement fixation test gives a much higher percentage of positive reactions.

Tertiary Syphilis: The test was made on twenty-six cases of tertiary syphilis. All but four reacted positively.

Hereditary Syphilis: Only three cases were tested with positive results in all.

The following table shows the results of the luetin reaction in syphilis and other affections which we have been able to study:

<table>
<thead>
<tr>
<th>No.</th>
<th>Clinical Cases</th>
<th>Manifestations</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td>+</td>
</tr>
<tr>
<td>Primary</td>
<td>3</td>
<td>3</td>
</tr>
<tr>
<td>Secondary</td>
<td>19</td>
<td>10</td>
</tr>
<tr>
<td>Tertiary</td>
<td>26</td>
<td>16</td>
</tr>
<tr>
<td>Hereditary</td>
<td>3</td>
<td>2</td>
</tr>
<tr>
<td>Normal</td>
<td>12</td>
<td>0</td>
</tr>
</tbody>
</table>

Recently Treated | Not Recently Treated | Wassermann | Luetin
12 | 7 | 6   | 3 | 4 | 15
14 | 12 | 13   | 13 | 22 | 15
1 | 2 | 0   | 3 | 0   |
0 | 0 | 0   | 0 | 0   |

The following are cases on which the luetin reaction was made, but the Wassermann reaction could not be obtained.

<table>
<thead>
<tr>
<th>No.</th>
<th>Luetin Cases</th>
<th>+</th>
<th>-</th>
</tr>
</thead>
<tbody>
<tr>
<td>Melanochela</td>
<td>3</td>
<td>4</td>
<td>1</td>
</tr>
<tr>
<td>Dementia Precox</td>
<td>25</td>
<td>7</td>
<td>19</td>
</tr>
<tr>
<td>Terminal Dementia</td>
<td>19</td>
<td>6</td>
<td>13</td>
</tr>
<tr>
<td>Mania</td>
<td>56</td>
<td>7</td>
<td>49</td>
</tr>
<tr>
<td>Epilepsy</td>
<td>29</td>
<td>7</td>
<td>22</td>
</tr>
<tr>
<td>Pellagra</td>
<td>19</td>
<td>1</td>
<td>18</td>
</tr>
<tr>
<td>Intedlity</td>
<td>5</td>
<td>1</td>
<td>4</td>
</tr>
</tbody>
</table>

In all types of syphilis, it is observed that specific treatment tends to intensify the cutaneous reaction. For instance, a case of primary or secondary syphilis may react very mildly, or not at all, but if mercury or salvarsan is given, often after ten days or two weeks the site of injection will show signs of a latent reaction and eventually flare up, giving a strong positive test. This is also true in tertiary and latent syphilis. In a few cases of tertiary and hereditary syphilis the local reaction was very marked. Constitutional symptoms also were apparent, the temperature in one case reaching 103°, the patient complaining of headache. In a few instances both arms reacted, but the control reacted earlier, and not so intensely, receding to normal in a few days.

The cutaneous reaction is not constant in primary and secondary syphilis. It is most constant in hereditary and tertiary stages, and gives a more delicate response than the serum reaction to patients who are under treatment. It is important to be conservative in interpreting the cutaneous reaction. We must remember it is possible for a normal individual to react to a certain degree. This point should be considered and a careful comparison of control and test injections made.

As to the value of this test, experience seems to show that used in conjunction with the Wassermann reaction, it will prove a valuable aid in the diagnosis and treatment of syphilis.

In conclusion, I wish to thank Dr. W. W. Faison, of the State Hospital, Goldsboro, N.C., for his co-operation in the study of the reaction on inmates of this institution; also desire to thank Dr. Noguchi for so kindly furnishing luetin for this study.
THE PREVENTION OF DISCOMFORT AFTER OPERATIONS. (a)

BY ASLETT BALDWIN, F.R.C.S.

Senior Surgeon to the West London Hospital; Surgeon to St. Mark's Hospital.

GENTLEMEN.—My first duty is to give you my best thanks for the honour you have done me in electing me to be President of this Society. When I think of the long list of distinguished men who have preceded me in this office, I feel it will not be an easy task worthily to follow in their footsteps, but I can say it will be a great pleasure to do my best to justify the confidence you have placed in me.

The advent of anaesthesia has robbed surgery of its horrors at the time of operations, and the time of waiting and apprehension immediately preceding them is generally smoothed over by the preliminary injection of narcotics. Afterwards, however, there are many discomforts awaiting patients which are well worth our best efforts to minimise or prevent. Some time ago I had operated upon a lady for haemorrhoids, and on my inquiring if she had pain the first time the bowels acted, she replied there had not been any. The sister of the home told me afterwards that another surgeon's patient in the home described his experience on a similar occasion quite differently, he said 'it was like passing a hedgehog backwards.' It is popularly believed that a patient's experiences after an operation for haemorrhoids are necessarily very painful, and evidently, if the man's words I have just quoted are to be believed, they can be anything but pleasant, but I think the exercise of care in attending to certain details would have made his experience approximate to that of the lady. Inflammation caused by sepsis is, as we know, the greatest cause of pain and discomfort after operations, and the great triumph of modern surgery is its abolition in many parts of the body, but equal care is frequently not taken for the prevention of separation of adhesions, constipation, and fistula, etc. I hope I may be forgiven for entering somewhat into details, for they are all important in attaining the object we have in view. The rectum should be empty and clean at the time of operation, and no bowel contents should come down during its performance. The aperient should be given not later than the morning before operation, and must be one which will not lead to constant dribbling, as is often the case with saline aperients. Castor oil, or its pleasant form, "laxol," answers this requirement, and its after constipating effect is another advantage. On the evening before operation a soap and water enema is given. Four hours before operation the bowels is washed out with warm water till it returns quite clear. If the patient's bowels are usually relaxed, 15 minims of tincture of opium should be given after the soap and water enema has acted on the previous evening. An hour before the operation 1 gr. of morphine and 1/4 gr. sulphate of atropine is given hypodermically, or some similar drug; besides other advantages this lessens the amount of anaesthesia required, and so lessens the discomfort of vomiting afterwards. When the patient is under the anaesthetic, preferably ether, the rectum should be swabbed out with a non-poisonous antisepic, such as lysol, i. drn. to the pint of water, and irrigated with the same solution under low pressure. The retained fluid should be expressed by a hand on the lower abdomen, the bowel dried with flat gauze swabs, and tincture of iodine painted externally. The operation, therefore, is quite pleasant, and the patient is now to the antiseptic solution and dried. An antiseptic solution of chloroform is used; but chloroform is one I frequently use—is well dusted on to the operation area, and a drachm or two of sterile vaseline or eucalyptus vaseline is forced into the bowel from a collapsible tube. A rubber tube 3/4 inches long and ½ of an inch in diameter, is placed in the bowel, with about one inch left projecting, and the dressings applied. The tube allows flatus to escape easily, and so prevents discomfort; its presence also checks oozing, and if only a very small quantity of dressing is allowed to remain on the end of the tube it can be removed. The haemorrhage into the bowel will soon be apparent. Retention of urine will seldom follow the operation if these precautions are observed. If there is trouble with vomiting the patient is given copious drinks of bicarbonate of soda and water. As soon as possible solid food is given, but in reduced quantity. The patient should not be kept on slop diet until the bowels have acted, as is often done. This only leads to troublesome flatulent distension of the intestines, and should be given up as soon as possible. Milk particularly should be avoided, as it leads to the formation of gas and liquid stools, which cause pain when they are passed. If the tube causes discomfort after twenty-four hours it can be removed, otherwise it can be left. It is essential, if discomfort and pain are to be avoided, that the motions shall be kept quite soft. To ensure this about a tablespoonful of liquid paraffin is given by the mouth twice daily, commencing the second evening after operation. On the third or fourth morning the patient is given an ounce of castor oil by the mouth, and four ounces of warm olive oil are injected into the bowel through the tube if it is still in situ; the tube is then removed. Otherwise the oil is injected through a soft catheter. The oil should be held as long as is comfortable: it softens the motions and lubricates the bowel, and generally the result is a painless action. The oil injection, but reduced to one or two ounces, should be repeated daily as long as is necessary. After the first day the anus should be irrigated with a weak antiseptic solution twice daily. A commodie can be used when the bowels act, as a bed-pan causes much discomfort to many people. If skin tags or external piles have been cut away they should be anointed once or twice a day with eucalyptus ointment containing 10 per cent., of cycloform or similar non-poisonous antiseptic. If this is done shortly before the bowels act much discomfort is avoided. If after fistula operations a strip of lint spread over with the same ointment is laid along the tender skin edges much discomfort is avoided. Any tender surface of the wound can be made

(a) Presidential Address delivered at the West London Medical-Chirurgical Society.
comfortable by dusting it with a little cycloform or anaesthetis powder. The same result will be obtained in the deeper parts of the wound by soaking the wool used for the dressing in a saturated solution of chloroform.

The preliminary shock is a most important method of preventing discomfort after operation. A few months ago we had a female patient, aged 59, in this hospital, whose rectum and half the sigmoid colon I removed by abdomino-perineal excision for cancer. When she left the table her pulse was 82, and the next morning the house-surgeon got a number of men to guess what operation had been done. None of them guessed anything more severe than an operation for the cure of hernia. Another female patient, over 70 years of age, has been in the hospital quite well after the same operation for the same disease. I have not heard of this operation being successful at so great an age before. These results were obtained by nerve-blocking, so that shock impulses could not pass up to them from the operation area, which had been infiltrated with weak solutions of local anaesthetics before the incisions were made, "anoci-association," as it is called by Cricé, who has done so much to advance our knowledge of this method. In addition, subcutaneous infusion of normal saline solution through two hollow needles was carried on almost the whole time into each side of the thorax. The skin before incision is infiltrated with 1 per cent. of urea and quinine solution, and after the skin is incised the needle is passed through the left rectus muscle in order to infiltrate the extra-peritoneal tissue underlying it. The rectus is turned outwards and the abdomen opened. The cut edges of the peritoneum are then held in forceps and drawn forwards and outwards, and the extra-peritoneal tissues all round the wound are infiltrated with the same solution. If, after examination, it is decided to go on with the operation, the infiltration of saline solution into each side of the thorax is commenced. The mesentery of whatever bowel it is decided to remove is then infiltrated with novocain solution 1/2 to 1/3 per cent.; this is done right down to the bottom of the pelvis and between the bowel and the sacrum. The pelvic floor is then punctured with the needle on each side and the tissues infiltrated. When the abdominal portion of the operation is completed the area of the perineal incisions is infiltrated in the same way; care is taken that the solution reaches the nerves which supply the region as near their origin as possible. This method of the preliminary use of narcotics, combined with the blocking of nerves supplying the operation area, and the infiltration of that area with weak local anaesthetics, besides preventing shock, greatly lessens the amount of general anaesthetic required and therefore lessens the discomforts following its use. Of course, in many cases, no general anaesthetic is required at all. In addition, the damage caused by a general anaesthetic to important nerve, brain and cells of other vital organs is minimised or prevented. The feeling of well-being and comfort experienced by patients after undergoing quite important operations is truly remarkable. For a long operation on a weakly patient, when a general anaesthetic is required, the administration of nitrous oxide gas and oxygen by a skilled anaesthetist is most advantageous, as the damage to the important cells I have just mentioned is prevented.

Fear is an important factor in producing shock. This can to a great extent be avoided by shortening the time a patient has to wait, after the operation has once been decided upon, by not letting him see or hear any of the preparations for the event, and by letting the preparation of his own skin be as short and simple as possible. Fortunately, a preliminary painting with a solution of iodine often answers these requirements. It is also very essential that the patient does not pass restless, sleepless nights before "the day," and if such drugs as trional or acetyl-salicylic acid are not likely to ensure this, opium or morphan should be given. Fussy friends standing about the room or whispering in corners, or behind a half-open door, or with anxious or fearful faces should be banished from the patient's sphere. Inings, and an air of confident cheerfulness should prevail. After abdominal sections it is often impossible for the abdominal muscles to contract with sufficient force to enable intestinal gases to overcome the resistance of the sphincter, and much inconvenience results; it is often forgotten that this can be avoided to a great extent by inserting a flatus tube several times daily and leaving it in for an hour at a time. Thirst may be prevented by filling the abdomen by means of a funnel and a large bore needle with normal saline solution, or by keeping the temperature of 103°F. before the final closure of the peritoneum, and by giving half a pint by the rectum every three or four hours. Complaint is often made of dressings sticking to a wound. This can be prevented in clean wounds, after they have been painted with the iodine solution to prevent stitch abscesses, by laying over them about four layers of sterile white gauze, an inch wide and a little longer than the wound, and over them one layer of gauze projecting an inch all around which is then painted all over with collodion. When the collodion has dried, further dressings can be applied if desirable and the sensation of the dressing sticking to and pulling on the wound or the stitches will be avoided. The idea that a patient after an abdominal operation must for days be kept rigidly on the back has not yet disappeared; this position when maintained for several days causes much discomfort. The cases are few where it is necessary, and a large number of them may be allowed to lie on whichever side is the more comfortable. In many cases, particularly of peritonitis, the sitting position is essential; this, combined with the constant injection of saline solution either by the rectum or subcutaneously, has pulled many patients through who otherwise would have died. The troublesome intestinal perasis present is greatly helped by the hypodermic injection of pituitary extract and of saline of oesine in 1/5 of a grain doses, combined, if necessary, with hourly doses of 1 gr. of calomel. The planning of incisions so that abdominal muscles are split in the direction of their fibres, or turned aside without splitting, and their subsequent closure up to the drain tubes, where they are employed, by silkworm gut sutures, which are passed from the skin and can subsequently be removed, will prevent hernia, even in the majority of cases where drainage is used, and lifelong comfort or another operation will be avoided. Much discomfort and pain is often caused by the use of buried silk sutures, which, however, when inserted, are more or less always afterwards become infected by micro-organisms circulating in the blood, and lead to suppuration and sinuses which will not heal till the stitches are removed. I am...
convinced that this infection of the blood takes place much more frequently than many of us dream of, and that many apparently trivial conditions give small ulcers, such as an infected scratch or sore on the skin, a sore throat, an alveolar abscess or sinus. Buried sutures of catgut sterilised with iodine and hardened with formalin are much less likely to be followed by these troubles, but it should be remembered that these sutures soften in time and become absorbed. In patients whose powers of repair are at a low ebb, they should be reinforced with sutures of silk worm gut, and in the abdominal wall support should be given by strapping for weeks after the superficial stitches are removed, or the wound may burst open with serious consequences. Particularly is this to be feared in elderly patients suffering from malignant disease, also in babies when the abdomen has been opened, as for intussusception. It is still the practice with some surgeons to bandage the arm to the side after removal of the breast: this is quite unnecessary, and often leads to impaired movements of the limb for months afterwards, so that the patient cannot do her back hair, which is a serious discomfort. It can be entirely avoided by keeping the arm at right angles to the body, supported by a pillow, from the time she recovers from the anaesthetic; healing of the wound is not delayed if good support is given to the flaps by strapping applied over a good thick layer of cotton-wool. After the repair of a large abdominal hernia by the aid of a silver filigree, patients sometimes complain that they cannot straighten themselves upwards without producing an unpleasant dragging sensation in the scar. This, I think, is caused by the flexed position of the trunk assumed by patients during most of the time they are in bed after the operation, and can be avoided by either keeping the trunk flat or using several shorter filigrees from below downwards instead of one long one. Much discomfort after removal of part or the whole of the tongue can be avoided if care is taken to leave flaps of mucous membrane which can be sewn together by hardened catgut, so as to completely cover in the raw area, or by bringing the remaining half of the tongue round and suturing it over the raw surface. If the mouth has been rendered as airtight as possible previously by attending to defective teeth and gums, and due care is exercised afterwards in keeping the mouth clean and aseptic, the wounds will generally heal by practically first intention, and besides avoiding a tedious healing and its attendant risks, the stump of the tongue, if any has been left, will be quite movable and useful; speech and mastication will be much better than if the remains of the organ are bound down by cicatricial tissue.

I trust I have not wearied you by entering into some of these small details, but none know their importance better than this Society of medical men. Had it been customary to choose a verse from the scriptures as a text for this address, I think it would have been in the "Song of Songs," chapter ii, verse 15:

"Take us the foxes, the little foxes that spoil the vineyards."

SIR HENRY GREENWAY HOWSE, Kt., M.S., D.Sc., F.R.C.S., aged 72, of Tower House, Cudham, Kent, late President of the Royal College of Surgeons, left estate valued at £30,597.

OPERATING THEATRES.

ROWLAND GARDENS HOSPITAL FOR

OFFICERS.

THREE CASES OF DEFECTIVE WOUNDS.—MR. SWINFORD-EDWARDS operated on three cases all of which had been wounded about three weeks previously, and had been treated at the base hospital, and were all Belgian officers.

First Case.—The patient had received a bullet wound in the shoulder. An X-ray photograph had shown the bullet lying just below the head of the humerus over the bicipital groove. The healed scar about three inches long showed where the supposed bullet had been cut down to bone. However, according to the patient's account, even cut into the bone. As there was still pain about the shoulder with loss of power, Mr. Edwards had a stereoscopic X-ray photograph taken by Sir James McKenzie Davidson, which showed a round bullet lodged in the substance of the trapezius in the posterior axillary pole. A few days afterwards Mr. Edwards cut down upon this from the posterior aspect where the bullet could be easily felt. The operation was conducted under local anaesthesia (novocaine), and the bullet removed without any trouble.

The patient left the hospital in ten days' time perfectly restored to health and all disability and discomfort having practically gone. Mr. Edwards said that this case would not occur where ordinary X-ray photographs in cases of bullet wounds was not only often misleading, but in many cases positively harmful, for this patient had been submitted to a quite unnecessary operation, the scar having been mislaid by the X-ray photograph. Mr. Edwards had sent this particular photograph in question, which certainly seemed to show that the bullet was in the region of the original incision, and therefore lying on the anterior surface of the hump. The stereoscopic photograph clearly showed the bullet where it was eventually found. He said that in his experience this was by no means the only case where mistakes had been made when relying on the usual X-ray photographs. He would, therefore, advise that a stereoscopic view should be taken when it is desired to locate bullets or projectiles of any kind.

The second case was one of bullet wound of the left shoulder. The aperture of entry was situated over the middle of the left clavicle, and that of the exit just below the acromion process. The aperture of entrance was practically healed except for a small scab; that of exit showed an irregular wound an inch and a half long and half an inch wide. There was a raised depression with granulations which were up to the level of the skin, evidently due to callus about the clavicle, supra-clavicular fossa and acromion. A probe passed into the wound struck the lower part of some bare bone in more places than one. The stereoscopic X-ray photograph showed that the clavicle had been fractured, and the acromion process almost pounted into fragments, amongst which were many dark bodies, probably debris or casing of a bullet. Again, under local anaesthesia, Mr. Edwards enlarged the wound and removed several small fragments of bone and some four or five shreds of lead, the largest being about half an inch long and a quarter of an inch wide; this last was twisted. There was a little motion of the clavicle.

The wound three weeks after operation is perfectly healthy and almost healed. Before the operation the patient not only complained of pain all round the shoulder, but he was unable to lift his arm above his side owing to damage done to part of the brachial plexus in the transit of the bullet through the lower part of the posterior triangle. Movement is gradually returning under electrical treatment by Dr. MacDough.

The third case was that of a commandant with a severe bullet wound through the right wrist-joint. There was a large and ulcerated transverse wound over the palmar surface of the wrist corresponding with the side of the bullet, and also a wound over the dorsal aspect immediately opposite the palmar wound. The wounds were very septic and discharging
TRANSACTIONS OF SOCIETIES.  

MEDICAL SOCIETY OF LONDON.

Surgical Experiences of the Present War.  

[Specially Reported for this Journal.]  

At the ordinary meeting of the Society, held on Monday, November 16th, Sir John Blackburn Sutton, President, in the chair, a very interesting discussion was held on the "Surgical Experiences of the Present War."

Before the debate commenced, the President made sympathetic reference to the recent decease of a Past-President, Mr. Charles Barrett Lockwood, the well-known St. Bartholomew Hospital Surgeon and teacher. Mr. Lockwood was a Councillor, a zealous Secretary, and an able President. John Thistlethwaite, in his presidential address, "The Strain and Stress of Modern Surgery," had proved prophetic, for the wound which he himself received and which led to his death was inflicted during an operation. The Society had lost in him a devoted Fellow, and many had to mourn a warm-hearted, sympathetic and talented friend.

The debate was opened by Sir W. Watson Cheyne, Bart., F.R.S., who referred, in the first place, to the character of the wounds inflicted with metacarpal bone and phalanx of the little finger, which gave exit to a good deal of pus which had evidently tracked down from the original lesion. Free communication was established behind the palm of the patient was exposed, and several exposed fragments were removed, likewise loose and carious portions of the carpal bones of the first row, the semi-lunar coming away entire. An incision was made between the palmar and dorsal wounds, and a large drainage tube passed right through as it was felt that a further effort to save the hand should be made.

A week afterwards owing to daily hot antiseptic arm being in the hospital the patient is rapidly improving, and hopes are entertained that amputation, which looked almost urgent, would now be unnecessary.

Yet another, and there was considerable oedema of the right hand. All movement caused exquisite pain. There was a rise of temperature. Boracic fomentations were ordered. The patient improved for a couple of days, but then had a severe rigor, the temperature running up to 104°; the forearm was found to be swollen, and the lymphangitis running up to the axilla. A culture was taken of the discharge and the arm at once placed in an arm bath with 1 in 6,000 sublimate solution. The same time the course of solution of iodine was painted round the arm, forming a base just below the axilla. The patient was much better the following morning. During the next few days he received several injections of antiseptic vaccine, and still continued to improve under this treatment; so much so that at the end of a fortnight he was able to sit up for a short time on one or two occasions. A week after, however, he had another rigor and rise of temperature. The swelling in the forearm had gone down though the hand remained very swollen; both the palmar and dorsal wounds, although looking much healthier, were still discharging freely, although apparently there was no communication between the two. A probe passed into the dorsal and careful nursing the patient is rapidly improving, and hopes are entertained that amputation, which looked almost urgent, would now be unnecessary.

of bullet or shrapnel wounds in the Navy. In the case of the Army, on the other hand, a great proportion of the wounds were due to rifle fire, which passed through the tissues, leaving a hardly noticeable aperture of entrance and exit. These healed without special treatment. Army cases had, however, given evidence more of gangrene, and shrapnel wounds. Wounds too large to be scanned were due to large pieces which required serious consideration. The most noticeable feature of the present time, whether in land or sea fighting, was the great prevalence of sepsis. All the wounds which had been infected were infected with a toxigenic type of septic. The Army cases also had revealed some proportion of tetanus and gangrene. So far there had been no tetanos in naval cases, which was what would be expected, except for a few cases which were not soiled with earth. Nevertheless, all these cases were developing rapidly until they reached them at the base hospital. In some cases the sepsicity was not so severe as to threaten the patient's life, but it was always a potential danger. There were several reasons why all the wounds reaching them from the front were, more or less, in a septic condition. The most important reason was, perhaps, the length of time which elapsed between the infliction of the injury and the beginning of treatment. Conditions in both Army and Navy were unfavourable in this respect from those in civilian practice. In the case of the Army the wounded men were left lying where they fell, perhaps for many hours. Under the conditions of present warfare, with the use of shrapnel, missiles, and the battle lasting for a very long time, it would be madness, in many instances, to attempt to pick up the wounded during the engagement, in addition to which the movement of ambulance wagons about the field would give rise to infection from the enemy. When the wounded had been collected they had to be taken a considerable distance to the temporary hospital. In the case of the Navy the conditions were also very unfavourable to the immediate treatment of wounds. The surgeons on a battleship were locked below during an action, and the wounded must lie on deck where they fell until the fight was over. Not much could be done, either, on the hospital ship, destroyer, or cruiser, there being no wards, no dressing rooms, no wards for the wounded, and only rarely was a doctor stationed on a destroyer. The chances of rendering a wound aseptic were small after 24 hours, and practically nil after 48 hours. After that time he would not make any attempt to disinfect the wound. In spite of this disadvantage with regard to time, a large number of cases did come under treatment within a suitable time, and he judged that the septicity in these cases was largely due to the fact that antiseptics, which were used, were not used. They appeared to forget the ubiquity of bacteria, and the fact that their instruments, clothing, etc., might lose their sterility during the operations. It was a practice with soiled wounds such as occurred on the field of battle, many did not know how to proceed beyond painting the skin with iodine and covering the wound with a piece of gauze. Hence the results which Listler obtained with his antiseptics 50 years ago were not being met with to-day.

Speaking of wounds which could be treated within the first 24 hours, the speaker referred to the very rapid multiplication of the organisms. Each organism divided in half an hour; there would be fifteen millions of them at the end of twelve hours. Thus within the first 24 hours the fluids in the wound were already tending to actively growing bacteria. He laid it down that on the second day an attempt could be carried out within the first 24 hours, or in the case of wounds soiled with earth, 48 hours. An attempt should be made to kill the organisms which had entered the wound. Beyond that time the procedure was useless. The attempt could only be made by means of chemical antiseptics, and the agents used must be sufficiently potent to kill the spores under whatever circumstances they were found. Mercurial antisepsis, although they killed microbes, they were of no use
when the organisms were present in oil or albuminous substances. The choice remained between carbolic acid—used in the solution of carbolic acid—a in 0.5—would kill actively growing bacteria in a few seconds, but it would not kill the spores with certainty for 12 or 15 hours. If carbolic acid was to be employed, it had to be poured on the wound and must be used in the liquified form. For his own part, he preferred carbolic acid to iodine on certain practical grounds, although the antiseptic power of them was about equal. He would remind those who held up hydrogen peroxide, and who expressed the opinion that it must be used with more care than carbolic acid to infected wounds to read Lister's early work.

**Treatment.**—As to the treatment of wounds after more than 24 or 48 hours had elapsed, it would possibly be well to chip away any visibly soiled tissue, but no attempt should be made at general disinfection of the wound, which was a very harmful procedure at that period, especially if suppuration had begun. Even weak antiseptics should be avoided to a great extent. The chief antiseptic he would use was peroxide of hydrogen. As the wounds came to them at the base hospitals, they were not only septic but also imperfectly drained. The necessary operative measures to effect proper draining should be done once for all. The patient having been put into a horizontal position, the skin had been raised and disinfected, and if there was any gross dirt visible about the wound it should be clipped away, and the raw surface dabbed with liquid carbolic acid. The important point was to provide for the formation of a drainage discharge and to make it necessary to enlarge the original opening, or to provide fresh openings. At this stage it was not advisable to open up fresh wounds in the deeper tissues to hunt for foreign bodies. Similar methods of treatment were employed with as large drainage tubes as could be used. As to dressings, aseptic dressings were not only useless but injurious. The septic discharge soaked into them and decomposed there. Antiseptic dressings were not much better, especially in large wounds where not enough antiseptic was taken up to stop decomposition. To pile dressings on the wound was only to revert to an ancient procedure which had quite properly been abandoned. The matter of using only to lay a few layers of antiseptic gauze over the wound, and apply boric fomentations and change them frequently. If the missile was doing harm, being present in the main wound, or causing pressure, it should be removed. Not in the least was it to be supposed that a shell went a long distance from the main wound, became encapsulated, and did not harm. When traversing the tissues for some distance it appeared to shed its septic material.

Surgeon-General Sir Alfred Kenyon said he had nothing more to add to what had been said, but what everyone the Society decided upon would influence the methods to be adopted in the war, both in the hospitals and at the front. There were bound to be differences on the subject antiseptic methods, but the matter was of enormous importance to Army surgeons, who wanted to know what was the value of doses of anti-tetanic serum, as well as any advice on the treatment of wounds from the very beginning, such as could be made use of in the battlefield, and even in the trenches.

Sir Richard Godlee expressed his entire agreement with Sir Watson Cheyne's paper. In the course of a short time perhaps someone would re-discover the principles upon which Lord Lister had worked. It was very sad to find how very large a proportion of the wounds in the present war were septic. He concluded by quoting the passage in Psalm xxxvi., 5—"My wounds stink and are corrupt, because of my foolishness." Mr. Arthur Edmunds spoke of the wounds he had seen in two large naval hospitals, namely, Chatham and Decompton. The wounds were of medium severity, and the cases with trivial wounds were on the order of the Channel. There were sometimes severe wounds were not known at first, because the men tried to bear them. Such as one was a case of large comminuted fracture of the elbow-joint. In several cases there had been a really explosive action, in the head of the tibia and in the forearm, for instance. Most of the cases which came to Plymouth arrived in excellent condition, well fed and in general so magnificent a standard was maintained that there was little need but little treatment. He quoted excellent results in bad cases from swabbing out with pure carbolic acid. Often the removal of the bullet from the tissue was unnecessary. In some cases, though the bullet could be seen there was some pus around the bullet. In one case a shrapnel bullet was wedged between ribs, surrounded by quite a little cavity of pus; and if this were not removed there was danger of the pus seeping into the pericardium, and an extra-pleural abscess. A telephone probe proved a useful means of distinguishing between bone and a metallic fragment. When the bullets were in the thick parts he favoured removal when the patient was on the X-ray couch: it often saved massive laceration and trouble, and prevented two or three searchings. In two instances he had seen excellent results follow operations performed on hospital ships. One was a case of a great cavitation of the skull with hemiplegia, and the other an amputation for emphysematous gangrene, which had completely healed.

Sir Frederick Eve congratulated Sir Watson Cheyne on his address, and expressed his agreement with it. He had experience of the work done in the base hospitals in Germany and France, to do much fighting having been done in the trenches, wounds of the upper extremities, especially of the hands and shoulders, were very common. In one case a bullet had entered the neck, paraesophageal, very near to the trachea. These drugs were used, and the patient started, the trachea, and went out above the right shoulder without injuring any important structure except the recurrent laryngeal. He spoke of some concussion effects of shrapnel, one case showing evidence of extensive degeneration of the gray matter of the cord at the level of the segment which was struck by the splinter. In one case the left parieto-occipital region was entered by shrapnel bullets, and some spicules of bone were removed. French surgeons found that a traumatic hemiplegia developed, a stellate fracture was exposed, but no depression, and the dura mater was unjured. Nine weeks after the injury there was weakness of the right side of the face and of the right arm and leg, with total destruction of the sensory field. As there was no gross lesion of the cortex, it was very difficult to assume a damaging vibratory effect of the missile. He exhibited a sketography of an explosive fracture of the femur, which had been cut down to the bone at 50 yards range. These fractures healed readily. He agreed that it was not always necessary to remove the missile. Many penetrating wounds of joints had been satisfactorily treated by the insertion of a drainage tube and by irrigation. He had, however, seen many cases of chest wounds, been much impressed by the small amount of discomfort and disturbance caused by considerable effusion of blood into the pleura; in some cases the patients walked a considerable distance after receiving the injury. He had had only one case of tetanus, and that was in one of the few cases in which anti-tetanic serum was not given, because a shortage of the serum was feared. He was a great believer in the serum, both as a prophylactic and as a remedy.

Sir Watson Cheyne briefly replied, as he could not be present at the adjourned meeting. He thought the meeting very well carried small depositories containing either carbolic acid or iodine, to put into the wound at once and so stave off suppuration. There was a great variation in the degree of septicity of the wounds seen in the Western Front, but it was surprising how big, whether there was much of it or little, for in the latter case one never knew what it would grow to.

The debate was adjourned to November 28th.
ALCOHOL AND THE WAR.

The conference which took place at Caxton Hall, Westminster, on October 18th, under the chairmanship of the Archbishop of Canterbury, to consider the problem of "Alcohol in its Relation to the War," was in many ways unprecedented. Temperance has too often proved to be a cause of strife and controversy even among people who admittedly desire the well-being of the people. The war, however, has done much to break down the barrier, and few things are more significant than the way in which the leading statesmen and shades of opinion have been aroused to see the grave peril which faces the nation in connection with alcohol. The fact that one of the last, if not the last, appeal made by Lord Roberts was with reference to the subject of treating soldiers, and that he had intended to present at the conference forms a strong ground of appeal. The conference, which had been convened by the Bishop of Croydon, included a number of leading members of the medical profession, the selected speakers being representative of various interests in religious, political and social life. It had been decided by those who planned the conference that questions of legislation should not be discussed at the resolutions which were to be considered, important though they undoubtedly are, of the question undoubtedly is, and many of the speakers referred to it, but attention was confined to what may be called the social aspects of the problem, which, in a word, the conference considered to be of the greatest importance. Emphasis was therefore laid upon two lines of reform which are the counterpart of one another viz., a pledge of total abstinence for the duration of the war, and a determined effort to supply the wants of soldiers, sailors and civilians for suitable recreation and refreshment, apart from temptations to drink.

The Archbishop of Canterbury, as Chairman of the meeting, referred in some detail to the reports which had been received both from the fighting services in training and also among their dependents. He did not feel that the blame attached so much to those who had fallen into this temptation, but to those who had placed temptation in their way or who failed to hold out the helping hand to those who particularly needed help. He believed that the situation could best be met by the wide adoption of a pledge of total abstinence for the period of the war, a view he had already expressed in a letter to the Times. By this act of self-denial those at home could show their sympathy with those at the front.

The first resolution recognised that as a result of the war there was a grave increase of intemperance, and pledged the conference in the strongest terms to support Lord Kitchener's appeal on this matter.

The late Lord Roberts had signified his intention of being present, and had been invited to this resolution, but he wrote a letter explaining that as he was going to France to see the Indian troops he could not be present. His place was therefore taken by Sir Clifford Allbutt, who bore testimony to the good behaviour of the troops quarters at Cambridge; at the same time he fully recognised the importance of the matter and stated that science had made it clear that healthy people are as well or better without alcohol as with it. He appealed to the troops not included under the head of Darwinists, that the evil would settle itself when those who have cravings for alcohol have been eliminated. He pointed out that the present war was not so much one affecting individuals as communities. If we were to consider a strong community we must get rid of class distinction and seek to help one another, and especially the dependents of those who were serving their country in the more dangerous war; the houses had now been opened for many the only place of social gathering, and it was most important that counter attractions should be provided.

General Bourne, in seconding this resolution, fully corroborated the Archbishop's statement as to the dangers of the day in relation to alcohol, which he attributed to the fact that emotions were being ex

cited in the case of those leaving home to go to posts of peril and those who were left behind in distress and anxiety. He advocated further restrictions in the hours of opening public houses.

Sir Thomas Barlow then proposed the second resolution, which recommended the general adoption of the suggestion that people of all classes should join in a pledge of total abstinence during the continuance of the war. Seeing that the resolution proposed a pledge of total abstinence for men in the services and civilians at home, he dealt with a difficulty, in some as to the possibility of pure water being obtained by the troops, and he said that having carefully inquired into this subject he was assured that by the excellent sanitary system initiated by the Army Medical Department there would be no difficulty in this kind. He also alluded to the system of sterilising water by the use of chlorine of lime, advocated by Professor Sims Woodhead, which he considered to be satisfactory. After referring to the subject of sexual intemperance he considered that the most important one for the soldiers was an insidious one, and must be resolutely met by getting public authorities to do their duty by providing counter attractions and promoting a true sense of self-denial and, particularly by recommending the use of alcohol for the sake of others.

The Rev. J. Clifford, D.D., seconded the motion in an eloquent speech pointing out how many of the troops were already total abstainers, including a very large proportion of the Indian troops.

Major Leonard Darwin proposed the third resolution, which stated that "immediate steps should be taken in every locality to secure that proper provision is made for the supply of proper places of recreation and refreshment, both for men and for women, where there would be no temptations to drink," and also urged the carrying into effect by local authorities of the Temporary Restrictions Act, 1914. Speaking as an old soldier, he said that we must never forget that we are fighting the most stupendous war that has ever taken place, and there must be no loss of time during training which would be inevitably caused by drinking bouts, which not only affected the training, but unsustained his view. He suggested that drink was followed by worse consequences viz., immorality and disease accompanying it, which might lead to hospitals needed for the wounded being choked by cases of sexual disease. He urged that strong action should be taken to deal with this matter both by legislative and other means, and made a strong appeal for suitable means of recreation. He said that we had in the past been too harsh in judging ourselves vastly superior to our Russian allies; now we had to admit their great superiority in this matter of temperance during war time. He hoped that all would rise to the occasion and fight with all their power against every form of national intemperance.

A fourth resolution determined that a manifesto should be drawn up embodying the principal resolutions, and that this should be sent to the Lord Mayor and Mayors, urging them to take the lead in carrying out the proposals. The resolutions were carried unanimously.

CORRESPONDENCE.

FROM OUR SPECIAL CORRESPONDENTS AT HOME.

SCOTLAND.

WRONGED SOLDIERS IN EDINBURGH.

During the past week a number of trainloads of wounded have arrived in Edinburgh, and have been received in the military hospital at Craigleith, the
Infirmary, the Deaconess Hospital, Leith Hospital, and other institutions. It is a tribute to the efficiency of the British transport service that in some cases barely 48 hours elapses between a soldier's sustaining a wound in Flanders and his reception into the wards of the Royal Infirmary.

ST. ANDREW'S AMBULANCE ASSOCIATION.

Although this is primarily a civil Red Cross Association for time of peace, its operations are of value in time of war, and at the annual meeting of the Edinburgh Executive, with the M. J. Cotterill, F.R.C.S., who presided, gave some particulars of both these branches of work. During the past year 94 classes were held, and 1,743 persons passed examinations, receiving certificates, medals, and re-examination vouchers for the first year of their List. Though it buckled less in the public interest than the Red Cross, it should be remembered that the Scottish branch of the Red Cross had been originally organised by their Association, notably the late Secretary, Colonel Barnes. Under arrangement with the War Office, they had for a number of years maintained from members of their ambulance corps a body of men who acted as reserve personnel for the Scottish home military hospitals. On the outbreak of war, these were mobilised in 48 hours, and relieved the regular forces for service abroad. They had also mobilised 100 trained ambulance men for service at the front, had supplied orderlies to the various hospitals, and had been called upon at the disposal of the naval and military authorities. Financially, they had a credit balance of £853, and in view of the amount of work to be done they appealed for substantial contributions to increase this.

GRADUATION AT GLASGOW UNIVERSITY.

The usual graduation ceremony took place on the 14th of June at the Edinburgh Church, the Principal, Donald MacIntosh, M.A., and the Vice-Principal, H. S. Home, M.A., presiding. A considerable number of members of the Officers' Training Corps were present in uniform, and some of the graduates who were capped were in khaki, having joined Lord Kitchener's new army. Messrs. D. S. Ross, W. H. Clark, W. Macadam, J. W. M. McLean, J. B. Orr, and Wm. D. H. Stevenson graduated with honours, and Messrs. David R. Adams, Wm. B. Brownlie, and Albert W. Gregorson were congratulated.

ARRIVAL OF WOUNDED AT AYR.

The first party of wounded soldiers arriving at Ayr did so on the 14th inst., and were accommodated at Ayr Red Cross Hospital, better known locally as Carrick House. The party numbered seventeen (now followed by another batch) and consisted of wounded Belgian prisoners. These patients are mostly convalescent. The hospital is a comparatively small one, designed to relieve the Glasgow hospitals somewhat.

AUXILIARY HOSPITALS AND CONVALESCENT HOMES.

The distribution of wounded to auxiliary hospitals and convalescent homes in Scotland, which was under the charge of Major Tudor Craig and the Central Registry, has now been entrusted to the Scottish branch of the British Red Cross Society. The military authorities have also announced that wounded will only be sent to auxiliary hospitals and convalescent homes which have obtained the sanction of this Society through its Executive, and have been approved on examination by the military authorities. No grants are allowed by the military authorities for patients sent to convalescent homes. The Executive of the Society is prepared to consider applications from any recognised institutions, whether auxiliary hospitals or convalescent homes, for financial assistance.

DENTISTS AND THE ARMY.

A requisition has been presented to the Royal Faculty of Physicians and Surgeons of Glasgow by candidates for a qualification in dentistry, some of whom are anxious to serve in His Majesty's Forces. The Faculty is advised to hold a special dental examination in view of this request. In respect of this examination, the number of candidates will be limited to those who are qualified to sit for the final examination.

__LETTERS TO THE EDITOR.__

[We do not hold ourselves responsible for the opinions expressed by our Correspondents.]

THE OPHTHALMOSCOPE IN GENERAL AND MEDICAL PRACTICE.

To the Editor of The Medical Press and Circular.

Sir,—I have seen Dr. Hawthorne's contributions on the above subject from time to time in the medical press. Apparently it has not dawned on many teachers in medical schools how the use of the various "scopes" has become practicable in the houses of even the working classes through the general use of incandescent electric lighting. We should have had an increase in the disposal of the naval and military authorities. Financially, they had a credit balance of £853, and in view of the amount of work to be done they appealed for substantial contributions to increase this.

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I am, Sir, yours truly,

JAMES CAMERON, M.D., etc.

Edinburgh. November 18th, 1914.

__AN IMPROVED Tourniquet for Ambulance Work.__

To the Editor of The Medical Press and Circular.

Sir,—For some time past in connection with ambulance work, the need has been felt for a more efficient form of tourniquet than those in general use—i.e., the "India rubber" or the "pad and strap" varieties,
the drawbacks being, in the case of the former, the rubber soon perishes, and such appliances are therefore unreliable, also that when applied the circulation of the limb is completely restricted. In the case of the latter there are three distinct weaknesses—(1) when the tongue is removed the pad is pulled out of place, owing to pressure being exerted on one side of the "pad" or "block" only; (2) owing to the means to secure the appliance being a spiked buckle, some relaxation of the skin takes place, and it is difficult to remove or adjust; and (3) the strap being pierced by the buckle spikes, is weakened and soon wears out.

Messrs. James L. Hatrick and Co., of 70 St. John Street, Clerkenwell, have made for me a tourniquet which overcomes all these drawbacks, and possesses many other advantages which are absent in other tourniquets. It is known as the "Western," and consists of a pad, upon which can be made (or other similar material) which is affixed to a metal plate, one end of which forms an "eye," and the other an open hook. To the eye is permanently attached a special form of spikeless buckle, and a similar detachable buckle engages over the hook of the metal plate when the instrument is in use. Through

the two runs the strap of the tourniquet, which consists of two lengths of webbing placed one over the other and stitched across at frequent intervals, the ends of the webbing being thickened so that it cannot be detached from the buckles. To apply the tourniquet, the loose clip is removed from the hook, the block is placed in position, the strap is passed round the limb, the loose clip replaced over the hook, Pressure is then exerted on both ends of the strap, and the block is forced directly downwards, the strap automatically holding at the point of greatest pressure. To remove the tourniquet, the release tongues (marked) are pulled with an upward motion, when pressure is instantaneously relaxed. An additional lock is provided, for use only in cases in which a patient may have to be transported a considerable distance, and possibly loaded and unloaded en route. This is secured by inserting pencils (or anything similar) through the loops formed by the two lengths of webbing, and the strap is then passed through the clip when the tourniquet is in position. When this is done, the appliance is secured, even if the release tongues should be inadvertently pulled.

I am, Sir, yours truly,
J. M. Carvell, M.R.C.S.
32 Avnmore Road, West Kensington.

PROFESSIONAL WORK AND TRADING FIRMS. To the Editor of The Medical Press and Circular.

Sir,—You have frequently raised a voice in protest against the action of certain trading firms which, as a rule, undertake work for medical profession. We are properly that of members of the medical profession. It appears to me that when firms are carried on for the specific purpose of undertaking work of this sort the evil is even greater. I have just received a letter emanating from a London firm styled "The Wassermann Institute," whose business is to perform the Wassermann test on specimens of blood submitted by medical men. "We work exclusively for the medical profession," we are assured. The Institute is in such a flourishing condition, owing to its rapidly increasing "clientele of medical practitioners," that the fee for examination

is reduced from "the already low figure of 15s. per examination to 12s. 6d." It appears to me that the performance of the Wassermann test, like the operation of amputation, should be in the hands of qualified medical men.

The most interesting statement in the letter is to follow—"Our Institute is supervised by one of the most prominent specialists in venereal diseases in London." If this is so, even more voluntary help toward the investigation of this and similar cases?

I am, Sir, yours truly,
J. M. Carvell, M.R.C.S.

CLINICAL PATHOLOGIST.

CONTINUOUS ANTISEPST INHALATION. To the Editor of The Medical Press and Circular.

Sir,—I read with great interest your comments on some experiments carried out by Messrs. Kingsett and Woodcock on antiseptic inhalation (MEDICAL PRESS, November 4th). As early as 1890, to test the value of the germicidal properties of formaldehyde, I made similar experiments which were briefly reported at the London Tuberculosis Congress, 1901. And since that time I extended my observations on other antiseptic drugs, such as iodine, guaiacol, pine, terebene, etc. As you rightly say, cultural experiments have not much value in themselves unless supported by clinical experience. During the last fifteen years I have seen more than a thousand cases of pulmonary tuberculosis by antiseptic inhalations, and this long experience has made me a firm and enthusiastic believer in the efficacy of this method of treatment in preference to any others in vogue at the present day. In some cases of consumption continuous inhalation acts almost as a specific. If I had space I could give case after case which got well, even in the second and early third stages of the disease. The results of the inhalation treatment up till 1914 (which was embodied in my paper read at the annual meeting of the British Medical Association, 1913) have given us an average of 50 per cent of cases of recovery. Besides pulmonary tuberculosis, I have obtained good results in bronchiectasis, chronic bronchitis, asthma, etc. The inhalation acts as a charm in commencing colds and catarrh of the nose and throat. For the benefit of your readers who refer thereto herewith the formula of the solutions we use:

A.—Formaldehyde, 2½ per cent.; chloroform, 1 dr.; menthol, 10 gr.; ol. pini pumilin, 10 min.; sp. vin. rect. ad 1 oz.

B.—Formaldehyde, 5 per cent.; guaiacol, 1 dr.; chloroform, 2 dr.; menthol, 10 gr.; ol. pini pumilin, 15 min.; sp. vin. rect. ad 1 oz.

C.—Guaiacol, 2 dr.; terbene, 1 dr.; menthol, 15 gr.; ol. pini pumilin, 15 gr.; chloroform, 2 dr.; sp. vin. rect. ad 1 oz.

D.—Guaiacol, 2 dr.; iodine, 1 dr.; terbene, 1 dr.; ol. pini pumilin, 15 min.; chloroform, 2 dr.; sp. vin. rect. ad 1 oz.

N.B.—About ten drops to be sprinkled on the inhaler (which I have devised) about every half to one hour. As formalin contains more than 50 per cent. water, formaldehyde is conveyed into the inhaled gas in the form of gas itself (or more volatile) by the manufacturers, Messrs. Oppenheimier, Son and Co., London, who also supply the inhalers. Patients have here a choice of four pleasant mixtures. Beginning with A, they go on to B, C and D, and then return to B, C or D. The D solution is more often employed in cavity cases and for night use. Those who cannot tolerate A or B substitute C and D alternately. The value of the inhalation treatment depends upon the thorough permeation of the solution through the capillaries and the thorough delivery of air into the inhaler, and, most of all, upon its continuous use. Every patient that was cured carried out the treatment perseveringly day and night. Herein lies very largely the secret of its success.

I am, Sir, yours truly,
C. Mutton, M.D.

Meandip Hills Sanatorium, Wells, November 26th, 1914.
TEMPLE OF ÆSCHYLUS.

To the Editor Of The Medical Press and Circular.

SIR,—In thanking Dr. Caton for his reply to my letter, permit me to add that the inscription upon the tablet is in English as I gave it, and is consequently modern. What I sought information about was the source of the saying of Shakespeare, ‘Where marble rests, whether from a Temple of Apollo or from one of Æschylus. Looking to the hands through whom it came to me, I should consider it a genuine fragment of antiquity. I am obliged to Dr. Caton for his information and his opinion that “Temple of Æschylus” is probably correct, or at least that there was probably a temple of that deity at Cyrene.

I am, Sir, yours truly,

Glasgow, November 20th.

OBITUARY.

ANGUS MACNAB, M.B., Ch.B.EDIN., F.R.C.S.

We have learned with great regret of the death of Mr. Macnab, who was well-known and accomplished ophthalmic surgeon. He was a captain in the Territorial regiment of the London Scottish, he was attending to some wounded men during an engagement when he received a wound in the head, which was so severe, and while bending over a bivouac, a Bavarian Hun killed him with a bayonet. Macnab Macnab was unarmoured; moreover, as an eye witness has testified, he was consciousness a Red Cross member, and instantly fell, therefore he was a dead man, and was buried without any ceremony, and became another victim to that great German "culture," of which we hope the world will soon hear the end. Captain Macnab had a varied university career, having been a member of the universities of Edinburgh, Otago, Freiburg and Vienna. At the time of his death he held the appointment of ophthalmic surgeon to King Edward the Seventh's Hospital at Windsor. He was also a chief clinical assistant at the Royal London Ophthalmic Hospital, as well as a clinical assistant in the ophthalmic department at Charing Cross Hospital. Among his other accomplishments he possessed an intimate knowledge of the German language, becoming especially known for his mastery of the Bacteriology of the Eye. As late as September 24th last, a paper appeared by him in a contemporary. Thus his ophthalmology was lost a skilled surgeon, a man of high education and of the highest character to his adopted specialty had marked him out as destined to accomplish much useful work.

DR. BURNEY YEO.

We regret to announce the death of Dr. J. Burney Yeo, M.D., F.R.C.P.Lond., Emeritus Professor of Medicine at King's College, London, which took place suddenly on the 20th inst. a 2 Cadogan Place, S.W. The deceased was educated at King's College, London, qualifying M.B. Lond. in 1868. He became F.R.C.P.Lond. in 1874. He was identified with the medical staff of King's College Hospital and Medical School, in which he was Senior Medical Scholar, Resident Medical Tutor, and subsequently Physician, Fellow of the College and Consulting Physician. He was also attached to the Bromley Hospital for Consumption, where he held the office of Physician for ten years. Dr. Yeo was Consulting Physician to the Westminster General Dispensary and to the J. Low's Hospital for Seamen. His well-known text book "A Manual of Medical Treatises," in two volumes, only attained a new edition last year, and his work on "Food in Health and Disease" was equally as popular with students and practitioners. He was also a contributor to the medical journals of many interesting papers.

CAPT. CHARLES PAGET O'BRIEN BUTLER, R.A.M.C.

One of the most prominent men in the Royal Army Medical Corps was Captain O'Brien Butler, who has recently died of wounds received in action. He was educated in Dublin, and received the licences of the Royal College of Surgeons in Ireland in 1887, and in 1889 he commenced his student career and for some years afterward he was the best known amateur rider in Ireland. Few meetings passed at which he did not ride one or more winners. He rode also both in England and on the Continent. On going to India, he was appointed to the Indian Medical Service, and in this capacity he graduated to the position of chief inspector of medical services. He was a capable, industrious, high-minded practitioner. He leaves a young widow and three children, to whom the full sympathy of the community go out in their sorrow.

DR. PETER G. MORAN, TARA.

We have learned with great regret of the death of Dr. Peter Moran, of Tara, at the early age of 30. He contracted pneumonia ten days ago, and died after a few days' illness. Moran was a native of Co. Meath, and was educated at the Catholic University School, Dublin, taking his medical degrees at the Royal University in 1901. He served in the South African War as a Civil Surgeon. Some seven years ago he was elected to the position of Surgeon to the late Dr. Patrick Laflan. Moran was very successful in his practice. He was respected by everyone in his district, rich and poor, and he was held in deep affection by his medical colleagues. The death in medical and private circles has been an irreparable loss. Moran was a capable, industrious, high-minded practitioner. He leaves a young widow and three children, to whom the full sympathy of the community go out in their sorrow.

MEDICAL NEWS & PASS LISTS.

Belgian Medical Relief Fund—Meeting in Dublin.

An appeal by Professor Jacobs, of Brussels, on behalf of the medical profession of Belgium, having been received by the Royal Colleges of Physicians and Surgeons in Ireland, on the invitation of the President of the Colleges, a general meeting of the medical profession in Dublin was held in the Royal College of Physicians last Friday, to consider how best to support this appeal, and to extend to the medical men of Belgium the sympathy, the practical assistance, of their colleagues in this country.

The President of the Royal College of Physicians occupied the chair.

Dr. Emmet, Hon. Secretary, announced that he had received a number of letters expressing sympathy with the object of the meeting, and regret at the inability of the writers to attend.

The following resolution was proposed by the President of the Royal College of Surgeons, seconded by Dr. James Little, and carried unanimously:—"That this meeting, representative of the medical profession in Dublin, has beard with deep sorrow of the ruin in which the war has enveloped their colleagues—the medical men of the Kingdom of Belgium. While expressing to the Belgian doctors the heartfelt sympathy of the profession in Ireland, we desire to give them also our practical support and assistance in this time of national disaster." The Vice-President of the Royal College of Physicians proposed, and the Vice-President of the Royal College of Surgeons seconded, that the following should be appointed a committee, with power to add to their number, to carry out this task, and to collect subscriptions and distributing the money so collected towards the relief of the medical profession in Belgium:—The President Royal College of Physicians of Ireland, the President Royal College of Surgeons in Ireland the Vice-President R.C.P.I., the Vice-President R.C.S.I., Right Hon. M. F. Cox, M.D., Sir Charles B. Ball, Bart., Regius Professor of Surgery; Sir Charles Cameron, Secretary, and F.R.C.S.I.; Hon. F. R.C.P. L. Sir Arthur Cash, Bart., and Hon. F.R.C.P.I.; Denis Coffey, M.D., President University College, Dublin; J. Magee Finny, F.R.C.P.I.; Charles F. FitzGerald, F.R.C.P.I.; Sir...
Andrew Horne, F.R.C.P.I.; Sir John Lentaige, F.R.C.S.I.; James A. Lindsay, M.D., Professor of Medicine, Queen's University, Belfast; James Little, Regius Professor of Physic; Sir John Moore, F.R.C.P., Myles, F.R.C.S.I.; Richardson, D. Purefoy, F.R.C.S.I.; Walter G. Smith, M.D., President Royal Academy of Medicine; Sir Robert H. Woods, F.R.C.S.I.; William M.D. A. Wright, M.D.; Hon. Secretaries: T. Percy C. Kirkpatrick, Registrar, R.C.S.I.; C. M. Benson, Secretary to Council, R.C.S.I.

The resolution was carried. Subscriptions and promises amounting to nearly £200 were received at the meeting.

The Royal College of Surgeons of England.

The 30th annual meeting of the Royal College of Surgeons was held at the Guildhall on November 15th, Sir Watson Cheyne, Bart., C.B., the President, in the chair. Among the business it was pointed out that the attention of the Council had been directed to the desire of medical officers of health under the Local Government Board to secure "fixity of tenure" and some definite system of superannuation and pensions. The Council had been asked to support the undertaking which is now being made to bring this matter under the consideration of the Government. The President also referred to the National Insurance Act, and stated that much dissatisfaction has been felt by medical men with regard to the employment of non-qualified persons for the purpose of medical treatment in the latter protest has been sent to the National Health Insurance Commission on behalf of the College. It was announced that the number of the various diplomas issued by the College during the past collegiate year showed a marked increase upon that of the previous year.

The following resolution was moved by Sir Victor Horsley, seconded by Mr. George Jones, and carried:—

"That this thirtieth annual meeting of Fellows and members again affirms the desirability of admitting members to direct representation on the Council of the College, which, as now constituted, only represents these members who also hold the Fellowship; and that it does so in order that the constitution of the Council of the Royal College of Surgeons of England shall be in keeping with modern ideas of true representation."

Action against Governors of Rotunda Hospital.

In Nisi Prius Court No. last week, before the Lord Chief Justice and a city special jury, the trial concluded of the action Volki v. the Governors and the Guardians of the Rotunda Hospital. The action was brought by Mrs. Ethel Volki, the wife of an Austrian servant whose personal injuries which she alleged she sustained while being a paying patient in the Rotunda Hospital. She alleged that owing to the negligence of the defendants she was burned by an unbulbed and unprotected water jar, and, as a result, she suffered great pain, and incurred considerable expense. The defendants denied negligence, and contended that the injuries were caused by the plaintiff herself by removing a flatten covering from the jar.

The jury, after a lengthy consideration, failed to agree, and were discharged.

University of London.

The following have obtained honours in the third (M.B., B.S.) Examination:

R. A. Rowlands, distinguished in Medicine, London Hospital; D. H. D. Wooderson, B.Sc., distinguished in medicine, midwifery, and diseases of women, St. Bartholomew's.

University of Cambridge.

At a Congregation held on November 21st, the following degrees were conferred:

M.B., M. Roberts, Cajus (by proxy); C. MacKenzie, Emmanuel (by proxy).

M.B.—J. Deighton, Trinity (by proxy).

Society of Apothecaries of London.

The following candidates having passed the necessary examinations, have been granted the L.S.A. diploma of the Society, entering them to practise medicine, surgery and midwifery:—J. C. P. Bayley, W. Brown, C. H. Fischel, G. F. Malden, and H. R. Partridge.

Glasgow University.

At the graduation ceremony held last week, the following degrees were conferred:—


Army Medical Service.

The following have been appointed:—


A special hospital is being established in Paris for wounded Colonial soldiers, who are now scattered in various establishments. It is pointed out that these men, generally natives of Morocco or the borders of Naffta, are separated from the rest of our forces, who speak their language, and not knowing how to write to their friends in their own country, suffer loneliness and ennui, which may prove detrimental to their convalescence. We are requested to announce that all letters, telegrams, and other communications addressed for the British medical men and nurses attached to the various units in Serbia should be directly addressed to Nish and not to the Serbian Legation in London.
Polyloid Chondrofibroma of the Fallopian Tube, associated with Tubal Pregnancy.—Osterbridge (Amer. Jnl. Obst., lxx., 2) reports a case of this condition in a tube removed on account of an early tubal pregnancy. A small papillary growth was found extending filling the lumen, just protruding into the peritoneal area. Microscopically, the tumour showed a somewhat degenerated fibroma covered on the surface by tubal epithelium and containing extensive areas of interstitial haemorrhage, small areas of fatty degeneration, and an island of hyaline cartilage. No connection was found between the tumour and the tube wall, but there probably was a small pedicle. The growth appeared essentially a fibroma, and not an embryonic mixed tumour. It seemed quite possible that the tumour blocked the lumen of the tube near the uterine end and may have been the factor in the arrest of the ovum and consequent tubal pregnancy.

Cesarean Section necessitated by Pelvic Chondro-Sarcoma.—Nathan (Amer. Jnl. Obst., lxx., 2) reports a case in a woman, at 23. She was confined normally a year previously, and at the time of labour with her second pregnancy the pelvis was found obstructed by a polypoid growth projecting from the left side, which necessitated Cesarean section. Subsequently the tumour increased and was removed, and its nature was demonstrated, as typical hyaline cartilage. The growth was solid, irregularly rounded, encapsulated, and lobulated. Two months later there was a recurrence, which was removed twelve months after the first operation. The growth has since recurred with a more extensive area of attachment, and also enlarged more marked. The history of the case with the appearance of the growth is considered to justify the diagnosis of chondro-sarcoma.

Experimental Ligation of One Ureter.—Jones (Amer. Jnl. Obst., lxx., 3) reports the results of experimental ligation of the ureter performed fifty-two times in dogs, together with observations upon a case of probable ureteral obstruction by accident, and concluding from the results that during the first ten days after complete occlusion the gross changes are not marked. A slight hydronephrosis is practically the only lesion found. From the tenth to the sixtieth day there is a primary hydronephrosis with no general renal atrophy. After this the kidneys undergo one of two changes—they continue to enlarge, or they undergo atrophy. Prior to the 60th day there is some indication of this division, some kidneys showing shrinking, others becoming markedly cystic. More or less gross evidence of intra-renal infection is almost constant after the tenth day. If this is mild, general atrophy takes place; if severe, pyonephrosis with renal dialysis. The less the infection the more prompt and general the renal shrinking and fibrosis. All evidence points to hematogenous origin of infection. There is evidence that low ligations are more prone to be followed by atrophy than high ones. This is explained by the ureter dilating and so acting to reduce immediate pressure upon the kidney. Only rarely did the contents appear to be under pressure, and this was found usually within a few days after ligation, or later with considerable infection. The morbidity and mortality are not high; the low ligations give only very severe infection. Jones states that the ureter is probably injured in 1 to 3 per cent of all intra-peritoneal operations upon the female pelvic organs, and is more common in operations by the vaginal route. The symptoms of frequency are; irritation, clamping, kinking, infection, resorption, destruction of blood supply; and the results: infections, 15 per cent., fistula 24 per cent., hydrophobia 80 per cent., general renal atrophy under 20 per cent., toxemia very rare, amaurosis 1.6 per cent, no symptoms 21 per cent. The mortality of unilateral obstruction is 18 per cent. The ureteral catheter is the most important means of diagnosis. Intentional ligation may be indicated in irreparable injuries, and if no symptoms arise nothing further need be done.

Rupture of Corpus Luteum with Intra-Abdominal Haemorrhage.—Bookman (Amer. Jnl. Obst., lxx., 3) reports a case in which, following vomiting and symptoms of an attack of appendicitis, there were symptoms of internal bleeding, and upon opening the abdomen a large quantity of free blood was found; both tubes and the left ovary were normal, and the year later there was a distinct double nuchal Grasian follicle. He concludes that suddenly increased intra-abdominal pressure may rupture a forming corpus luteum, which may cause laceration and bleeding. Cases of haemorrhage due to this cause are frequently mistaken for ectopic pregnancy or appendicitis, and should be considered in cases having pelvic pain, signs of haemorrhage, and near the menstrual period. The treatment depends upon the severity of the symptoms.

Trumatic Endocarditis.—Webber (Boston Med. and Surg. Journ., October 1st, 1914) discusses the influence of traumatism in the production of endocarditis. Severe lesions of the heart are well known to follow external violence, but less injuries have been much overlooked. Webber records the case of a boy who received a blow on the chest as the result of a fall from a cart. The injury resulted in the separation of the upper epi-sphysis of the humerus, and only slight two months after the accident the boy complained of pain in the chest and was dizzy, but there were at that time no definite physical signs of cardiac abnormality. When seen again about three months later he felt well. The history serves to show that scars in the aortic area of the heart, and the boy presented the symptoms of chronic valvular disease of the semilunar valve of the aorta. There was no history of any disease to account for the endocarditis, and Webber believes that the scar might be an aetiological factor. Webber records several other such cases from the writings of other practitioners.

The Intraspinal Use of Salvarsanised Serum.—McClellan (Boston Med. and Surg. Journ., October 1st, 1914) records his experiments upon the treatment of cerebro-splinal syphilis by this method. In four cases under treatment with intravenous injections of salvarsan, mercurials inunctions, and the intraspinal use of salvarsanised serum, there has been observed improvement in the subjective and objective symptoms. With this improvement there has occurred a diminution in the cell count, the proteid content, and the strength of the Wassermann reaction in the cerebrospinal fluid. The Wassermann reaction in the blood remained unaffected up to the time the patients left hospital. Two cases of tubercles were relieved of subjective symptoms, and the number of cells in the cerebro-splinal fluid was reduced. A case of taboparesis showed no change in the laboratory findings. In one case of paresis showed marked improvement in the symptoms and in the laboratory findings. The Wassermann reaction in the cerebro-splinal fluid became negative. One case of paresis showed no improvement in either the symptoms or the laboratory findings, but grew progressively worse. The results in cerebro-splinal lines and tubercles in the small series of cases studied are encouraging, not only as regards the cessation of symptoms, but also in the laboratory find-
ings in the cerebro-spinal fluid. The results in parasites are either discouraging or problematical. The most marked improvement has occurred among laboratory findings, and in these there has been a relapse in those cases followed for several months. The improvement in mentality so far recorded may be but the result of remissions to which the disease is prone, and that remission may occur even if only apparent, warrants the use of the intraspous treatment in a disease otherwise hopeless.

Abscess of the Lung.—Scudder (Boston Med. and Surg. Journ., October 1st, 1914) records the experience at the Massachusetts General Hospital in the surgical treatment of abscess of the lung. This series of twenty-seven cases demonstrates, however, the difficulties and inefficacy of this treatment. Of the twenty-seven patients nine died and eighteen recovered, eleven of whom were practically well without either cough or sputum.

Functional Liver Tests.—Krumbaa (New York Med. Journ., October 10th, 1914) analyses for us the present status of the various tests in use for estimating the functional activity of the liver. He concludes the following conclusions. Although no satisfactory single test for the functional capacity of the liver has yet been accepted, the pholnetrachlorphthalin test of Rowntree promises the greatest value. The leucine and galactose tests, though they are very informative, cannot be applied to many non-liver cases to be considered trustworthy. The amount of urea in the blood or urine or its percentage to the total non-coagulable protein is totally untrustworthy in cases of cirrhosis or paralysis. Like the test for the fibrinogen and the lipase content of the blood, it may be of value in such obscure toxic conditions as phosphorous poisoning, or acute yellow atrophy, where the great mass of liver cells is simultaneously and deeply injured. The correlation of the increased permeability to methylene blue, positive Alderhald reaction, and diminished glycolytic activity of the blood serum, have also been described. The careful employment of one or more of these tests in the study of any given case of liver disease will unquestionably reveal facts of value. Further clinical and experimental work in this direction will probably furnish a diagnostic technic, the success of which can be gauged with that employed in diagnosis of the kidney.

MEDICAL WAR ITEMS.

Dr. Stattham, formerly of the Bristol Royal Infirmatory, contributes the following account of his experiences at the front to the Bristol Times and Mirror:—"In this job you do not see much of battle scenes. They are too big to grasp much of what goes on. The wounds are pretty horrid, and I did not think that I should hate it so much as I do. At one place we arrived at a little mildewed church, very poor and ruined looking, and took over from the regiment about 100 wounded. We had only three or four candles to light us. We dressed them and laid them out pretty comfortably on straw. I went on night duty at 12 p.m., until 4 a.m. I slept in a pew, and was called when necessary. It was not much sleep. All day I had the flickering light, groans and deaths, and finally lots of rats came out and ran about. I was quite glad when we got away from that place. The men seem to enjoy a bit of rest very much. The tents were quite safe and comfortable in their dugouts and trenches, which mostly have fancy names, such as Woodbine Villa and Whiteley's Store, etc. I have met Goodden here, but he is the only Bristol man I have come across. On the whole I am glad that I was able to get out so early and be through the 'Brest,' but it was very unpleasant while it lasted. The loss of sleep was terrible, and I fell asleep whilst riding on several occasions. Once I fell down in the road whilst marching, sound asleep. The thing that strikes me most out here is the unfailing cheerfulness of the British Tommy under all circumstances. Although the wounded are often terribly injured, they still laugh and joke and ask for a cigarette, and seem quite happy.

Dr. H. L. Sells, of Croydon, who is now working at a base hospital at Rouen, sends the following account to the West Surrey Observer. There is a case of tetanus, but the mortality is very high. Every shell wound now gets a dose of anti-toxin on the field as a prophylactic, so we hope to reduce the number. In the following letter there is a very strong amino acid in the field ambulance, but I barely get sepsis, or at least only slightly; but if he has not it is a dead certainty that his wound is septic.

The vast number of horseshoe abscesses, which fill in papers to sign and initial, and case sheets, is appalling. It makes one think that Army forms come first and patients afterwards.

A good account of his experiences at the front is contributed to the Dundee Courrier by Lieut. Robert Cecil Dickson, R.A.M.C., of Dundee:—"Our hospital at present is a large Roman Catholic seminary for teaching boys for the priesthood. There are cubicles which makes it possible to shift our patients from the dormitory to the wards. We can soon fit up various big rooms for a dispensary, a store, an office, an operating theatre, and an officers' mess. You would be surprised how quickly these places take on the appearance of having been used for their present purposes for years.

"Our function is clearing, that is to say, we receive wounded in batches from the field ambulances. There are convey of 5 and 10 of these wagons, all painted the same colour, and with a red cross on their sides and one on the top, so that aeroplanes of the enemy may have a little consideration. They occasionally look at them with a blind eye, I am afraid. We dress and treat medicinally all cases admitted at once, and there is often a fearful rush. Then we get word from headquarters to clear. That means that a hospital train has arrived, and that we must get all our train cases down to it. This we do by putting them in the ambulance waggon in the few cases or so in one night, dress them all, and clear them out next morning. We get as much surgery to do in 24 hours as the average medicos will do in a lifetime. The experience is invaluable, but rather too much at a time."

"The hospital trains leave for the ports, and the cases are then shipped to Britain by hospital ships. The organisation of the R.A.M.C. is perfect, and we can cope with a tremendous rush of patients. Taking all the units together, there are six clear hospitals, all scattered here and there at suitable points, behind the firing line."

The British Ambulance Committee of the French Red Cross are glad to announce that their appeal for help for the French wounded has met with a most generous response, no less than £6,000 being received in five days.

By the kindness of Lady Wimborne, the committee will now work from Wimborne House, Arlington Street, where all communications should be addressed to the hom. secretary, Mr. B. Peyman, or Mrs. Cecil Bar.

Thirty cars can now be despatched in ten days to France, and more than fifty further offers of complete cars have been received. The maintenance expenses of these are very heavy, and it is hoped further funds will be immediately forthcoming, so that these valuable offers may not be lost to the French troops. A subscription list up to Monday night has been issued.

NOTICES TO CORRESPONDENTS, &c.

Correspondents requiring a reply to this column are particularly requested to make use of a distinctive signature or initial, and to avoid the practice of signing themselves 'Reader,' 'Subscriber,' 'Friend of the Reader,' etc. Much confusion will be spared by attention to this rule.
and their Lessons. Illustrated by eastern slides. Invited.

ROYAL SOCIETY OF MEDICINE (SECTION OF PATHOLOGY) (Pathological Department, St. Bartholomew's Hospital, E.C.;)—8.30 p.m.; Dr. Lazarus Baron. The Effect of Radiation on Different Cells. Mr. S. G. Shik and Dr. I. S. Dudgeon. Cytology. Mr. R. McKenzie-Wallis: The Palmarimetric Method for Estimating Protective Ferments in the Blood.

Vacancies.

West Riding of the County of York.—Staithes Hall Asylum, Kirkbenton, near Huddersfield.—Assistant Medical Officer. Salary £230 per annum, with further allowance. Applications to the Medical Superintendent.

University of London.—University Chair of Physiology. Salary £600 a year. Applications to the Academic Registrar, University of London, South Kensington, N.W. Manchester General Infirmary.—Assistant Medical Officer. Salary £150 per annum, with residence, board, and laundry. Applications to the Secretary.

City of Birmingham.—Assistant Medical Officer of Health. Salary £300 per annum. Applications to the Medical Officer of Health, 110 Small Heath, Birmingham.

County and City Asylum, Poyew, near Worcester.—Junior Assistant Medical Officer. Salary £250 per annum, with board, lodging, and washing. Applications to the Secretary.

Bromley, Kent.—St. Mary's Hospital, Bromley, Stratford, E.—Senior House Physician. Salary £120 per annum, with board, residence, and washing. Applications to the Secretary.

Appointments.


PHILLIPS, C. G. J., L.R.C.P., M.R.C.S., Acting Surgeon under the Factory and Workshop Acts for Woburn Sands District of the County of Bedford, in the Polyclinic at the Johns Hopkins Hospital, Baltimore, the Chair of Biochemistry in the University of Liverpool.

NEWTON, CHARLES, M.D., L.R.C.P., Temporary Medical Officer of Health for the County of Dorset.

BIRTHS.

FRASER.—On November 15th, at 28 Belzane Avenue, Hampstead, the wife of Dr. H. Hammond Fraser, of a son (Roderick Andrew).

FITZSIMONS.—On November 21st, at 31 Grosvenor Street, W., the wife of Mr. S. J. Fitzsimons, F.R.C.S., Capt., R.A.M.C., of a son.

GREGOON.—On November 8th, at Witham Lodge, Stratford, E.—Mrs. J. G. Gregoon, of a daughter.

LAMKIN.—On November 14th, at Guildford, the wife of Cecil Thomas, M.R.C.S., L. C. G., of a daughter.


MARRIAGES.

BROWN.—SIMPSON.—On November 15th, at 16 Belmore Avenue, South Australian, Gilbert Brown, M.B., Ch.B., of W. D. Brown, of Raby Street, Woburn Sands, E.—Mr. W. D. Brown, of Raby Street, Woburn Sands, E.—Mr. B. J. Cox, of Raby Street, Woburn Sands, E.—Mr. B. J. Cox.

CUSHMAN.—On November 20th, at St. George's Church, M.B., of Penicillin, Manchester, to Eleanor Hope Phillips, youngest daughter of the late Admiral H. B. Phillips and Mrs. Phillips, of Torquay.

STEVENS—CLOUTMAN.—On November 14th, at St. Mary's Redcliffe, Bristol, by the Rev. J. N. Bute, Canon of Christ Church, M.B., of Penicillin, Manchester, to Eleanor Hope Phillips, youngest daughter of the late Admiral H. B. Phillips and Mrs. Phillips, of Torquay.

DEATHS.


EVATT.—On November 18th, killed in action in France, Captain George Havelock Kerr Evatt, 1st Battalion Middlesex Regt. (27th Division), aged 26 years, to his father, Mr. R. M. Croft, M.D., C.B., Army Medical Staff, and Mrs. Evatt, of Wavertree, Liverpool.

MORAY.—On November 18th, at his residence, Beech Dunney, Teithland, Inverness (of pneumonia), Peter G. Morgan, M.B., F.R.C.S., eldest son of Mr. and Mrs. John Couch, Bathgate, West Lothian. Deeply regretted by his sorrowing widow and children. AGL

REID.—On November 13th, at Auchterlon Road, Blackburn, Andrew Reid, M.B., Ch.B. Glasgow, aged 35.

SCROPE.—On November 20th, at 36 Larchfield Avenue, University Park Estate, S.W., shortly before willowed of Winifred Helen Yeo.
This week we publish a list of contributions in aid of the Belgian Medical Relief Fund. The "provisional" committee has now been considerably enlarged and extended, and is now fairly representative of the medical profession of the United Kingdom. The committee has published a statement recognising the dual object of their organisation, first, to meet the requirements of the Belgian colleges and to the pharmacists in their dire distress, and, secondly, to help at some later period to reinstate them in their practices and places of business. The aims of the committee must commend themselves to every medical man in the Kingdom. At the same time it may perhaps be permitted to criticise the methods, so far as they are announced, for amounting to a common object, namely, the relief of our Belgian friends in the dire ruin and disaster with which they have been overwhelmed. It is announced that 2,000 packages of drugs have been ordered at £5 each, and some of these are to be sent to Belgium as a tentative measure. This hardly seems the kind of help that is wanted. The cost of the consignment would be £100,000, a sum that may or may not be raised by the committee, but we venture to suggest that a note apiece to the 1,000 destitute medical men and the 500 pharmacists in a similar plight would be of more direct and immediate service. The committee, however, has doubtless discussed the matter carefully before coming to a decision, and there may be various substantial reasons which do not appear on the surface, but which, it may be hoped, will be set forth at an early date for the information of contributors.

Five pounds in cash does not avail. The Finance of much for a starving professional man. Five pounds' worth of drugs is a still more embarrassing gift. To give each destitute medical man and pharmacist, say, £100 apiece would cost £30,000. Does the committee hope to raise this amount, which is in itself inadequate, in our opinion, to meet the requirements of the case? It would be of little avail to give a few five-pound notes here and there and leave the main bulk of the destitute Belgian doctors and pharmacists unrelieved. To be effectual the committee will have to raise, probably, at least £100,000, that is to say, if our colleagues are to be put in a position "pour recommencer la vie." Yet £100,000 would provide only a trifle over £66 per head, an amount that is clearly insufficient to provide even the humblest of professional and living quarters, for both enter into the question. The more the matter is discussed, indeed, the more evident it becomes that the private philanthropy of the medical profession of the United Kingdom, even when reinforced by the inexhaustible kindness of our lay population, cannot hope to afford adequate monetary aid to the Belgian doctors and pharmacists.

The only practical alternative, so far as we can see, to private benevolence - a Government Loan. When the letter of appeal from Prof. Jacobs, of Brussels, was published in our issue of November 11th, we advanced the view that the only way of satisfying the needs of the case was to obtain a grant from the British Government of £1,000,000 or £2,000,000. It is to be hoped that this London committee, the amended constitution of which is broad enough to ensure wisdom of counsel, will carefully consider the advisability of urging such a grant from Mr. Asquith's Government as advocated in our columns of November 18th. It may again be pointed out that such a grant would not be regarded as a gift, but as a temporary measure, by no means final, to aid in relieving the Belgian sufferers. To set forth the Lord Chancellor's scheme, providing £500 at four or five per cent. interest to any destitute Belgian medical man or pharmacist for the express purpose of setting him up again in life. The investment would be absolutely wise and sound, for as the British Government has already done for the Belgians, so we may be enabled to assist the possibilities of Belgium for some time to come, the reinstitution of the medical service of the nation could hardly fail on health grounds to be a precautionary investment of incalculable value. We suggest an immediate and influential representative deputation upon the subject to Mr. Asquith, to set forth the case of the destitute Belgian medical men and pharmacists, and to ask for a Government loan sufficiently large to afford them instant and adequate relief. The deputation would naturally draw attention to the economic and political advantages of the proposed grant, that is to say, apart from its philanthropic aspects.

The State and Tuberculosis. One of the great features of the National Insurance Act was the inauguration of an attempt on the part of the State to deal with human tuberculosis. A vast undertaking of that kind is obviously not to be accomplished off-hand, and much more wisely will run beneath London Bridge before this organised campaign will have attained its object. At the same time, it must be admitted that accommodation has been provided for a great proportion of consumptives, who are thereby not only given a chance of recovery but also represent so many centres of infection removed from contact with unaffected persons. After the lapse of a few years, when the preventive machinery of the Act has attained a fuller development, we may anticipate a still more rapid diminution in the tuberculosis returns than that which has been happily registered in recent years. A full control of the disease will probably be secured only when rigid prevention is extended to milk and meat and other foodstuffs known to be capable of conveying the active virus of consumption. In point of fact, the arm of administrative prevention still lags far behind that of scientific knowledge.
For all that, it behoves the medical profession to appreciate the value of the preventive measures which have been so far established. To take a current illustration of work in that direction under the Insurance Act, a recent report showed that of 263 applications for sanatorium treatment made to the County Insurance Committee of Preston no fewer than 152 were from persons who hitherto previously had been granted any form of treatment. These figures bear eloquent testimony to the value of Mr. Lloyd George's Act.

It is interesting to note the information given as to the occupations. Incidence, followed by the 152 patients whose disease had not been previously averted.

Occupation Schedule.

Veronal and the Poisons.

It is not so long ago that a famous medico-legal case at Brighton drew public attention to the dangers of veronal. Nothing has been done since, however, to restrict the sale of that highly dangerous drug, shown by a more recent case at Margate, where a widow died of an overdose of veronal, of which she appears to have had no difficulty in purchasing as much as she wished. It was stated in evidence that the drug was bought in bottles to which was affixed a "poison" label, so that persons stating that the dose was to be ordered by a physician. That these precautions are inadequate is proved by the constant recurrence of deaths from self-administration of the drug. It is not clear why veronal is not placed on the schedule of poisons. The authorities must have had their attention drawn to the numerous deaths arising from the cause. The slovenly of official action in such matters, however, must not lead the impertinent enquirer to imagine veronal will never be scheduled. Take the case of carbolic acid which for years headed the returns of deaths from poisoning, but has now been placed under certain restrictions. The whole subject of the sale of dangerous drugs demands careful investigation and Governmental action. As a matter of sober fact, it is far easier for the man in the street to buy some deadly poisons than it would be to procure dynamite or other high explosives.

LEADING ARTICLES.

The Medical Roll of Honour. Bulwork when she was blown up last week.—Fleet-Surgeon Percival K. Nix, M.B., B.A.; Surgeon William Miller, and Surgeon Robert T. Brotchie, R.N.V.R. The following casualties among officers of the Royal Army Medical Corps have been reported since our last issue:—Officer killed: Major E. B. Steel, R.A.M.C. Officer wounded: Captain C. J. Coppinger, R.A.M.C. Officers previously reported missing now reported prisoners of war: Lieut. J. L. Jackson, R.A.M.C., and Lieut. H. G. Winter, R.A.M.C. Officer previously officially reported wounded and missing, now unofficially reported prisoner of war: Capt. A. M. Robertson, R.A.M.C. Officer missing: Captain H. G. Robertson, R.A.M.C.

THE PRESIDENTIAL ADDRESS AT THE GENERAL MEDICAL COUNCIL.

The hundredth session of the General Medical Council was duly opened on November 24th by an address from the President, Sir Donald MacAlister. Such an occasion, it was remarked, might in ordinary times have invited an historical review of the work of the Council. For the time being, however, the war has imposed many additional duties and responsibilities in connection with the civil as well as the naval and military services of the country. For the time being the Council has lost the services of Mr. N. C. King, the General Registrar, who is now at the front on active service with the rank of Major. Mention was made of the
new British Pharmacopœia, 1914, the publication of which was delayed for three months owing to the advent of the war. In the meantime, the issue of advance copies afforded the Special Committee an opportunity of revising the text. The President described in clear and simple words the delicate duty discharged by the Council in relation to the admission of candidates to medical qualification for war service under modified conditions. In order to meet the sudden demands of the Army and Navy medical services in the face of a huge war it became at once evident that a large increase of qualified men would be necessary. After due consideration and correspondence, the Council appear to have left the matter of ultimate decision largely in the hands of the qualifying bodies, on the understanding, however, that certain broad principles would be adopted as a basis of such modification. In a circular addressed to the licensing bodies the Council pointed out that it was their statutory duty to maintain a good standard of proficiency in candidates. To that end the Council had issued formal recommendations, which were embodied in the Regulations of the various licensing bodies. In some cases the latter might deem it expedient to modify or suspend their regulations in favour of a particular candidate, but the Council ask to be notified of any such action. To this statement the Council add the following note:—"The Council feels sure that in dealing with any application for modification or suspension of their Regulations, the bodies concerned will recognise the importance, in the public interest, of maintaining unimpaired the present standard of knowledge and skill required of all who seek to be admitted to the status and privilege of registered practitioners, and will accordingly agree with the Council that it is desirable to secure in every instance that the requirements of the minimum curriculum are satisfactorily fulfilled." The President next discussed the special needs of the situation. Many of our medical brethren had already offered themselves for service both at home and abroad, and some had already fallen at the altar of duty. A large reserve of medical men was imperatively required, and this was being supplied by those who were now being admitted to qualification. Sir Donald insisted upon a point, the importance of which is perhaps not widely enough recognised, namely, that the need of efficient medical men is no less urgent at home and in the field than is the need of efficient soldiers and sailors. "I have felt it my duty," he added, "to press this consideration on senior students, who, though they have nearly completed their curriculum, are ready to forgo the prospect of early qualification and to enrol themselves straightforward in the combatant forces." A decrease of medical students has been reported, and in view of inquiries from various public authorities, materials are being collected for an estimate of the aggregate numbers likely to be ready for qualification in the next two or three years. It may be perhaps permissible to interpolate at this point a warning as to the reaction in the opposite direction likely to take place at the termination of the war, when large numbers of young medical men will be suddenly thrown upon their own resources. That consideration alone, apart from the wise and argued conclusions of the General Medical Council, should stay the hand of any licensing body that may be tempted unduly to relax its Regulations. Sir Donald made a graceful allusion to the ready loyalty displayed by the medical profession in meeting the sudden emergencies of panel and private practice, due to the dislocation of civil medical work by military exigencies. In acknowledging the magnificent rally of the Overseas Dominions to the defence of the Empire, he commented on the fact that some of the Canadian provinces had failed to respond to the offers of reciprocity in medical matters. As a result, the surgeons on active service who qualified in those non-reciprocal provinces are technically debarred from holding commissions in the Army Medical Service. In India various important medical matters have been dealt with, and others are still under negotiation. The vital question of the receipt of certificates from unregistered practitioners in dentistry was referred by the Council to the Board of Education. The latter body appointed a special committee, which has unanimously advised that certificates should not be accepted from unregistered practitioners. In alluding to another important point, the President said: "On August 4th, when war was declared, the House of Commons ordered to be printed the Report of the Select Committee on Patent Medicines. The findings and recommendations of the Committee deserve the Council's most careful attention. They testify in vigorous terms to the existence of a 'grave and widespread public evil,' and of an 'intolerable state of things,' for which new legislation, 'rather than merely the amendment of existing laws, is urgently needed in the public interest.' The Council, at the instance of its Unqualified Practice Committee, to which this Report has been referred, has more than once expressed similar conclusions, but hitherto without practical result so far as the Legislature is concerned. It is earnestly to be desired that, even in days like these, when the conservation of the public safety is the paramount objective of the Government, some earnest thought should also be given to the conservation of the public health, which is preyed upon by insidious and unscrupulous mercenaries."

CURRENT TOPICS.

Red Cross Hospital in Dublin Castle.

Last week we referred to the intention of the City of Dublin Branch of the British Red Cross Society to erect, if funds were forthcoming, a
temporary hospital of five hundred beds in the
grounds of the King George V. Military Hospital
in Dublin. The scheme had many drawbacks, and
we rejoice to find that through the kind interven-
tion of the Lord Lieutenant a much better alterna-
tive is to be adopted. His Excellency, from the
warm regard in which Major King—honoured the
Red Cross Society the use of Dublin Castle as a hospital
for wounded soldiers. The premises have been
inspected from a medical and sanitary point of
view, and it is reported that they can very readily
be turned into a hospital capable of containing at
least four hundred and fifty beds when necessary and
well ventilated. The situation is central and convenient. It is
calculated that a sum of about £5,000 is required to
equip the requisite number of beds. The mainte-
nance will be covered by a per capita grant from the
War Office. We understand that an honorary
medical and surgical staff will be formed from the
members of the staffs of the Dublin hospitals, and
that trained nurses will be employed. We are
sure that the scheme will, if cautiously managed,
receive the support of the public, and the fact that
the King is devoting one of his own palaces to the
accommodation of his wounded soldiers cannot fail
to touch the imagination of the public.

War Surgery.
In his opening address as President of the Interna-
tional Society of Surgery in April this year,
Professor de Page, of Brussels, reminded his
audience that it was "the privilege of our little
Belgium to offer a meeting-place to the learned
men of all nationalities, covered by Europe itself
with the shield of peace and liberty." It is a sad
irony that it should have been an American surgeon
who opened the Congress in these words with an
address upon War Surgery. Many of the speakers
at that meeting are now serving in the armies of
our allies or our foes; but the surgeon in the field
recognises in the stricken neither ally nor foe: respect
for human life should be his only guide, and that
limit must be set to the treatment of wounds and
surgery, as none can, to procure as far as possible the help available
in time of peace for those who stake health and
life for the safety of nations. Professor Delorme,
of Paris, has recently published a most eloquent
appeal for more conservative efforts in the treat-
ment of the wounded, as against the operative
excesses of the recent Manchurian and Balkan
campaigns. Eulogistic appreciations have already
appeared in the English press of the salutary con-
servatism of the French surgeons at the base hospi-
tals of Paris. In the stress and hurry of this
colossal campaign, with its appalling toll of casual-
ties, the lesson emphasised by Lister long ago as
the best, that he must have the treatment of wounds
left to alone—is apt to be overlooked or forgotten.
To-day an amputation is the rarest of operations
in the surgery of peace; by all possible means we
should strive to use its surgery in the surgery of
war. M. Delorme insists most emphatically that
"amputation is only admissible in cases of con-
formed gangrene." With the horizon of the advanced
surgery of the last decades—Bier's hyperaemia,
suture and anastomosis of blood-vessels, and free
transplantations—by which extremities whose re-
moval seemed hitherto inevitable can often be suc-
cessfully preserved, should be applicable by prac-
ticed hands to the wounded in military hospitals.
The danger of abscess, peritonitis, and gangrene
and sepsis is perhaps inevitable; but careful injec-
tion of the soldier as to prophylactic dressing
will save many an extremity which ignorance would
have lost. M. Delorme is a firm believer in the
efficacy of tincture of iodine as the best and safest
disinfectant available for field surgery. In all juggled
wounds, caused by balles ricochetă or by shrapnel,
the liberal use of hydrogen peroxide, as a
prophylactic against the animal and vegetable
material which may have been carried in on mud-stained clothing
to the depths of a wound, with accompanying risks of
tetanus or gas gangrene.

Sir Oliver Lodge and Psychical Research.
Sir Oliver Lodge has for some time been regarded
curiously by the scientific world. The greatness
of his name has been somewhat discounted among
his fellows because he has plunged into psychical
research, which has been held to be a backslider
from materialism because he has tried to sift what
is assumed to be unknowable, the most pregnant
problem that could be placed before us, the question
of a life hereafter. Psychical research, for the sins
of its followers, has long been a byword. There
has been too much clever faking and expert
deception about the adherents of the Witch of
Endor for the plain man to remain unammoni-
ished with the accent on romance. We have
been accustomed to think of those who claim to
have communication with the dead as either fools or
knaves, or both. Sir Oliver must give us
pause. No one will question his bona fides, and
his book is what is commonly regarded as a
fool. He declares definitely and ex cathedra that
he has scientific proof of a life hereafter. Many
men have claimed to have absolute proof of one
thing or another who have subsequently shown themselves
quite ignorant of the first principles of
scientific deduction. Sir Oliver Lodge is not one
of these. When he says he has scientific proof he
knows what he means. Whether his proof will
convince the rest of the world is another matter.
The eye of faith is as all-seeing as the eye of
Utah, and the best of us may be deceived. To
many men Sir Oliver Lodge's work is superer-
ogatory. With the scientific proof of the doctrine of
immortality, if, indeed, it be capable of such proof,
we as a medical journal are not concerned, we
also wonder if the rest of the world waits the promised proofs.
Sir Oliver has flattered dust with eternity, and he
must prove his words. We are not sure that he
can do it, but we are waiting.

"Twilight Sleep."
The undesirably publicity recently given by the
lay press to the method of diminishing the pains
of childbirth by the use of scopolamine morphine
anaesthesia has served to re-awaken the interest of
the medical profession in a subject neglected.
Brought to its notice some twelve years ago, revived in 1906, and subsequently allowed to
subside, Dr. Jacob Heller, of Brooklyn, has recorded in the Medical Record his observations of 150 cases of "twilight sleep" drawn from the charity
and private service of the Jewish Maternity
Hospital. Cases of extreme pelvic contraction,
of placenta prævia, and of absent or doubtful fetal
heart-sounds were excluded, as well as those in
which the patient was already too far advanced in
labour. Of the series 113 were primiparæ, and 37
multiparæ. Vertex presentations formed 148 of
the series, the other two being the breech, 113 cases
were delivered by forceps. No instance was met with in which the placenta was retained for more than thirty
minutes, and in no case was haemorrhage abnor-
manly profuse. The technique of the best Con-
tinental authorities was closely followed. This
Gastric Ulcer and Strain.

The fact that quite a fair-sized ulcer of the stomach may be present during life without causing any special symptoms—the so-called latent ulcer—is well known to pathologists who are accustomed to demonstrate such lesions at post-mortem examinations. Like many other diseases the existence of which is unsuspected or undiagnosed in the patient's lifetime, a gastric ulcer may become explosive, and if the American authors say, and cause death through perforation. This mode of termination may sometimes occur spontaneously without any apparent reason, or the dreaded complication may arise as the result of some sudden physical strain. The latter mode of onset was held to be responsible for the death of a Blackburn weaver the other day. According to the local paper, the deceased, a girl of nineteen, was seemingly in good health on a certain day, when she lifted some heavy loans weights at the mill. She imagined she had "sprained herself," and went to bed. Death taking place next day from general suppuration peritonitis due to the perforation of an ulcer at the pyloric end of the stomach. A similar catastrophe might, of course, have occurred if the girl had been walking or lying in bed if the ulcer had been just on the point of bursting. The diagnosis of perforated gastric ulcer may be suspected, apart from the history of previous indigestion or a recent strain, in cases of sudden intense pain in the epigastrium with collapse and local rigidity, with or without vomiting, and a rapid pulse. Frequently, however, one cannot get further than the "acute abdomen," the precise condition of affairs being revealed only by a timely exploratory laparotomy.

Football and the War.

Association football is becoming an uncontrolled Frankenstein monster that Demos, the king, has set up. It is played in the three kingdoms, and in some places is treated lightly as a game. But in England's great cities it is an industry which must "carry on" with its customary patronage and dividends. It is a Moloch or an octopus that stretches out its tentacles and swallows the Saturday populace of our towns. The amateurs have gone. Their name is legion and their game is war. Rugby players are suffering more from a winter of discontent and have gone to earth in the trenches. Association goes on. Unattached males in tens of thousands watch the weekly trangressions of the perfect sphere as if it were eternal as its prototype. The thing of shreds and patches and high-pressure air is banded gaily about as if all was right with the world. Panem et circus has developed into "cigs. and soccer." The progress is not notable. The thing is a sickening sight—two-and-twenty highly trained and highly paid kickers surrounded by massed ranks of mollies-caddles that six months and a few competent sergeants could turn into men. The nation is calling men, drilled men, men who can do things are her most urgent need. She seems to call on ears tuned only to the cacophonous plunk of inflated rubber. Football is a fine game to play, but in England today it is not played, but only "followed." "A certain liveliness" is all right. We must have recreation, but it is far from edifying to see the crowds of raw material who live for Saturday soccer. Attempts have been made to make recruits among the masses of raw material on the stands. They have failed dismaly. Hardly a man has responded. The football spectators have lost all sense of proportion. In their forcible-feebble enthusiasm for their favourite collection of kickers they forget everything else. If the disgrace were stopped they might have a little time for reflection.

The Reuben Harvey Prize.

In our advertisement columns we publish the announcement of the forthcoming award of the Reuben Harvey Memorial Prize. The prize, value £25, is to be given next July to the author of the best essay evidencing original research in animal physiology or pathology. Competition is limited to students of the Dublin schools of medicine and to graduates and licentiates of the Dublin licensing bodies of not more than three years' standing. The object of the award is, as we have before now remarked, very judicious in that it stimulates research at a period when most thought is given to the passing of examinations. A very meritorious work has been put forward before now by candidates for the Reuben Harvey Prize, and we hope that the competition in 1915 will, in spite of many distractions, be keen.

**PERSONAL.**

**Dr. A. G. Gibson, D.M.Oxon., of Christ Church, has been appointed University Lecturer in Morbid Anatomy in the University of Oxford.**

**The new President of the Medical Council of Canada is Dr. Robert S. Thornton, M.D., M.P.P., of Deloraine, Man., who was formerly President of the Medical Council of Manitoba.**

**Dr. H. Hyslop Thomson has been appointed County Medical Officer of Health for the administrative County of Hertford during the absence of Major F. E. Fremantle on active military service.**

We offer our congratulations to Dr. J. J. Paterson, Medical Officer of Health of the East Berkshire Combined Districts, who has been held a prisoner in Germany since the beginning of the war, upon his safe return home.

**Dr. Geoffrey E. Oates, M.D., B.S., M.R.C.P., Lond., D.P.H.Camb., has been appointed Medical Officer of Health, School Medical Officer, and Medical Superintendent of the Isolation Hospital for the Urban District of Ilford.**

**Sir Frederic Eve, F.R.C.S., Senior Surgeon to the London Hospital, will deliver the Bradshaw Lecture at the Royal College of Surgeons of England, on Tuesday, December 17th, at 3 p.m. Subject, "Acute Hemorrhagic Pancreatitis, with remarks on the Etiology of Chronic Pancreatitis."**
FRENCH CLINICAL LECTURE
ON EARLY SYMPTOMS AND DIAGNOSIS OF CANCER OF THE RECTUM.

BY PROFESSOR QUENU,
Surgeon to the Cochin Hospital, Paris.

[Specially Reported for this Journal.]

Since you have attended my wards you have had opportunities of observing some ten cases of cancer of the rectum. Several of them were inoperable by reason of the spread of the mischief, while others were within the limits of operability, but in none of them was the diagnosis made early in the course of the disease in spite of the fact that, in most instances, medical advice was sought at the very beginning. Almost always their troubles were attributed to piles or enteritis, without direct rectal examination for the purpose of verifying one or other of these diagnoses.

The most striking and the most lamentable of these cases is that of a girl, at 17 years, admitted in April last, upon whom I recently operated. She is tall, pale, thin. She tells us that she has been more or less anemic ever since she began to menstruate and had been suffering from dyspepsia for several months when, in July, she first noticed blood in the stools. She went for advice to the out-patient department of a Paris hospital in which she had previously been a month under treatment, and there, without any examination, they ordered sitz baths. The rectal bleeding recurred every fortnight or so, aggravating the pre-existing debility. She had suffered from constipation, and this became more pronounced, so much so that she became unable to go on with her work as a general servant, and was admitted to a hospital, where she remained six months. During this period she never had a motion except on taking an enema. Ultimately she came to this hospital in April.

She told us that no rectal examination had ever been made. An inch and a half from the anus the finger came upon a hard mass occupying the posterior three-quarters of the gut, leaving a band of healthy tissue on the anterior wall, limited above and behind, adherent to the sacrum. In consequence of these adhesions we had the greatest difficulty in dragging the rectum down. The prognosis is of course much less promising after a late operation than when performed early, but in spite of this the immediate results of the operation were satisfactory, she had no more pain, and her strength began to return, so much so that, as you see, two months after the operation, she had gained many pounds in weight, her cheeks are rosy and she is able to assist the nurses in their work.

There is a lesson to be learned from this case, viz., that any trouble in connection with defecation, especially if accompanied by loss of blood, points strongly to the immediate necessity for rectal examination, whatever be the age of the subject. The youthfulness of this patient is the only excuse I can see for the practitioners who failed to make this examination because one could hardly suppose that epitheliuma of the rectum was likely to be present in a young woman, at 27. It may be well to mention that in the year 1899 I collected a dozen instances of cancer of the rectum in subjects under 20.

The rectum is of course only exceptionally the seat of cancer in subjects under 20 years of age, but its possibility must not be lost sight of. It ceases to be rare between 20 and 30. In 1899 I had three cases of my own, and saw two others, at 21 and 22. Tuttle, out of a hundred patients of his own, had eight between 21 and 32. Nevertheless it is between 40 and 60 that cases of cancer of the rectum are of most frequent occurrence. Now let us consider what are the earliest symptoms. In the case of this girl, as you have seen, bleeding was the first indication. Of the other patients with this form of cancer at present in our wards, one, at 63 years, in good health in October, first complained of frequent calls to stool, the faces being streaked with bright blood. He consulted a doctor who diagnosed enteritis and dieted him. The calls to stool became more imperative and his efforts resulted in the expulsion of material like crushed strawberries with occasional blood clots. In January he found that he had lost 13 lbs., in weight; this scared him, and he consulted yet another doctor, who, still without any rectal examination, gave him anti-septic cachets. By this time the calls numbered eight or nine a day, the constipation was not very pronounced, the motions being sometimes formed, sometimes liquid. In April he consulted Dr. Friedel, who sent him on to us. On examination I felt above the prostate a granulating mass on a hard base encircling the rectum, horseshoe fashion. I could reach the upper margin and the tumour was somewhat movable. You see, then, that in both these cases the first symptoms were bleeding and frequent calls, but without well marked constipation, at any rate to begin with. In both instances the cancer was horseshoe in shape, not completely encircling the gut.

You will remember my calling your attention to a woman, at 48, in the Salle Richet, who was admitted on April 18th for a very offensive reddish vaginal discharge. Vaginal examination revealed the fact that behind the left labium minus there was a pedunculated sanious tumour the size of a walnut lying on an indurated base. On rectal examination, two or three inches from the anus, I could feel a sort of indurated cylinder, split on the anterior wall where the mucous membrane seemed healthy. It was movable.

On questioning the patient, she said that in April, 1913, i.e., a year ago, she began to have frequent calls to stool, but only expelled flatus or mucus, or at most a little liquid blood-stained matter. This gradually got worse, till October, 1913, when she began to have pain in the anus independently of defecation, she also lost weight, and on admission she was decidedly emaciated and cachectic, so much so that I could not entertain any idea of a radical operation.
The symptoms in the two next cases differ from the proceeding. In the first, a woman, aged 54 years, colotomy had been formed by Schwartz a year before. Her first symptoms dated back to March, 1911, consisting of frequent calls to stool, usually with the expulsion of blood-stained mucus. These symptoms persisted for eighteen months, during which period she consulted several practitioners. Constipation was well marked. Ultimately she went to the St. Antoine Hospital, where cancer of the rectum high up was diagnosed, and an artificial anus was made. The salient features in this case were frequent vail calls to stool with little or no bleeding.

The next case is that of a pale woman, aged 65 years, upon whom I operated, resecting the recto-vaginal septum. Her principal symptom was early persistent pain. It was in March, 1913, that defecation began to be painful, the pain persisting after the act and becoming worse when she made any sort of effort. She lost weight, and two months later she went to the Broca Hospital, but an attempt to examine her proved vain on account of the pain. It caused, and she refused admission until February, 1914. I examined her under an anaesthetic, and took advantage of the opportunity to make an artificial anus. The whole rectum was cancerous and ulcerating.

The two most constant symptoms at the onset, then, are bleeding and frequent call to stool. This early bleeding does not always occur in exactly the same way. Sometimes the motions are merely streaked with blood, while at others there is a plenty from bleeding after defecation. In this case the bowels may be red or, should it have sojourned in the rectum for a time, it may be more or less black. I cannot insist too strongly on the diagnostic importance of these early hemorrhages. We meet with much the same thing, it is true, in piles, but in spite of this the occurrence of bleeding renders it incumbent on us to explore the rectum. The bleeding is doubly significant when accompanied by frequent desire to go to stool.

This latter symptom is common to all cases from rectal disease, as we cannot ascribe it to any case, but when associated with blood-stained oozing we must be suspicious.

I give prominence to these two symptoms because practitioners are particularly apt to go wrong in reference thereto, the bleeding being ascribed to piles and the frequent desire to empty the bowel to enteritis. We next come to two other symptoms, viz., constipation and pain. Constipation is pretty constant, but may be wanting or not very pronounced. Why is this? Let us consider the structure of the rectum. It is divided into three portions, a middle segment, about 4 inches long and from 4 to 6 inches in circumference, this is the rectal ampulla. Above this is a part about an inch in length and two or three in circumference, and a third part, the anal segment, an inch long, surrounded by the sphincter muscle, converting it into a potential cavity. Now cancer is by far more frequent in the central segment, to the extent of two thirds of the cases, 20 per cent, are situated above it and only 10 per cent, in the anal segment.

While cancer of the large intestine has a marked tendency to become annular, cancer of the ampulla is usually in patches or as an incomplete ring leaving a band of healthy tissue. I am convinced that this is almost always the initial form.

Let us see how these anatomical data bear on the constipation. To begin with, at any rate, as the obstruction is incomplete, the resulting constipation does not differ essentially from ordinary constipation due to intestinal paresis, in a few instances we get diarrhoea, or what is described as diarrhoea, but when we come to enquire into this we find that it is really pseudo-diarrhoea (of glairy mucus) masking more or less refractory constipation.

The symptom pain is the most variable. As a rule patients only complain of some discomfort, of a feeling of weight in the fundament or of "unsatisfied defecation." Sometimes, however, there is actual pain during defecation persisting for some time afterwards; in fact it may not subside altogether, even between the efforts at expulsion.

These symptoms gradually increase in severity as the case progresses, the bleeding becomes more copious, the constipation more and more obstinate, the desire to defecate more frequent and more imperative, and at the same time the pain increases, and the general health shows signs of deterioration, though it may be that the patient retains the appearance of health for a long time, so that too much importance must not be attached to cachexia in the diagnosis of rectal cancer.

In cancer of the rectum high up the symptomsology resembles that of sigmoid cancer, viz., in addition to the passage of blood-stained mucus there is gradually increasing constipation and attacks of very characteristic colic, as in all cases of cancer of the large intestine.

Another variety is anal cancer, whether the cancer be limited to the anus or be ano-ampullar. Here the predominant symptom is pain, the cancerous ulceration giving rise to all the symptoms of anal fissure; spasm and pain during and after defecation and the inguinal glands are involved.

In nine cases out of ten the introduction of the finger into the rectum suffices to establish the diagnosis. In the ano-ampullar we find an indurated patch with an irregular raised outline or a projecting mass of indurated tissue surrounding an ulcer. In the annular form the indurated patch extends more or less circumferentially round the gut, and when the ring is complete it feels like cancer of the uterine cervix because, as the result of a certain degree of invagination, the cancerous ring plunges into the subjacent portion of the ampulla forming culs-de-sac round the tumour.

Cancer of the anal portion does not present any difficulty of diagnosis unless it happens to have given rise to inflammatory lesions when the mixture of neoplasm and inflammation may lead us to suspect a mycotic, a tuberculous or a syphilitic lesion.

In some exceptional cases of cancer of the rectum the diagnosis may present more or less difficulty, but in the immense majority the danger is not that we may mistake the significance of a tumour discovered on examination, but that we may overlook its existence owing to our not having made an indispensable examination. Therefore whatever be the age of the subject, however healthy he may look, whenever he presents the symptoms described above never fail to institute a rectal examination. Omission to comply with this injunction entails the gravest consequences to the patient and great damage to the reputation of the defaulting practitioner. On our early diagnosis of these cases depends the
future of the patient, because early operation is not infrequently followed by complete cure in any case by marked prolongation of life.

**Note.**—A Clinical Lecture by a well-known teacher appears in each number of this Journal. The lecture for next week will be by Dr. Henri Duacnet, Assistant in Physiotherapy at the Medical Clinic of the Hotel-Dieu. Subject: The Utilisation of Infraviolet Rays in Medical Therapeutics (Quartz Lamp and Vapour of Mercury).

**Original Papers.**

**Expectancy and Expediency in Gynæcology.**

B. H. MacNaughton-Jones, M.D., M.Cu., F.R.C.S.I., and E.D.

We may gauge the utility and value of any medical discourse by viewing it from two aspects. There are the new and the old ideas, the outcome of research and discovery, which elucidate hitherto obscure phenomena, whether clinical, physiological, or pathological, and which remove the treatment of disease from the realm of empiricism to that of rationalism. When such knowledge is further enriched by the test of experience, showing that definite results of its practical application, which have combined to make it the most reliable and practical solution on the path of progress. Comparatively few, here and there, out of the many thousands of workers the world over, can claim to have a place in the ranks of such instructors and pioneers in medicine.

All honour, however, to the self-sacrificing and laborious workers who, if they cannot reach the heights of epoch-making discovery, devote much of their lives to unravelling the mysteries of the physical phenomena at work in the human organism, and in verifying by experimental research the theories and views of more fortunate collaborators.

Again, there is always something to be learned from any record of difficult situations which a large individual experience can recall, and in which failure has been a more apt instructor than success. Such a discourse may be commonplace, but it is just the commonplace everyday happenings that meet us surgeons in our work. He who is well equipped to deal with these is best fitted to foresee and detect exceptional difficulties, because, if such timely warning of danger is the surest safeguard against failure. In these times of international strife and bitterness, we workers in medicine have at least this consolation—that alike to friend and foe we can say, “We are brothers the world over in a common bond, as allies in the struggle in a war against disease and suffering.” The cosmopolitanism of medicine is a link that neither war nor race can touch.

There are real dangers associated with this age of universal activity in research and experimental work. Directly and indirectly they have a bearing on my subject. The first is the premature acceptance of theories which have not been verified on sufficient evidence. Such exceptions involve the removal of established methods which have stood the test of time, and the results of which, if not all we would desire, have been most useful in the saving of life. The second evil, of which the last decade we have had overwhelming evidence, is the booming of therapeutic remedies, operative, clinical, and pharmaceutical, and their experimental use under widely differing conditions, without the needful discrimination of their indication according to the stage of the disease, its complications, and the idiosyncrasy or constitutional contraindications in the individual patient. The sacrifice of invaluable time occupied in futile efforts at cure, is a common source of ultimate disaster. When we cannot remove the conditions which prevail in a hospital clinic for observation, and the careful selection of favourable cases in which to test the effects of treatment are not always present in every-day practice. In the room of the consultant the patient is often seen for the first time, and in the light of a comparatively hurried examination, though the result in small proportion of cases an anaesthetic is absolutely necessary to make a satisfactory diagnosis.

Thus we cannot hope for such a percentage of favourable results as at present in statistical summaries from practice in Institutions in which every possible anticipative and preventive measure against failure can be secured. Let me by no means in which there is the least desire or intention to depreciate the splendid gains and advances recent years have brought to our science through the use of various vaccines, the external and internal use of radium, the application of the X-ray, the administration of hormones and the arrest of cancer by certain therapeutic agents. Yet I do mean to urge that in each case, whatever means their employment has to be under the control of skilled supervision; that the stage, extent, and complications of the affection have to be carefully considered, and that their continuance should be dependent on the effects which are apparent when a reasonable time has elapsed sufficient to test their action and efficiency. The term for choosing the title, “Expectancy and Expediency in Gynaecology,” will be obvious before its close. Let me first state what I understand by these terms. I think I may define expectancy as the “wait-and-see” policy of gynaecology. It is the Micawber rule of life applied to this branch of medicine, and especially to its surgery. I know of no section in which the gynaecologist is more apt to justify his attitude in practice than in gynaecology. This, in a measure, may be accounted for by these facts. Many of the pathological states of the genitalia in their nature and clinical signs are concealed from observation. Also, they are often painless, and most women have a marvellous power of bearing inconvenience and pain to any degree remarkably well. All of us can recall instances of women coming for advice (for the first time), and having put off that of their medical attendant to do so earlier, when we have been amazed at the endurance which must have been present over months or years of suffering, possibly at last ending at the cost of life. I have known a woman with a parametritis, a woman weighing over 220 pounds and a large adenofibroma of the other, who was under the impression that she had conceived, and only sought advice when some time elapsed and there was no sign of labour. A patient came to consult me whose only complaint was that recently she had had difficulty in emptying the bladder, and had a feeling of urging which was off her doctor. She had a large double pro-sulphix, and a parametric infiltration reaching half-way to the umbilicus. A lady was sent some distance to see me, and except that of late she had been inconvenience by the size of the tumour, she made no serious complaint of pain or any very special distress. I removed a uterine fibromata, established 28½ lbs. Another patient, who had extensive carcinoma of the cervix and fibromata of one ovary, refused to have any

(1) Address delivered to the Nottingham Medico-Chirurgical Society illustrated by lectures and demonstrations, November, 1911.
medical advice unless examined by me for the first time.

True, these are exceptional instances, but it is a matter of everyday experience how much some women will suffer and uncomplainingly endure before they seek skilled advice, or submit to examination. And so they drift into some grave pathological condition, from which a serious operative step can always be avoided.

Of course, there is the opposite type, in which we find extreme susceptibility to pain and a tendency to exaggeration. Here there is just the danger that the woman may be looked upon as neurotic, hysterical, or a malade imaginaire; or her symptoms may be assigned to some menstrual irregularity, and thus her pain is treated as a symptom of some irritative remedies, anti-spasmodics, uterine sedatives, amenagogues, hypnotics, massage, electrical and spa cures. Then, when an examination is made, some congenital malformation in the genitalia, uterine displacement or enlargement, a floating kidney, or, later on in life, the trouble which has been assigned to the menopause is found to be a much more serious and malignant degeneration of a myoma. Of all medical terms that we gynaecologists have to be most careful in uttering without satisfying ourselves of its accuracy in applying, that one is neurotic. The complete misapplication of the term hysteria is a matter of common experience.

Turn we now to my second heading. Expediency. George Eliot, in her novel in this fashion—as a damnable doctrine which, like an old felt hat, we might turn into any shape that suited the taste or fancy of the wearer. Such expediency may demand the covering up of the results of indecision and error, the evasion of the risk of operation, and the closing of our eyes to the fact that by letting the woman alone and trying uncertain remedies, we are taking a chance ten times greater than by accepting such risk.

On the other hand, there is the expediency which excludes every consideration save the highest good to be attained in the action taken or the course pursued. This is the expediency which since a thing is right makes it, as Tennyson says, "wisdom to forego to the end the seeming of convenience." Such expediency rejects every influence which cannot bear the ethical test of the complete elimination of self when the decision as to yes or no has to be made. Suffering is prolonged, and life may be lost, through delay in doing the right thing at first, and allowing other motives to sway our judgment and advice than the simple one of determination to act in the present so as to save the woman from probable or even possible eventualities in the future.

There comes a day in the history of every case in which if an affection does not yield to the usual remedies, when the assistance of the chemical, bacteriological, and pathological laboratory has to be invoked in order to define the condition of failure. The condition may be such as to demand also either cystoscopic, sigmoidoscopic, or X-ray examination; it may be all three of these. This is the critical time for action, and our decision depends on the report we get.

Possibly a previous examination has disclosed a doubtful tumour in Douglas, a rectal growth, a sarcoid tumour, an ovarian or salpingeal swelling, or confirmed our suspicion of an ectopic gestation. Should the womb have been curetted, the pathological report may show the degeneration of a myoma, carcinoma of the fundus, adenomatous changes, decidual structures, or evidence of chorioepithelioma. In each of these conditions immediate action is called for. Interference of friends, dislike to operative measures, hesitation as to an exact diagnosis, consideration as to the patient's ways and means must be brushed aside; we free ourselves of responsibility by advising, irrespective of all consequences, the correct line of action.

Let me briefly notice two of the extra pelvic complications not infrequently present with some affection of the genitalia. I do not hesitate, though it is outside the gynaecologist's pelvic sphere of operation, to include misplaced and movable kidney in this category, if only for this reason, that this source of a woman's suffering is not infrequently overlooked, and especially is this so when it complicates some functional pelvic affection to which the attention of the practitioner is fully and correctly drawn. The first point in each examination is the exclusion of this renal abnormality. Independently of the serious associated digestive and nervous troubles, there are the pathological changes which are apt to follow in an enlarged and loose kidney. I do not under-estimate the relief which, in certain cases, may be obtained from a course of rest and feeding with the application of a carefully adjusted support. Immediate and lasting relief may be looked for from an effectual nephropathy, and in a fair proportion of cases it is the only satisfactory remedy.

I know of several instances in which years have elapsed since the kidney was fixed, and in which permanent relief from various serious and persistent symptoms has been obtained. This is no uncommon experience.

Another structure outside the pelvis which must be included as within the gynaecologist's domain of action is the appendix. We now know, thanks mainly to the original work done by Dr. Douglas Reid, of Cambridge, the embryological and anatomical reasons why infection travels from the appendix to the peritoneum in the pelvis, and from there, possibly from the right to the left side, as also why adhesions of one to the other are occasionally found. In many instances we find a difficulty in saying which of the two, ovary or appendix, is the greater culprit, or if both are not equally responsible. Hence we recognise how essential it is not to overlook this possible complication in any examination of the ovaries, and in the pelvis in general, or in the abdomen, as much for the right, but possibly from the right to the left side, as also why adhesions of one to the other are occasionally found.

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cause of unbearable pain and tubal hemorrhage. 

(6) The rupture of a tubal ectopic sac may be fatal. When we are confronted with an adnexal swell- ing it is often impossible to differentiate, and say if it be tubal or ovarian, or both. Operation alone can decide. Take for example, a true tubo-ovarian cyst which al so when the lacerated end of the tube opens into the ovarian cyst or abscess cavity. Frequently we find tube and ovary matted together, and with both there may be the appendix. The possibility of an accessory Fallopian cyst or pro-salpinx has to be remembered. We have recorded three cases of primary tubal or peritonitis of the Fallopian tube, and so far as we know, all three women are well today, while one has had three pregnancies at full time, including twins. In this latter case, nine years subsequent to the operation I removed the other tube and ovary for pro-salpinx. No trace of tubercle could be discovered in the adnexa. In none of these cases was the ovary or uterus affected.

There is a specimen of mine of extensive infiltration of one tube with carcinoma in my collection in the College of Surgeons of Ireland, where there was no evidence of any invasion in any other pelvic organ. Most of the reasons for depressing delay in action in the instance of these two apply with equal force to the Fallopian tube. Nothing is more remarkable than the comparative rarity with which, as contrasted with the days of Spencer Wells—to whose name and memory I make this tribute in passing, which his genius and courage deserve—large ovarian cysts are now seen. The only one I have met with in a patient who refused to consent. Here the girth at the umbilicus measured fifty-eight inches. The early diagnosis of cystic and other degenerations of the ovary has brought with it the saving of untold years of suffering and life. Now that pathology has demonstrated the stages in lutein tissues that lead to various cystic formations, hemorrhages, and degenerations in the ovary, and has traced the histological changes in the stroma that culminate in fibrotic and various malignant growths, we have clearer views as to the pathological eventualities that cannot be ignored in the case of an enlarged or palpable ovary which continues to swell. If death or degeneration occur in the ovary as in the tube.

There is a fact it is well to emphasize—namely, that the suffering and distress caused by sclerotic and cirrhotic changes in an ovary are out of all proportion to our findings in size or sensitiveness on examination. The contraction and follicular obliteration caused by the cirrhotic change; the interference with normal ovarian metabolism due to the fibrosis; the sclerosis of the tunica and vessels, have a profound effect on all the phenomena of menstruation, both physical and psychical. It is in such cases that we frequently find the victim of severe dysmenorrhea, with neurasthenic and psychasthenic symptoms. The normal metabolism of the ovary during the menstrual period of human life is the key to the even play of action and reaction in her physical and mental functions, and the maintenance of her whole health. I have known women who were on the verge of insanity and subject to the morphia habit completely cured by the removal of sclerotic and cirrhotic ovaries. Judgment, however, has to be exercised, for the complete removal of a large ovary which is a normal part of our anatomy is the bringing on of a premature menopause cannot be too strongly deprecated. Resection of the affected ovaries with removal of the sclerotic and cystic portions gives complete relief. Restoration of normal menstruation follows. Both in the tube and ovary conservative surgery has an important place in the operative therapeutics of the adnexa. Also, in the present-day pharmacopoeia of the gynaecologist, there are the various ovarian and lutein preparations with collateral treatment that may be given a trial; but, should the more conservative operative resources be still available.

To deal satisfactorily with the uterine affections in which the expectant attitude leads to disaster, is not possible. A short summary of a few common instances must suffice. Pain, discharge, and hemorrhage are the commonest symptoms for which the woman seeks advice. I have already said, its character, persistency, and situation are premonitory warnings and indications, useful in diagnosis, which we cannot ignore. "Never neglect pain," was an aphoristic dictum of an old teacher of mine; to this I would add, "nor despise it." The thorough examination, microscopical and bacteriological, of any dysmenorrhea from the genitalia must ever be one of the first principles of treatment. The result, taken with the physical signs present, will decide our attitude to the case. A young married woman, in the early months of pregnancy, consulted me for severe pain and considerable uterine discharge. Examination of the latter proved it to be a gonorrhreal. The uterus was large, tender, and congested with iodine applications. She was apparently getting quite well when sudden pain and symptoms of pelvic peritonitis threatening to become general set in. I opened the abdomen, and found the right tube enlarged, with pus pouring from its outer end. There was a layer of inflammatory exudate over one curedt of the tube and the uterine cornu, and cleared off all the exudation. She recovered rapidly. The tube for its entire length was invaded with gonococci.

A word on the invaluable aid in diagnosis which we have in curettage. The debris of every curettage should be most carefully examined and reported upon. Conditions of approaching or actual malignancy which cannot otherwise be discovered are disclosed. We may find evidence of gonorrhrea or tubercle, and if there be an adnexal swelling immediate interference is called for. I recently showed a uterus at the Royal Society of Medicine in which there was no myoma, and the cervix and tube were but slightly thickened, and the cervix was deeply eroded. I removed part of the cervix and curedt the uterus. Examination proved that the portion of the cervix amputated was benign, while the curettings were carcinomatous. When the uterus was removed a growth was found projecting into the cavity, which proved to be an adenomucous. The degeneration extended only a short way into the uterine wall. The adnexa were healthy.

Myoma and fibromyoma of the uterus are conditions that demand special consideration in connection with my subject. There can be no doubt that some women are fortunate in suffering little from a uterine tumour, while others are beset by it and have to face the dire action of growth, absence of hemorrhage, freedom from attacks of fibrosis, arrest of growth, and the temperature of the woman in a great measure explain this. I knew a most valuable and experienced gynaecological nurse who, both at the operating theatre and at the bedside, could go through great trouble and effort, but always taught me her adnexa. Further than that, every now and then, through an excessive period she did not appear to suffer, and she would not listen to any question of operation. We have all met such cases.
From an alpine climber, an unmarried girl, age 32, I removed a degenerated myoma, in which was a large telangiectomatous tumour, an injury that had occurred six months prior to the removal of the tumour. It was a large myoma, the structure of which had been cleaved into a number of other nuclei was embedded. The time that these must have taken to develop and grow much have been considerable.

These, however, are exceptional instances, and there are certain clinical and pathological facts which never can be ignored. Myomata are frequently subject to various degenerations, especially cystic and fibromata, and degenerative tumours are far from inconspicuous. Myomata are of the size of a pea, and have been found to occupy the uterine cavity, while embedded in the abdominal wall, osteoid, hyaloid, calcareous, sarcomatous. Any one of these may bring with it symptoms incompatible with health or life; pressure on the bowel, bladder, and ureters is a very common effect. Cardiac disease is present in a certain proportion of cases. With such a tendency it is not surprising that the great majority of these suffer from some degree of inoperable heart disease. In certain inoperable cases, both of the uterus and vagina, great benefit has been derived from radium, as also when there has been recurrence after operation. Some authorities have reported good results from its use, both before operation and after. On the other hand, the disease in some patients continues to extend rapidly, despite its employment. Dr. Pinch, in a communication to the Radium Institute, in a communication he has just sent me, emphasises these points:

(a) It is absolutely wrong to regard radium as a cure for cancer of the genitale. Though in many cases of fungating and ulcerating carcinoma of the cervix, the results are marvellous, exceedingly any other known method of treatment. He instance cases in which the symptoms have been in complete and final cure for two years.

(b) Epithelioma of the vagina and vulva are less satisfactory: that attacking the mucous membrane is the more intractable. He quotes a case, however, in which the disease, microscopically verified, has, up to the present, been completely arrested.

(c) He brings in cases in which the disease was pronounced inoperable, rendered operable by radium treatment.

(d) He is of opinion that exposure to radium after operation, though not positively preventing recurrence, does delay it.

(e) After extensive pelvic operations, as, for instance, Werlein's, the greatest care must be taken accurately to calculate the doses; otherwise, owing to the wide-spread impairment of the atrophic nerves, extensive tissue destruction may follow.

Arrest of growth and reduction in size, with the spontaneous cure of a myoma, do very rarely occur, but so seldom that we cannot take this fortunate solution into serious consideration in treatment. One factor in the success of operation must be clearly kept in mind, and impressed on the patient and friends: delay improves the health, lessens resistant vitality, and also allows local complications to occur, which increase the severity and length of the operation and the final percentage of its risks.

In younger women we have to face the probable sterilisation of the ovary and obliteration of the ovarian function with its consequent physiological and psychological effects. The complication of an ovarian cystoma with the fibroma would certainly be a constant danger. The difficulty of diagnosis is due to the nature of the degenerative change in a tumour, and commencing or associated malignancy, cannot be overlooked. Take such a case as that I have already instance, and another I shall show presently. Many cases have been recorded in which subsequent malignancy supervened in the tumour after radion treatment, and. In the majority others which I have omitted, have to be taken into consideration with the circumstances, financial and otherwise, of the patient before the decision is made to resort to Rontgen treatment. Radium has been used in a variety of uterine and peritoneal affections, such as fibroma, meritit and perimetritis, but it is with regard to cancer only that I wish to speak. There is ample evidence to prove that in certain proportion of cases radium does act most beneficially on the malignant growth, and arrests or materially modifies the clinical signs and symptoms which usually accompany the disease. But if we come to look for satisfactory evidence of final cure, I do not think that we can yet attribute them to radium alone. In certain inoperable cases, both of the uterus and vagina, great benefit has been derived from radium, as also when there has been recurrence after operation. Some authorities have reported good results from its use, both before operation and after. On the other hand, the disease in some patients continues to extend rapidly, despite its employment. Dr. Pinch, in a communication to the Radium Institute, in a communication he has just sent me, emphasises these points:

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The menopause is a trap which often leads the unwary into trouble. Discharge is overlooked, pain is absent, unusual or intermittent bleeding is ascribed to "the change," and so the woman drifts with a diagnosis of myoma into menopause. Examination reveals an intra-uterine fibroid or carcinoma, and we know how frequently we meet with such conditions after the menopause has passed. The old idea that the post-climacteric years were comparatively safe from malignancy has been exploded.

We must not lose sight of the fact that the vagina is occasionally the seat of primary carcinoma. It is more usually found in the posterior wall. It may commence as a papillary excrecence, a nodule, or an infiltration. The nodular or nest variety grows more quickly than the tubular, and in it there is more rapid dis-elimination and metastasis with glandular involvement. In fact, such gland implication may be the first indication of malignancy. Pain, discharge and bleeding are the more frequent symptoms, and the post-climacteric period the time of most common occurrence. Its possible source in the ulceration caused by a pessary should not be forgotten.

Sarcoma is still more rare, and, as compared with carcinoma, it is found more frequently in younger women. We have to be careful not to mistake it for myoma or a cyst of the vagina. If there be ulceration, sarcoma may be mistaken for carcinoma, syphilitic or tubercular ulceration.

There is no time to dwell on the many affections of the bowel which, apparently benign in their inscrutability, are apt to degenerate into malignancy. Once we are apprehensive of any leukoclastic, eozematosus, or papillomatous patch of surface, the only safe course is to remove it. Temporizing allows for and favours lymphatic transmission and glandular infection, to be followed by extension of the disease until it is ineradicable.

My object in this address, which your President honoured me by inviting me to give, is now fulfilled. It may appear to be late in the day to raise a voice against procrastination in gynaecological work. And I should not have done so only that I feel that, with all our advance, it is still called for. The great majority of those who have the fate of women in their hands are engaged in general practice. Long before the patient is referred by the consultant the propitious time for radical interference may have passed. This means years of useless suffering, increased risk of operation, and lessened chance of complete and permanent cure. Is it not a fact that such consequences of delay are yet so infrequently seen? I propose to show on the screen photographs and drawings which will illustrate several of the conditions to which I have referred.

INTESTINAL STASIS: A METHOD OF TREATMENT. (a)

By ALEXANDER BLAVNEY, F.R.C.S.,
Surgeon to the Mater Misericordiae Hospital, Dublin.

In the few remarks which I propose to make to-night I do not intend to make any attempt to deal with intestinal stasis in all its aspects; the subject is too vast, and would require several hours to deal adequately with it, if I were capable of doing so, or even to deal with it inadequately, as I should more probably do. The object which I have in view in this contribution is merely to relate the experience which I have had in carrying out one operation, which has been designed for the relief of symptoms which depend on a mechanical interference with the action of the large intestine and the consequent delay in the fecal stream.

In the course of my remarks I intend first to relate the history and symptoms usually given by patients for whom I believe this operation to be suitable, the conditions which are commonly present inside the abdomen, the details of the operation itself, and, finally, the results so far as I can speak of them. The operation has only comparatively recently been done by me, so that I cannot speak with any confidence of the ultimate results.

First as regards the history. In most cases the patients are women, who generally tell you that they can scarcely remember the time when a regular daily action of the bowels was the rule with them. They frequently say that in early life they did not pay any particular attention to the action of the bowels, and were quite content with a motion every third or fourth day, or even once a week. I may say that I believe that frequently the origin of subsequent bowel trouble lies in the fact that most young people are ignorant of the importance of having a daily evacuation from the bowels, and are consequently careless about securing this every day.

When the constipation has lasted for some time, some of the ill results which it entails begin to make themselves felt. They generally take the form of impaired appetite, lassitude, headaches, and discomfort after food, due to flatulent distension. Purgatives are now used, and for a time their regular employment affords some relief. Such purgative is not always effective. It is not unusual for a patient to tell you that the taking of a purgative has for its immediate result an aggravation of her symptoms, which would prevent her from using this remedy, were it not that she cannot procure an action of the bowels without its help. The further development of the symptoms varies. In some those referable to the stomach are most prominent, and not a few have been treated for gastric ulcer; pain after food, vomiting, and even hematemesis being present. In others pain referred to the right side of the abdomen is the most prominent feature. This pain is frequently diagnosed as having its origin in the appendix, in the ovary, or in the right kidney, which in these cases is nearly always abnormally mobile. Not a few of these patients have had the appendix or ovary removed without obtaining any relief from the pain. In one case which came to me the patient had been operated on seven or eight times. She had had her ovary removed, her appendix taken away, her kidney fixed, her gall bladder explored, and, in addition, had two or three operations for the separation of adhesions, with no relief. Lastly, in a few cases the more aggravated conditions described by Lane is met with. These patients suffer from continual lassitude, mental depression, want of appetite or even a disgust for food, chummy skin, cold hands and feet, and constant headaches.

Coming now to speak of the condition inside the abdomen, one generally finds a much dilated, movable, cæcum, which has already dropped into the pelvis, and the hepatic flexure pronounced downwards so as to be on a level with the iliac crest, or even lower. In most cases a well-marked Jackson's membrane, stretching from the abdominal wall to the ascending colon and cæcum, is present, and not infrequently the lower end of the ileum exhibits the condition known as Lane's kink. In one case on which I operated recently
there was marked hyper trophy of the muscular coat of the lower end of the ileum, showing how much obstruction is caused by the condition I am describing.

The first part of the transverse colon lies parallel with the ascending colon, to which it is often adherent. The middle part of the transverse colon often reaches down to the pelvic brim, where it ascends almost vertically to the splenic flexure, which is nearly always in its normal position.

The condition of the duodenum, especially in those cases where gastric symptoms are prominent, calls for notice. The first stage is often found to be elongated and dilated, while on turning up the transverse colon it is seen that the third stage is prolonged down behind the mesentery of the small intestine, sometimes as far as the pelvic brim or lower, whence it ascends to its termination, where it may be kinked. This condition of the duodenum is one which is of considerable importance. In my earlier operations I did not pay as much attention to it as I should have done, and the results were naturally affected.

In most cases the right kidney is found to be movable. The intestinal conditions I have mentioned can usually be discovered by the help of the X-rays, and this method of examination is one that should always be carried out.

This being the anatomical condition, the question arises what means we have at our disposal to deal with it surgically. I would emphasise that I am now considering only those severe cases where the evidence of mechanical obstruction is clear. The two extremes are represented—the one hand by operations which have for their object the suspension of the displaced organs to some more or less fixed portion of the abdominal wall, on the other by complete excision of the large intestine, with the excision of the rectum.

With regard to the former, I have carried out suspension of the stomach and colon, according to both Rovsing’s and Coffey’s methods, and, while the immediate results obtained were encouraging, the ultimate results were disappointing. Invariably patients have come back after an interval of a few months complaining of a return of their old symptoms.

Lane’s operation of ileo-sigmoidostomy has never been regarded with much favour by me, and I have only carried it out on two occasions—each time with discouraging results.

Operations having for their object the removal of the Jackson’s membrane, or the straightening out of the Lane’s kink, have been devised, but I regard such operations as being unsound in principle. I have seen, whatever its origin, helps in suspending the cecum, thus lessening the tendency to prolapse. It may by its attachment to the ascending colon give rise to narrowing of this part of the intestine in places, though I have never seen any case where I could say it gave rise to definite mechanical obstruction. Its division, while it may relieve kinks, must tend to further prolapse of the ileum, to which it is attached, a suspensor ligament—which prolapse would, I believe, more than neutralise any good effects produced by the straightening out of the intestine. With regard to Lane’s kink, whatever the view held as to the origin of the band which produces it—whether it is a crystallised resistance or a persistent factal fold of peritoneum—it also acts as a suspensory ligament for the cecum, which tends to give support. Its mere division must have the effect of allowing a more marked descent of the cecum.

The removal of the whole of the large intestine is a formidable operation, and, judging by the results of another operation, the details of which I am about to relate, it is unnecessarily severe.

This procedure, the one which I am concerned with this evening, is an operation suggested by Patterson, and consists in removing the cecum, including the caecum, and greater part of the transverse colon. It thus removes the part of the large intestine which is most frequently at fault, and in which, as shown by X-ray examination, delay of feces most commonly takes place. At the same time it leaves behind a considerable length of colon, so that there is still support of this to enable the absorption of watery elements of the intestinal contents to take place, which absorption is probably the principal function of the large intestine.

Furthermore, by relieving the stomach of the drag produced by the weight of the loaded transverse colon it tends to remedy the downward gastric displacement which is frequently present.

The method which I have used in carrying out this operation is briefly as follows: The incision is made over the outer border of the right rectus muscle, beginning at the level of the umbilicus and extending downwards for about four or five inches. This may seem a rather small incision, but in most cases it will be found to be quite ample. The anterior layer of the rectus sheath is divided for the full length of the incision, the edge of the muscle drawn inwards and the posterior layer of the rectus divided. It is sometimes possible to avoid dividing the nerves which run in the posterior layer, but generally one of these has to be sacrificed. The cecum, the ascending colon, and the adjacent part of the transverse colon can now usually be drawn completely outside the abdomen. If Lane’s kink of the ileum be present, it will be necessary to divide the membrane which binds down this part of the intestine. Beginning above the situation of the kink, the mesentery of the ileum, cecum, ascending colon, and transverse colon, up to the point where the latter begins to rise towards the splenic flexure, is transfixed and tied by series of ligatures. The mesentery is then divided between the ligatures and the intestine, so that the latter is completely free except at the two points where carrying out this part of the procedure it is necessary to see that the ligatures are tied very tightly, and that the mesentery is not divided too close to the ligatures, as otherwise one of the latter may slip—an accident which happened in one of my cases. The ileum is now crushed, and the crushed portion ligatured. The distal part is then clamped, and the ileum is cut through just posterior to the ligature. The end to which the ligature has been applied is invaginated by a double row of Lembert sutures. A similar procedure is carried out with the transverse colon, thus completely freeing the part of the intestine to be removed. The ileum and transverse colon are now clamped as in the operation of gastro-enterostomy, and an anastomosis between these two portions of the intestine is done. The loop formed by the free edge of the mesentery of the ileum is then closed by suture. On now examining the back of the abdominal wall it will be found that there is a space demided of peritoneum. This space can be considerably reduced by a suture, but in most cases some space will be left. I consider it advisable that a drainage tube be inserted to that end. The tube may be brought out through the wound or inserted through a puncture made in the loin.
abdominal wound is then closed in the usual fashion.

The operation is rather a tedious one; the shock follows in which I have succeeded in doing it is an hour and a half. Notwithstanding the time required, and the fact that the patients are always in a rather poor condition, the operation is usually very well borne. In only one case was the shock severe, and that was the case of a patient who had been bedridden for a number of years owing to rheumatoid arthritis. In some cases I have used novocaine and quinine and urea hydrochloride, according to Crile's technique, apparently with some benefit, especially in the reduction of subsequent pain. In a few cases I have thought it advisable to give an injection of pituitary extract to combat the shock.

The subsequent progress of the patients is usually uneventful. In a few cases some suppuration has occurred in the neighbourhood of the drainage tube.

A purgative is generally administered on the third day, the one which I recommend being castor oil. In some cases where mist, some co, was used the patient suffered from diarrhoea, which continued for some days.

I have now operated on twenty-one cases with these cases, giving a mortality of 14 percent. This is, of course, much too high, but I think the mortality is capable of being reduced almost to nothing. The three cases in which death took place were among my earlier cases. In one of these death was due to the slipping of a ligature, leading to haemorrhage. In another death resulted from shock. This was the patient to whom I have already referred who had been bedridden for several years previously. She was in a very weak condition, and in her case, I think, some less severe form of operation should have been tried.

In the third case the patient, after the operation, was found to be vomitting everything she took. At first I attributed this to the effects of the ether, especially as her symptoms otherwise were quite favourable. When the vomitting persisted after the second day, it was obvious that some other cause was at work. The vomitting was of the regurgitant character seen in intestinal obstruction, and the vomited matter consisted merely of bile mixed with whatever liquid she had taken previously. I reasoned that I had met a false diagnosis, and I then thought that some obstruction had taken place in the duodenum and reopened the abdomen, doing a gastro-enterostomy, but she died of shock following this operation. No post mortem examination could be done, and at the time of the second operation, beyond determining that the stomach was much dilated and the jejunum contracted, I could not ascertain the exact cause of the obstruction.

I must express myself as being extremely well pleased with the results I have obtained by this operation. In every case, as soon as the patient was able to be up and about, the bowels have begun to act regularly every day. Appetite improves, headache and vomitting, if previously present, disappear. The patients rapidly acquire a feeling of comfort and well-being, a feeling which in many cases they have not experienced for years previously. Improvement in appearance is often remarkable; the sallow complexion which they generally present is soon replaced by an aspect of vigorous health. In only one case have I been told, in reply to my inquiries, that the patient is still troubled with gastric disturbances. In that case the displacement of the duodenum, to which I have referred, was very marked. There was a very distinct kink at the junction of the duodenum and jejunum, and she will, I fear, require an operation to remedy this.

In conclusion, I would express the opinion that in this operation we have an efficient and comparatively safe method of dealing with a condition, which is frequently met with, and is the source of much misery to those who suffer from it.

DISEASE IN ITS RELATION TO ACCIDENT. (a)

BY J. SMYTH MORROW, M.D., B.C.H.,
Physician to the Royal Victoria Hospital, Belfast.

FOLLOWING Mr. Douglas Knocker, B.L., in "Accidents in their Medico-Legal Aspect," Dr. Morrow used the word "accident" in its widest sense, as "any mishap or untoward event which is not expected or designed," and pointed out that an accident in this sense might produce litigation on four grounds: 1st, an insurance policy; 2nd, negligence; 3rd, breach of contract; 4th, the Workman's Compensation Act of 1906, and its schedules of industrial diseases.

He cited cases illustrative of the first three groups, and dealt in more detail with the fourth group.

In the latter he dealt first with the intoxications, making special reference to alcoholism and lead-poisoning, subdividing alcoholism into chronic alcoholism, delirium tremens, and acute alcoholism, and acute drunkenness. He laid stress on the fact that the chronic alcoholic man is regarded as a healthy man from the point of view of the one who injures him. The same held good in cases of delirium tremens, but with regard to acute alcoholism or drunkenness, if a workman was performing his duties in a drunken condition and met with an accident, such an accident would, under the Act, be held generally to be due to the man's serious and wilful misconduct, and the employer would not be held responsible. He illustrated this by a case:

A workman at a local shipyard was found about 2.15 in the afternoon lying at the bottom of a ship's hold in a state of snoring unconsciousness. He had been missing from his post, and in the forenoon it was known that he had been drinking during the dinner-hour, and had evidently fallen down a ladder into the hold on resuming work after the dinner-hour. He was taken in the ambulance to the Royal Victoria Hospital, where the house-surgeon used the stomach tube and relieved him of a large quantity of unmistakable potter. The man had sustained a fracture of the collar-bone, and later on he claimed from the firm for compensation. His claim was dismissed by the Recorder on the medical evidence of drunkenness.

Lead Poisoning.—The dependents of a deceased workman could claim for death when they could prove that the lead poisoning was the cause of death, but where the death was not proved to have been due to the sequence it was not necessary to prove that the condition found were in fact the sequent of that disease, not merely that they might have been.

He gave an illustrative case:

A painter in a local shipyard was seized with sudden unconsciousness and died in twelve hours. His doctor certified the cause of death as cerebral haemorrhage. An examination of the body disclosed a blue line on the gums, nor had there been any history of colic, constipation, wrist-drop or

(a) Lecture delivered at the opening meeting of the Session 1914-1915 of the Ulster Medical Society.
ankle-drop. A catheter sample of the urine revealed no lead by the potassium bichromate test. This was the scar of an old chancre, and some adenitis of the groins and neck. His doctor stated that some years previously he had treated him for a severe attack of syphilis, and the doctor, in the face of this fact, did not feel justified in advising the man’s dependents to claim for death from lead poisoning, as they proposed doing at first.

Dealing with this disease, the lecturer said that it was not an uncommon thing to find in cases of minor accidents where the healing process was going on with unaccountable slowness, that the patient was suffering from glycosuria, and that an improvement might be effected by attention to this latter condition. Cases arose where it was difficult to say whether the glycosuria existed prior to the accident. If the patient had been admitted to hospital at the time of the accident, an examination of the urine would have been made as a routine measure on admission, but in cases outside hospital the practitioner would be well advised to examine the urine early in all cases of interest. There was no doubt that injury to the spinal cord or brain could cause diabetes, but he had seen cases where there was no cord or brain injury. The presence there was of a peculiar pathogenic type of man who received contusions to his shoulders and back. Six weeks after his contusions had cleared up he started generalised tremors. Under examination his arms and legs shook until he perspired, and he simply yelled if touched anywhere. These were his only symptoms. The tremors were clearly under the control of his will to a certain extent, so that he could only be regarded as a mixture of neurasthenia and malingering. The doctors concerned did their best to effect a settlement, but the case dragged on for three years, at the end of which time the man’s tremors were gone; but his anxiety about a settlement, which had all along been very marked, was now intense, indeed painful. His urine had been examined at intervals from the first, and now for the first time revealed sugar. Soon after he evinced delusions of persecution, and in June of this year was committed to the asylum at the instance of the police. He was improving, but the sugar still continued intermittently in his urine. He therefore came under the control of the prolonged strain of the unsettled case, with its attendant worry, anxiety and privation, were responsible for the diabetes.

Specific Infections Diseases.—Dealing first with pneumonia, it was recognised that septic pneumonia was a not infrequent occurrence from the result of an accident to some part of the body other than the chest, but it must be borne in mind that a pneumonia might happen to a person who had received an injury, and yet there might be no connection between the pneumonia and the injury. To take an instance:

An elderly man—a shipyard worker.—was struck on the forehead by a piece of iron on February 3rd. The wound was a slight one. He did not keep to the house, but went about in the very severe weather that then prevailed. Six days after the accident he died from pneumonia. At the post mortem held by Professor Symmers the wound was found to be quite healthy, and the pneumonia was of pure lobar type. At the inquest Professor Symmers expressed the opinion that the pneumonia was unconnected with the accident and held it to have been from natural causes, and the solicitor acting for the relatives of the deceased was satisfied with this view.

Syphilis.—The protean manifestations of this disease had to be watched for constantly in patients who had been subjects of accidents. Take an instance of a man who worked at a rivet point sustained an abrasion of the skin. It was slight at first, but he went on to ulceration which rest and local treatment failed to cure. A history of syphilis is elicited, and possibly confirmed by a Wassermann test, and the exhibition of anti-syphilitic treatment would in a short time heal the ulcer, put an end to weekly dose suspensions, and enable the man to resume his work.

To take another instance:—A man twisted his right knee at his work, deranging the internal semi-lunar cartilage. Later on he underwent operation for this, and a perfect result ensued so far as the knee was concerned. Soon after he complained of dragging of the toes of that foot, and evinced all the signs of an isolated paralysis of the external popliteal nerve. He had got hold of the notion that in the operation for the removal of the injured cartilage from his knee some nerves had been cut, causing the paralysis of his toes, which view was anatomically impossible. His pupils were irregular, his knee-jerks sluggish, and an asympathetic reflex of the knee was impaired. He admitted a history of syphilis. A Wassermann gave a doubtful result, but under anti-specific treatment he speedily recovered from his paralysis and resumed his work.

Not infrequently one came across men following their employment while the subjects of fairly advanced communicable or morbid arterial syphilis which might be aggravated by, or sometimes was attributed entirely to, a twist received at work, and if actual evidence of an injury was forthcoming the firm had to shoulder responsibility. Or a fall in a dark alleyway on board a ship might disclose the fact that there had been no obstruction in the way to cause sudden paralysis of the foot or leg, but the man’s impaired co-ordination had been at fault.

General Paralysis of the Insane.—He related an interesting case where G.P.I. was unsuccessfully contended to be due to a head injury. A riveter at the shipyard received a trivial cut on his forehead at the latter end of July, 1910. No report of the accident was made to the firm until September, when it was noted that the man had been worked as usual for several months with the company, but that he had been attending hospital at a date antecedent to this head injury, viz., early in June, for this arm injury, received outside the firm. An investigation of the hospital records showed that the observant surgeon in the extern, when treating this arm injury, had noticed his irregular pupils, headache, weakness in his legs, and hearing loss, and had made an entry of G.P.I. in the Extern Case Notes. The case was brought to Court later on, but the Judge dismissed the claim on the medical evidence. This showed, incidentally, the great value of a case note taken at the time.

Syphilitic Arteritis attacking the aorta and other large arteries and leading to aneurysms had to be borne in mind in cases of sudden death at work, and syphilitic endarteritis, with resulting thrombosis, presented interesting problems occasionally. Take the following case:

A man, aged 35, received a blow on the left side of the head when working in the shipyard. The blow did not render him hors de combat, and he resumed work next morning as usual. Three weeks later he developed aphasia and left-sided
paralysis. He was taken to hospital, where the Wassermann test was twice positive, and syphilitic endarteritis, with resulting thrombosis, was diagnosed as the anti-syphilitic treatment and recovered the almost normal use of arm and leg. Some time later he was again stricken with paralysis. Recovery was more gradual. The Wassermann test was again positive. In the Court the plaintiff's case, as put forward by his medical man, was the ingenious one that the blow produced contre-coup. This was to explain the left-sided paralysis, but the aphasis could not be explained on this theory. The case was decided in favour of the employers on the medical evidence.

Heart Disease.—Sudden failure of the heart due, for example, to aortic valve disease or to long-standing intrinsic muscular degeneration, might easily be the beginning of the heart as a secondary effect of embolism, might present a condition which might at first sight appear to be attributed to an accident. This might be illustrated by a case:—

A stager at the shipyard fell on a ship's deck, sustaining contusions of his left arm and knee. He insisted on being taken home instead of to hospital. He was free from any symptoms for four weeks. At the end of that time I examined him, found that his contusions had cleared up, but that he was suffering from mottled incoherence and left hemiplegia. He said he never could understand why he fell at the time of the accident. The doctor attending him agreed with me that the man's case was one for medical negligence. We advised him, as the outlook seemed fit for work was bad, to place himself in the hands of a solicitor. This was done, and the man's solicitor being satisfied that there was no legal claim, a gratuity was given to the man by the firm, the legal expenses paid, and the compensation determined by agreement.

Diseases of the Alimentary System and Sudden Death.—Diseases of the alimentary system, while playing a considerable part in causing death, had not hitherto been regarded as responsible for sudden death as generally understood, and hence had not provided as the result of the death of the case such as appeared to be diagnostically provided; but the time appeared to have arrived to alter our views about this. Professor Symmers' remarkable series of autopsies on twenty-four cases carried in dead to the Royal Victoria Hospital, Belfast—persons who had simply collapsed and died, sometimes when at their work, a few minutes, or even a few days after, seemed to point to hemorrhagic pancreatitis as being responsible for many sudden deaths, the cause of which had hitherto been regarded as obscure. Apart from their great medico-legal interest, the scientific interest of these cases was very great. It was difficult to corroborate the phenomenon evinced in these cases (alcoholic indigestion—sudden death, gastric hyperemia of a peculiar form, and a necrotic condition of the pancreas) to the ordinary theories held regarding sudden death from shock. The result of Professor Symmers' further investigations was awaited with keen interest.

OPERATING THEATRES.
ROYAL FREE HOSPITAL.
OPERATION FOR BURSA OF THE SEMI-MEMBRANOUS.
Mr. Willmott Evans operated on a man, A. C. D., who complained of a swelling behind his knee. The patient had noticed the swelling for some time, and it was steadily getting larger. While he was at rest it gave him no pain, but when he walked it interfered slightly with the use of the leg. On examination a swelling was noted of a bursa, which was felt to be on the inner side of the right knee on its posterior aspect. When the limb was extended the swelling was tense, but fluctuation could be felt in it. As the knee was flexed, it became more tense and less perceptible, and on complete flexion it could not be felt at all. Above the skin over it was unaltered and the swelling was firmly fixed, in every other respect the man was quite normal. A diagnosis of effusion into the semi-membranous bursa was made.

The patient having been anaesthetised, and the skin painted with a 2 per cent. solution of iodine, an incision was made an inch and a half long over the long diameter of the swelling. The cyst was then laid bare and incised, and a few drops of purulent material evacuated. The greater part of the cyst wall was then cut away, the skin sutured, and a dressing applied.

Mr. Evans said of the many bursae in the neighbourhood of the knee, the most accessible, that is, and that affected is the prepatellar bursa, and next to it in frequency comes the bursa under the tendon of the semi-membranous. The tendon is inserted into the inferior tubercle of the patella, which is the anterior aspect, and also a little to the inner side, and the point at which is placed between the tendon and the bone above its insertion, is doubtless intended to prevent friction between the tendon and the bone. Therefore it would come most into use in the fully extended position, and the frequency of its enlargement is probably due to some sudden action of the muscle bruising the bursa when the leg is fully extended. The infusion into the joint is a notable feature in the case, and the little disability in the movements of the knee, but it never causes much pain.

The diagnosis is easy. A fluctuating swelling in this situation of slow enlargement, and unaccompanied by any definite pain, can hardly be anything else but an effusion into the semi-membranous bursa. The treatment, Mr. Evans pointed out, may vary: sometimes aspiration of the contents is quite sufficient, but usually the swelling recurs. It is not essential that the whole bursa should be dissected out, though if this be done it is necessary to remove no less than the whole bursal lining, and it is usually sufficient to cut away a large portion of the sac wall so as to lay the interior of the bursa open to the lymphatic spaces of the part; then if excessive effusion continues the bursa may be laid open, the bursa being cut off by the surrounding lymphatics. In all operations on this bursa, and also on most other bursae in the neighbourhood of the knee-joint, it must always be borne in mind that it is not rare for a communication to exist between the bursa and the knee-joint; and such a communication is especially commonly found in the case of the semi-membranous bursa: therefore all precautions such as would be employed if the knee-joint itself were being opened should be taken to prevent any probability of sepsis. It might be asked what happens when this bursa has been removed: does the friction occur which it was designed to prevent? The answer is that another bursa develops; in fact, it may be said that wherever friction is present a bursa can develop in loose connective tissue; these adventitious bursae arise by the multiplication of the connective tissue corpuscles, which then arrange themselves so as to form a pocket. Professor Symmers has noticed that the synovial membrane or from one of the neighbouring bursa, and when situated near joints, they may closely simulate enlarged bursa.

The wound healed by first intention, and the patient was able to leave the hospital ten days after operation.

Dr. J. S. Wigham, as President of the Dublin University Biological Association, delivered last Saturday evening an inaugural address on 'The Influence of Science on Modern Medicine.'
TRANSACTIONS OF SOCIETIES.

MEDICAL SOCIETY OF LONDON.

MEETING HELD MONDAY, NOVEMBER 25TH, 1914.

The President, Sir John Bland-Sutton, in the Chair.

ADJOURNED DISCUSSION ON SURGICAL EXPERIENCES IN THE PRESENT WAR.

[SPECIALY REPORTED FOR THIS JOURNAL.]

Mr. D'Arcy Power said the wounds which came under his own observation in hospital, were for officers at Fishmongers' Hall, and at the Victoria Hospital, Chelsea, had been caused by shrapnel casing, shrapnel pellets—all of which there were at least two varieties—conical bullets, and large shell. He had not had cases of lance, bayonet, sword, or saber wounds. He exhibited two sovereigns which were driven into the thickest part of the erector spinae of an officer, who was wearing a money belt. One coin bore the impress of the other, even to the milled edge, both coins were crumpled up and were conceivably driven in together, though driven in together, they lay widely apart in the muscle. One of the coins had communicated the transverse process of the fourth or fifth lumbar vertebra at about an inch below the crest of the ilium. There had been a number of instances of concussion of the cord and of peripheral nerves. Though a group of nerves had been paralysed, exploration failed to reveal any gross lesion. Usually he was content to follow the track of a bullet rather than to attempt to cut down directly upon it. The track was often a devious one, and seemed to depend more upon the position of the patient and the tension of the tissues than upon the position of the bullet. The latter. He had been struck by the number of complete perforations in which only the points of entrance and exit had suppurated, the intervening track having healed before the patient reached the hospital. In the few cases which had sinuses he did not hesitate to lay them freely open when that was possible. Even in large wounds it was better to lay open the pocket than to trust to gauze plugs and drainage tubes. This he combined with general irrigation. He did not use dressings, as they stuck to the wound. Bicarbonate of mercury, corrosive sublimate, Sanitas, and boric fomentations had been largely used, but not carabolic acid. In the case of sloughing wounds he had not hesitated to amputate before operating for sloughing wounds, it had been their custom to have a bacteriological examination made of the secretion, particularly in order to determine whether the tetanus bacillus was present. If so, a prophylactic dose of antitetanic serum was given on the day preceding the operation. He preferred lumbar puncture to subcutaneous injection. His view was that surgeons were at present inclined to be meddlesome in chest cases. By the time these patients arrived at the base hospital the pleura was filled with a blood-stained serous effusion, there was a high temperature, difficulty of breathing, and the man looked ill. Aspiration gave relief, but the pleural cavity quickly refilled. A piece of rib was then excised, and in place of the serous effusion pus soon poured out. He would be willing for these chest cases to be under the care of the physician, the surgeon only being called in if the physician thought it desirable. If wounds became painful after having once healed, they should be explored. In each of these cases he had seen, the surgeon had been rewarded by finding a foreign body.

Mr. Charters Symonds wished to express his sympathy with the Committee of the Society on the use of the gauze drain when suppuration existed. He thought much was to be gained by this discussion, because all surgeons did not treat these injuries in the same way. In the case of compound comminuted fractures and wounds of joints, for in those cases life and limb were in peril, and the surgeon's purpose should be concentrated, in the first place, upon saving both, leaving the refinement to the specialist. The diagnosis had arrived after an interval of two to ten days from the infliction of the injury. Even after 48 hours some wounds were so offensive as to be almost unbearable, and yet the general condition was, as a rule, very good, and it seemed as if one bean of pus, or broken the pain was very slight. The septic condition was not due to lack of dressing and attention on the way home; in fact, he wished to express his high praise for the medical officer present and efforts in this way. In the case of fractures with shell or bullets, he thought it best to be content with a warm antiseptic application. In one case of had comminuted fracture of the humerus, which came in on November 17th, the patient, who had been with the skin suppurating and red, he made a simple incision for better drainage and introduced a rubber tube. And though he could feel with his finger small fragments, they were left. He was then grieved each day, and at the end of three weeks he had made a very good recovery. He went out on the fourth week with a soundly united bone, but with a small sinus. In another case a man had a bullet wound through his tibia, which was broken up badly, a large piece having been lifted from the anterior surface. Though a direct bullet wound, it was most offensive. Fomentations were applied, without any surgical interference, and he also, at the end of the third week, had got a good line of drainage. The bone was probably to be remedied by removing a piece of bone. He doubted whether some cases which had been operated upon for removal of bone and irradiated had gone as well as those who had only had the wound dressed. Stronger limbs were likely to result, though there might be imperfections in alignment. It was generally agreed that the better method of treating joint wounds was by the application of boric fomentations, and gentle washing with a mixture of hydrogen and water, but there were many instances in which the question must arise whether more active measures should not be undertaken. He gave two examples of that. Sometimes the effort to save a limb was unavailing, as in the following instance. An officer arrived on the tenth day after receiving severe shell wounds. He came with his left arm amputated, and his foot and ankle septic. There was also a dirty, ragged and offensive wound in the popliteal space, some portions of bullet having entered from the inner side. In such a case, with the wound deep and ten days old, should immediate amputation have been performed through the thigh? As his temperature was 101°, his popliteal space was in a condition such as that at the last examination. He improved for some days, and the temperature fell. But on the seventh day after admission it rose again to 103°, and the ankle-joint was opened and pus evacuated. Three days after this there was still some apparently septic material in the popliteal space. As this was repeated on the following day, he opened the popliteal space, and on passing his finger in to ascertain whether a foreign body was present, there was such a rush of blood that he realised the popliteal artery was broken up. A small fragment of the nickel casing of a bullet was found lying on the far side of the artery. It had wounded both artery and vein. He tied the artery and vein, as he wished to give him chance to form a union. He discharged the artery in the apex of Scarpa's triangle. But next day the foot was discoloured and the leg septic, and he was compelled to amputate below the ligation. The temperature had been normal for several days. He thought it might have proved fatal; whereas the temporising had doubtless brought the man into a condition in which he could not be saved. He had found that it was better to examine and drain, and, if the artery was damaged, to ligature some distance above. In cases of compound fracture which he had treated at Guy's, he made it a practice to apply a plate, with which to hold the fragments while callus formed, and enabled more satisfactory dressings to be applied. To open a clean bullet wound, unless to secure a bleeding point, he
regarded as unjustifiable. He thought Sir Watson Cheyne had done good service by bringing the proposition back to carbonic acid; and it was going to be heard that Lister's great experiment had not been failed in the case of greatest wounds. For supporting joints and compound fractures he relied on carbonic acid and the spirit of methyl alcohol. In the case of an amputation in rectified mercury; 2 per cent was found to be of value in the case of lacerated wounds. He would like to know the results of the application of the various antiseptics to wounds of the skin. He was aware that the use of chloroform was not recommended by Lister, but he employed it at the close of the operation on the median nerve of the arm, and also on the other side of the body, as he thought the introduction of the antiseptic spirit seemed a just experiment.

Mr. R. P. Watson-Jones also emphasised the dirty condition under which the soldiers had to fight and the difficulties with which Sir Watson Cheyne had to contend. He thought the unavoidable delay in treatment which ensued, the unavoidable delay in treatment which ensued, the failure to apply the sound advice which Sir Watson Cheyne gave at the opening of the debate. Their surgeons in France were doing the best they could.

Dr. C. T. Dixon expressed the opinion that the comparatively good results observed in the cases under treatment were due to the employment of antiseptics. He thought the employment of antiseptics was a type of a movement in surgery, rather than a complete change. He thought the one thing that should be kept in view was the protection of the skin. He thought the use of antiseptics was useful in that direction. He thought the antiseptic process was of the greatest importance in the present day, and he thought the time would come when, in the absence of complete ligation, the employment of antiseptics would be found to be of great value in the management of wounds.

Dr. G. S. H. Watson said that in the cases of amputation he had performed in the military hospitals in France and Belgium, the employment of antiseptics was of great importance. He thought the employment of antiseptics was of great importance in the management of wounds.

Dr. J. B. Watson also emphasised the dirty condition under which the soldiers had to fight and the difficulties with which Sir Watson Cheyne had to contend. He thought the unavoidable delay in treatment which ensued, the failure to apply the sound advice which Sir Watson Cheyne gave at the opening of the debate. Their surgeons in France were doing the best they could.

The discussion continued for the remainder of the meeting, with contributions from various surgeons and medical officers, discussing the effectiveness and limitations of antiseptics in military surgery.
SPECIAL REPORTS.

ULSTER MEDICAL SOCIETY.

The second meeting of the Ulster Medical Society was held in the Medical Institute, College Square, N., on Thursday afternoon, November 20th, at 4.15. Dr. J. S. Morrow (President) occupied the chair, and there were upwards of fifty fellows and members of the Society present.

The Chairman referred in feeling terms to the loss which the Society had sustained by the death of Dr. John Milroy.

The meeting took the form of a demonstration of cases showing chiefly diseases of the skin as follows:

Dr. Wm. Calwell: (a) Man with peculiar form of syphilis; (b) man with tertiary syphilide about elbow; (c) man with tuberculous skin; (d) woman with pruritic urticaria; (e) woman with early lupus erythematosus treated with carbon dioxide show; (f) psoriasis of face in a girl; (g) acute generalised purpura in a child; (h) scrofuloderma of arm in a girl, with distribution on skin supplied from 7th C, and 1st D. segments of the spinal cord; (i) favus in a boy; (j) photograph of a woman with pernicious anaemia, showing marked meleano-leuco-derma; (k) photograph of case of Fröhling's syndrome in a young woman; (l) photograph of a case of extensive molluscum contagiosum in a young girl.

Dr. M. Kissak: A case of acroagaly.

Mr. Mitchell: (a) A case of solid oedema of the face; (b) a man with ichthyosis; (c) specimen—excised gall-bladder with large number of gall-stones; (d) a case of skin graft of upper eyelid.

Mr. Kirk: Specimen from a case of ulcerative colitis treated by excision.

Mr. Fullerton: (a) A case of skin grafting of upper eyelid; (b) a case of club-foot treated by tarsctomy.

Dr. Houston: (a) A series of cases of acne, showing the results of treatment by vaccine; (b) some cases of eczema.

Dr. Rankin: (a) A series of cases of lupus vulgaris; (b) a series of cases of rodent ulcer, showing Lenthal Chadwick's distribution; (c) a case of lupus erythematosus.

Mr. Stevenson: A case of bone transplantation after removal of sarcoma of the femur.

Dr. T. Kilken (Larne): (a) specimen of calcified hydrocele of tunica vaginalis testis; (b) specimen—meningo-ccele successfully removed from a child aged three weeks; (c) a case of ichthyosis.

Dr. R. J. Johnston: Specimen of a pseudo-myxoma of the peritoneum.

Sir Ronald Ross, K.C.B., F.R.S., will deliver the first of two lectures under the Chadwick Trust on "Government and Military Sanitation in the Tropics," on Friday next, December 4th, at 5 p.m., at the London School of Economics, Clare Market, Kingsway, W.C. Sir James Chrichton-Browne, F.R.S., will preside.

Dr. G. B. Morgan, J.P., the Senior Surgeon of the Royal Infirmary, Sunderland, who has recently retired from that position, has been the recipient of a letter treating of the value of the 1914 Medical Relief Fund, and recommending that he be given the sum of £200.

The Acting Registrar having called the roll, the President announced that letters had been received from Sir Isambard Owen and Colonel David Hepburn, expressing regret for their inability to be present.

The Special Reports, the General Medical Council.

HUNDREDTH SESSION.

FIRST DAY, TUESDAY, NOVEMBER 24TH, 1914.

The President, Sir Donald Macalister, in the Chair.

The Acting Registrar having called the roll, the President announced that letters had been received from Sir Isambard Owen and Colonel David Hepburn, expressing regret for their inability to be present.

The Official notice of the appointment of Dr. Magennis as representative of the Apothecaries' Hall of Ireland for one year from August 1st, 1914, was read.

Dr. Magennis was introduced by Sir Lambert Ormsby.

The President delivered the following address:

Gentlemen,—We begin to-day the hundredth session of the Council. In ordinary times it might be tempting to improve the occasion by offering you his reflections on the Council's past history. But these are not ordinary times. New history is in

BELGIAN MEDICAL MEN AND PHARMACISTS' RELIEF FUND.

Donations received at the offices of the Medical Press and Circular. —

| Dr. J. A. Shaw-Mackenzie | 3 3 0 |
| Dr. J. Rowlette | 2 2 0 |
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Mrs. Thomson | 1 0 0 |
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Mrs. W. V. Thompson | 1 0 0 |
Miss Ensor | 1 0 0 |
Poor Patient | 0 5 0 |

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THE MEDICAL PRESS. 573

Dec. 2, 1914.

SIR DONALD MACALISTER, in the Chair.

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the making, day by day, for the British Empire and for the world. The Council is called upon to take an active part in meeting the national emergencies that have arisen, and will arise, in connection with the comfort and Medical Services of the Empire. Its members and officers are preoccupied with the urgent duties of the present hour. They have neither leisure nor inclination to indulge in retrospect. I content myself therefore with the remark that the Council, in the fifty-six years since its establishment, has steadily advanced in usefulness and influence. It has successfully endeavoured, within the narrow limits of its statutory powers, to improve medical education and discipline. It possesses to an increasing extent of the confidence of the professional authorities of the nation. All over the Empire bodies of similar constitution and powers have by degrees been constituted, for the promotion in the several dominions of the same purposes; and the methods of these bodies follow closely the model which the Council has evolved, and which it has proved, in the course of its long experience, to be effective.

Before I pass to matters that must forthwith occupy our attention, I have once again to record with regret the loss of a valued colleague by death. The Right Hon. Sir Christopher Nixon, who was to the last earnestly interested in the Council and its work, passed away in July of this year. Dr. Ayley-Curran, who held the office of Professor of the Apothecaries' Hall of Ireland, since 1895, completed his last term of service on August Ist. His place is taken by Dr. E. Magennis, Governor of the Hall, to whom on your behalf I have just now offered a welcome.

The value of the able assistance at this Session of our General Registrar, Mr. N. C. King, has been long an officer in the London Rifle Brigade, in which he now holds the rank of Major.

Mr. Cockington has been appointed Acting-Registrar in the meantime. Thanks for the devotion and that of his wife in this office, the current work has been carried out to the complete satisfaction of the President and Treasurers.

Two meetings of the Executive Committee have been held to deal with this and other emergencies created by the national situation. It is proper that I should make public reference to some of these.

The steps necessary for the official publication of the British Pharmacopoeia, 1914, were entrusted to the Executive Committee at your last Session. The work was begun in July, and was completed in October; under normal conditions it would have been duly published early in that month. After the outbreak of war, it was considered inopportune to order publication without giving longer notice than was considered sufficient, and accordingly it was arranged that for three months advance copies should be made freely accessible for reference by persons interested, and the date of publication was postponed to the last day of the year of issue. The postponement of the Grids, which were given to the Editor's time to re-examine minutely the typography of these advance copies, and they have prepared a short list of corrections, to be made in the text as published.

The Executive Committee had also to consider whether any inspection and visitation of qualifying examinations, and of examinations for Diplomas in Public Health, which were provisionally arranged for the year 1915, should in the altered circumstances be proceeded with. It was known that some of the licensing bodies were about to hold special examinations, to meet the case of candidates who had completed the curriculum and were desirous of offering themselves without delay for military service. It was foreseen that, during the next year, occasion would arise for holding such examinations as are the usual and recognized practice. It was accordingly decided to send a Council the expediency of deferring the proposed inspection for the present, with a view to its resumption when normal arrangements are re-established.

Communications were received from several professional authorities enquiring as to the propriety of modifying or suspending some of the existing regulations in the case of students whose regular course of study for a medical qualification might be interrupted by the current emergency. The Executive Committee thought it right to intimate by means of a circular addressed to all the licensing bodies, the answer it gave in the name of the Council to the general question thus raised. In view of its importance, I venture to think it well to repeat here the words of the answer:

"With regard to the courses of study and examination prescribed for professional qualifications, it is the statutory duty of the General Medical Council to secure that they ensure the maintenance of the standard of efficiency as shall sufficiently guarantee the possession by candidates of the knowledge and skill requisite for the efficient practice of their profession.

"To this end the Council has formulated, for the guidance of the licensing bodies, a series of Recommendations respecting such courses. These Recommendations represent in general terms the minimum curriculum which, in the Council's opinion, should be required by the licensing bodies; and the Council notes with satisfaction that the Regulations of the several bodies give effect to them.

"Cases may arise in which, during the present national emergency, the bodies deem it expedient to modify or suspend the application of their Regulations to particular candidates; but the Council expects that all such cases shall be duly recorded and reported to the Council in the usual way.

"The Council feels sure that, in dealing with applications for modification or suspension of their Regulations, the licensing bodies, in the public interest, of maintaining unimpaired the present standard of knowledge and skill required of all who seek to be admitted to the status and privileges of registered practitioners; and will accordingly accord their fullest consideration and support to bodies of health, in every instance, that the requirements of the minimum curriculum are substantially fulfilled."

We have reason to believe that this statement has commended itself to the authorities concerned, and to the profession at large. Multitudes of our medical brethren have nobly offered themselves for service with our troops at home and abroad. Many have already laid down their lives in the performance of that humane duty. The toll of war is not yet complete. We must face the certainty that ere long the bodies of some of our more efficient military reserves are necessary to supply the places of those who fall on the field of honour. These reserves will be constituted by those whom we are now admitting to the status and privileges of registered practitioners. We must therefore see that the Council in its wisdom almost surely safeguard the welfare of our forces and our people, if we do all in our power to secure that the men who enter the profession now are as fully and efficiently trained as their predecessors for the service they will soon be called to render. The need for efficient physicians and surgeons, in the field and at home, is not less urgent than the need for efficient soldiers and sailors. I have felt it my duty to press this consideration on senior students, who, though they may not occupy forms, but to the bodies already ready to forgo the prospect of early qualification and to enrol themselves straightway in the combatant forces.

It is currently reported that, owing to the war, the number of students, of all years, enrolled for the present annus medicus is much below the average. If this be true, the risk of a serious shortage in the future supply of qualified practitioners would appear to be imminent. The data in the possession of the Council do not enable me to furnish an answer to the question as to how many students have registered. The public authorities interested in the subject. I have therefore thought it desirable to procure, so far as I could do so on my own responsibility, materials for a trustworthy estimate of the aggregate numbers likely to be ready for qualification in the next two or three
SPECIAL REPORTS.

The complaints of laxity in these respects, which were not infrequent at the beginning of the year, have now practically ceased.

On August 4th, when war was declared, the House of Commons ordered to be printed the Report of the Select Committee on Patent Medicines. The findings and recommendations of the Committee have been the subject of much comment, and, indeed, the Council’s most careful attention. They testify in vigorous terms to the existence of a "grave and widespread public evil," and of an "intolerable state of things," for which new legislation, "rather than merely the alteration of existing laws, is urgently needed in the public interest." The Council, at the instance of its Unqualified Practice Committee, to which this Report has been referred, has more than once expressed similar conclusions; but hitherto without too far as they had been concerned. It is earnestly to be desired that, even in days like these, when the conservation of the public safety is the paramount objective of the Government, some earnest thought should also be given to the conservation of the public health, which is preyed upon by insidious and unscrupulous mercenaries.

The Report of a Departmental Committee of the Board of Education, appointed to consider the "practicability of the Board with regard to the acceptance of certificates from unregistered practitioners," which was issued in July, may be taken as an indication that the State Authorities recognise some at least of the dangers of laissez faire in the matter of unqualified practice. After stating that "whatever may have been the intentions of Parliament in passing the Dentists’ and Physiotherapists’ Acts, the position of the Provinces of Canada have so far omitted to entertain the question of reciprocity which this country has, made to them. The result is that certain of the surgeons, fully qualified under the provincial laws, find themselves debarred from acquiring what may be described as an Imperial status in the British Register. The remedy lies with the Provincial Authorities. I am not without hope that the representations which have been addressed to these authorities, in the interest of the Imperial services, will induce them to consider afresh the question of reciprocity. The war has made it clear that account must now be taken of its Imperial as well as its local aspects.

In India the legislation for the regulation of medical practice, of which I spoke last May, has now been extended to Madras. Communications from other parts of India, bearing on the same subject, have been under the consideration of the Executive Committee, and have been promptly dealt with. Negotiations with the Government of Madras have been entered into at the instance of the Examinations Committee, in relation to Indian students of medicine and to members of the Subordinate Medical Services, are still proceeding.

The necessary preoccupation of Parliament with measures of emergency has prevented progress with the Midwives (Scotland) Bill, and with the Bill introduced on behalf of the Privy Council Office for improving the procedure in elections of direct representatives to the Medical Council. The Highlands and Islands Medical Practice Committee, some of whose members of the Council, has been undertaking to carry forward its statutory work under the difficulties incident to the present situation. It has formed regulations for the Service, which are to be submitted for approval to the Treasury and the Secretary for Scotland. The draft was courteously communicated to the Executive Committee, and after examination was found to contain no proposals to which the Council could object. We have learned that the National Insurance (Disability) Act has occasioned much delay in the matter of sickness and disability certification, with a view to such modifications of the existing practice as will remove the professional objections urged against it by the Insurance Act Committee on your behalf. In that respect the Committee encountered no objection to action taken by the Council to impress on practitioners their special responsibility in relation to certificates, and to methods of procuring patients, has had a wholesome effect.
F. F. P. S. Glaes. 1905, for the removal of his name from the Medical Register on the ground of his having ceased to practice.

The Committee resolved:—"That this request be reported to the Council, with a recommendation that it be accorded to.

On motion from the Chair it was agreed:—"That the recommendation of the Executive Committee be adopted.

Moved by the CHAIRMAN of the Business Committee, seconded by Sir John Moore, and agreed to:—

That the following report from the Executive Committee be received and entered in the Minutes:—

At its meeting on July 13th, 1914, the Executive Committee considered business arising out of the following resolution adopted by the General Council on June 1st, 1914:—

That it be delegated to the Executive Committee to make all necessary arrangements for the inspection and visitation of qualifying examinations directed to begin in 1915, and to nominate to the Council, at its November Session, suitable persons for appointment as Inspectors.

According to the Standing Orders three inspectors—one for Medicine, one for Surgery, and one for Midwifery—must be appointed for definite periods. The remuneration is fixed at five guineas for each day during which the Inspector is absent from home on the business of the Council, together with an allowance for actual travelling and living expenses.

The Committee authorised the Registrar to obtain from the licensing bodies the dates of their qualifying examinations to be held during the year 1915 and to take other preliminary steps.

At a meeting on the same day also considered business arising out of the following resolution adopted by the General Council on June 1st, 1911:—

That it is advisable that all examinations conducted for the purpose of conferring the several registrable Degrees, Diplomas, or Certificates in Sanitary Science, Public Health, or State Medicine, specified in Table G. at page lxiv. of the Medical Register, should be inspected, and that it be remitted to the Executive Committee to consider and report upon these arrangements for the inspection.

The Committee resolved to report:—

(a) That an inspection of all the examinations for diplomas in public health should be commenced in 1915. Those bodies whose examinations in public health have been instituted since the last inspection should also be visited.

(b) That one inspector should be appointed for all the examinations, and should be remunerated on the same scale as the inspectors of the final examinations. Where practicable a member of the Council should accompany the inspector as visitor.

The further consideration of the appointment of an inspector was postponed till the next meeting of the Committee.

At a later meeting held on September 15th, 1914, subsequent to the outbreak of the war, the Committee discussed what further action, if any, should be taken in regard to the visitation and inspection of qualifying examinations, and of examinations for diplomas in public health, respectively, during the year 1915, when the examination was resolved:—"That the resolutions of July 13th, 1914, be rescinded, and that the Executive Committee report to the Council that in view of the present unusual conditions it is inexpedient to proceed with the proposed inspection and visitation of qualifying examinations and of examinations for diplomas in public health during the year 1915."

On motion from the Chair it was agreed:—"That the proposal of the Executive Committee be approved.

Strangers then withdrew and the Council deliberated in camera.

Strangers having been readmitted, the President announced that the Acting-Registrar had been directed to restore to the Medical Register the name of Mr. Walter Randall Knightley, and to notify him accordingly.

Moved by the CHAIRMAN of the Business Committee, seconded by Sir Henry Morries, and agreed to:—

"That the following report from the Executive Committee made pursuant to Standing Order VII., in regard to an application from the University of Allahabad, be received and entered in the Minutes:—

The Executive Committee reports that Part II. of the Medical Act (1860) having been extended by an Order in Council to the Empire of India (see Minutes, 1914, No. 56) has considered an application from the University of Allahabad for the recognition of its degrees of M.B. and B.S., for registration in the Colonial List of the Medical Register of the United Kingdom; and has adopted the following resolution:—

That any person who holds the degrees of M.B., and B.S., of the University of Allahabad shall be entitled to be registered in the Colonial List of the Medical Register, provided he satisfies the Registrar of the General Medical Council regarding the other particulars set forth in Part II. of the Medical Act, 1886."

The Council, after deliberating in camera, subsequently adjourned.

(TO BE CONTINUED.)

CORRESPONDENCE.

FROM OUR SPECIAL CORRESPONDENTS AT HOME.

SCOTLAND.

WESTERN INFIRMARY OF GLASGOW.

At the fourth annual meeting of contributors, the Lord Provost (Chairman), referred to the facts as extremely gratifying that the working-men's subscriptions showed a further increase, notwithstanding the stringent measures of the Inland Revenue. No fewer than 1,993 subscriptions are paid in this year, and the medical staff and the medical staff of the medical staff are either at the front or attached to military hospitals at home, and 70 trained nurses in the institutions are in similar positions. The Western Infirmary has not hitherto been used for wounded soldiers or sailors. It has nearly 700 civil patients awaiting admission, and although the managers would be glad to do all in their power in the treatment of those wounded in the war, they have thought it their duty for the present to devote their attention to their ordinary work. The Lady Hoyle Convalescent Home at Lanark, belonging to the Infirmary, has been opened, and is being used as a convalescent home for wounded soldiers. The medical and surgical staff of the Infirmary are doing their share of the military work. Colonel Mackintosh is Assistant Director of Medical Services for the Lowland Division of the Scottish command, and Miss Gregory Smith, the Matron, is Principal Matron of No. 3 Military Hospital, Stubbil.

Cancer in Ayr.

Some time ago it was suggested that there was a "cancer street" in Ayr. The Medical Officer of Health, Dr. W. F. Brown, reports that during last year there were 47 deaths from cancer in the burgh; and, after transferring 7 to other authorities, the death-rate from cancer is 1.83 per 1,000. The rate for ayr, he says, was not a low one. This was due to the fact that there was a higher proportion of persons over 50 years of age than in working-class communities.

In his report he has stated that it was only a matter of opinion there was no evidence that local causes had any influence on the cancer mortality. It was, however, a matter with which the Corporation proposed to deal more fully in the future. It, however, could be no doubt to do with the prevention and cure of the disease, and several Corporations, notably Portsmouth, had taken the matter up and issued advisory pamphlets in this attention. It has been shown that early symptoms and the need of these being seen to.

VICTORIA CROSS FOR CAPTAIN RANKEN.

The honour of the Victoria Cross has been post-
Correspondence.

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Letters to the Editor.

[We do not hold ourselves responsible for the opinions expressed by our correspondents.]

Amylène Hydrate, as an Anesthetic and Hypnotic.

To the Editor of the Medical Press and Circular.

Sir,—The toxic properties of amylène hydrate are, I fear, not fully recognised, although it is many years since that great observer and physiologist, Professor Pasteur, pointed out the dangers inherent in the use of this drug. Its physiological effects on the respiratory, vascular, and nervous systems.

Our knowledge of amylène hydrate dates from 1780, when Karl Scheele commenced his investigations into the nature of fuel oil. To this substance M. Auguste Cahours gave the name amyl álcohol, because it was obtained from bodies containing starch. From amylose, which contains two starch-like bodies, came amylène, which is the name of the substance obtained by distilling it with chloride of zinc.

Pasteur, in 1885, pointed out that the rotary powers of different samples of amyl álcohol vary according to the source from which they are obtained. The production obtained by the action of the chloride of zinc was considered to be pure amylène (C₃H₆O), formed simply by the removal of the elements of water from the alcohol, contained at least three distinct hydrocarbons—anhydrite, paraldehyde, and acetone.

It is said that the amyl álcohol obtained from the process of distillation was at times toxic when the volume of air was diminished, and that it was dangerous to inhale.

Sir,—I read with interest your issue of November 11th, Dr. Hawthorne's paper on "The Ophthalmoscope in General and Medical Practice." It seems to me that his conclusions on the subject are sound. It is consistent with the highest traditions of the profession that the physician, on the one hand, and the surgeon on the other, should appeal regularly to the general practitioner what additional or substituted means of diagnosis the latter might adopt in the routine investigation of cases, regardless of their part in any professional disadvantage to them which might follow upon the general practitioner adopting their suggestions. It is abandoning, to a certain extent, a trench in the fight against disease, not to the enemy, but to an ally: leaving to the physician and the surgeon the fresh aim of the battle. The application of electricity to the ophthalmoscope having made its instantaneous use perfectly simple, it seems to me that Dr. Hawthorne is right in pressing the instrument upon the attention of the family doctor. There is no reason to suppose that the patient, accustomed hitherto to an examination by stethoscope, will find the application of the ophthalmoscope, though novel, to give him any alarm or discomfort whatever.

Sincerely yours,

Sir, yours truly.

November 25th, 1914.

Reflectors.

Alcohol and the War.

To the Editor of the Medical Press and Circular.

Sir,—In his interesting letter, Dr. Thomas Dutton surely mixes up two distinct issues. I do not want to revive the old controversy about "the moderate drinker," but as it is notorious that the vast majority of our soldiers if tempted to drink are in great danger of becoming immoderate in their use of alcohol, it seems safer for the general public to assume total abstinence, especially since it is demonstrated that alcohol is not a food of any value, nor necessary for the preservation of vigour. The other issue—the value of alcohol in treatment of the wounded soldier—is quite different. But it would be an error to require a vast number of experiments carried out in the strictest scientific fashion to prove that in small doses alcohol does "set up phagocytic action and prevents sepsis in the wounded." Applied externally, alcohol is, of course, an antiseptic, and, diluted in the form of wine, was used in the dressing of wounds in ancient days. In such a form it might still be useful in the lack of a modern antiseptic. But it goes beyond my imagination that a minute quantity passing through the circulation could produce the antiseptic effects Dr. Dutton believes in.

There is very little use for alcohol in medicine or surgery. It may be good to cause reaction in some few cases of shock, but in a vast number of such cases both milk or hot soup can produce a little that is not much less injurious to the depressed system which always follows alcohol.

I am, Sir, yours truly.

Therapeutist.

December 2, 1914.
MEDICAL NEWS IN BRIEF.

The Metropolitan Asylums Board.

It is announced that a sub-committee of the Metropolitan Asylums Board have agreed and forwarded to the Local Government Board sketch plans prepared by the architect, Mr. E. T. Hall, for the erection of sanatoria (1) for 232 women at Hyde Style, near Godalming, at an estimated cost of £44,218; (2) for 185 men at Folbridge, near East Grinstead, at an estimated cost of £20,600; (3) for 175 men at Ellisons, near Basingstoke, at an estimated cost of £29,075. In the case of the proposed sanatorium at Godalming the Local Government Board has already given its general consent to the plans. The plans for the sanatoria at East Grinstead and Basingstoke are still under consideration.

Royal Naval Medical Service.

The following have been appointed temporary Surgeons by the Admiralty — E. R. Bailey, to the Vener, additional, vice Watson, and A. R. MacMullin, to the Pembroke III., additional, for R.N. Air Service, both to date November 27th; H. M. Crowell and C. W. Wheeler-Bennett, both to Hospital Ship Garth Castle, to date December 3rd; T. S. Harrison, to the Victory, additional, for Portland Hospital, vice Briscoe, undated; A. F. Barrett, G. F. Deas, D. A. Brown, and J. B. G. Pembroke, additional, for Chatham Hospital; and C. S. Archer, to the Victory, additional, for Haslar Hospital, all to date November 27th.

Army Medical Service.

R.A.M.C.—Following Lieutenants resign their temporary commissions: R. D. Macpherson, M.B., J. B. Moore, M.D. (November 28th). The following to be temporary Quartermasters, with hon. rank of Lieutenants: F. W. Nelson, G. M. Radley, and F. J. Koehler (November 27th); H. E. Crowell and C. W. Wheeler-Bennett, both to Hospital Ship Garth Castle, to date December 3rd; T. S. Harrison, to the Victory, additional, for Portland Hospital, vice Briscoe, undated; A. F. Barrett, G. F. Deas, D. A. Brown, and J. B. G. Pembroke, additional, for Chatham Hospital; and C. S. Archer, to the Victory, additional, for Haslar Hospital, all to date November 27th.

OBITUARY.

DR. SKOTTOWE, HELSINKI.

On the 16th ult., there died at Mohammedah, Persian Gulf, Dr. A. J. F. Skottowe, Medical Officer there of the Anglo-Persian Oil Company, who was about 48 years of age, and qualified at Glasgow University in 1883, becoming M.D. in 1890. Dr. Skottowe was for 15 years Medical Officer of Health for Helsinki, and brought about reforms at the hospital and in the sanitary condition of the town which put the burgh in the very front rank of health resorts. He resigned his position at Helsinki about three years ago, and took up the post at which he died. Dr. Skottowe was a second cousin of Lord Roberts, who on more than one occasion visited Dr. Skottowe's mother at Helsinki. He leaves a widow, a son and a daughter.

Dr. Eustace Smith.

We regret to announce the death of Dr. Eustace Smith, the well-known authority on diseases of children, which has taken place in his 86th year. Dr. Smith, who became M.D. Lond. in 1865, and F. R. C. P. Lond. in 1874, received his medical education at University College, London, and Paris. He was one of the founders of the East London Hospital for Children, of which institution he was Consulting Physician at the time of his death. He was also Consulting Physician to the City of London Hospital for Diseases of the Chest. Dr. Eustace Smith was physician to the late King of the Belgians, to whom he was created a Chevalier of the Order of Leopold. His best-known work was that on the “Wasting Diseases of Infants and Children,” which reached six editions, and his “Practical Treatise on Disease in Children,” which attained three editions, was marked by sound clinical acumen. He was also the author of numerous articles and papers upon subjects connected with his specialty.
NOTICES TO CORRESPONDENTS. The Medical Press. 579

Dec. 2, 1914.


MEDICAL WAR ITEMS.

The King at the Front.

This visit of H.M. the King to the General Headquarters of the Expeditionary Force in France will give unsounded satisfaction to the British people, and the presence of His Majesty among his troops at the front will be universally felt to be a source of inspiration and encouragement.

The theatrical profession in England, whose generosity is proverbial, have undertaken to equip a ward of twenty beds in the new Red Cross Hospital at Stamford Street, Waterloo.

The following account of his experiences as a lieutenant in a field-ambulance of the Royal Army Medical Corps is contributed to the Times:

"Before the advent of the motor ambulance the whole duty of conveying wounded from the battlefield to the clearing hospital (in practice, this meant railhead) fell to the field-ambulance. The latter were open three-wheeled ambulances—among other vehicles—which are pushed forward during an engagement as near to the firing line as is consistent with moderate safety, and the wounded are then conveyed in the 'horsedoms' behind the firing line. In the course of the protracted semi-siege-like battles which are characteristic of this war, it is usually only under cover of darkness that it is possible for the wagons to approach the ambush, and the collection of wounded is accordingly begun (by the wagons) at dusk. Having collected the wounded, the wagons are driven to the headquarters of the field ambulance, which may be two or three miles away from the point at which the patients are fed on hot beef tea, soup, tea, milk, or other sustaining food. Their wounds are alsoressed if necessary, and operations of urgency can be undertaken.

"In some cases it may happen, as at the battle of the Isonzo, that the headquarters of the field ambulances are so near to railhead that the wounded can be transferred straight to ambulance trains or to clearing hospitals in which they can await the arrival of medical supplies. A rule of thumb is that there is nearly always a gap of some miles separating the headquarters of the field ambulances and the nearest available point reached by ambulance trains. It is this gap which the motor ambulances are employed to bridge, and most excellently do they it. Before they appeared, all sorts of shifts were necessary. It must be understood that whenever the troops advance (or retire) the field ambulances are required to advance (or retire) with them. It is essential, therefore, that the field ambulances should retain their cases for as short a time as possible, for it is obvious that they cannot move with the troops if they are encumbered with cases. The motor ambulances, working rapidly backwards and forwards between railhead and the field ambulances, achieve a double object; they ensure speedier and far more comfortable transit for the wounded to those places where their wounds can best be treated and healed; and they enable the field ambulances to retain their full mobility and so serve most efficiently the needs of the troops among whom further fighting occurs.

"The motor ambulances run so speedily up and down that the field ambulances are never allowed to get choked up with cases, even after a big engagement. If the order comes to march before all the wounded have been conveyed, all the cars, all our work is to send word to the latter that the cases are lying in a certain house or farm, and to leave one or two orderlies behind to look after them until the motor ambulances reappear. At the same time these vehicles work in fleets of five. Some of the fleets which visit the field ambulances are manned by Red Cross officers and men. English or American, some by the Royal Army Medical Corps. The cars in use present a variety of types and fittings. Lately a car resembling a small omnibus has made an appearance; it takes sitting cases only, and can accommodate ten or a dozen. Incidentally, every class, from the wealthy owner driving his own car to the ordinary chauffeur, turned soldier for the occasion, is represented on the driving seats of our motor ambulances. Many have subscribed, or have been asked to subscribe, to the funds being raised for these cars may rest perfectly assured that their money is bringing a real boon to the fighting troops.

"An officer in the R.A.M.C. describes his experiences at the front also in the Times as follows:

"I will try to describe an entraining of wounded we had to carry out a few days ago. As a preliminary my train lay two miles outside the town, and there was no vacant siding for us. The fighting front was almost parallel with the railway line, and about six or seven miles away, the surrounding country was flat, with a low ridge of hills in the distance. With the naked eye we could see German captive balloon floating in the air, evidently acting as an observation post for their artillery fire. The roar of guns was continuous, and all along the ridge of hills we could see the smoke balls of bursting shrapnel. It was a beauty clear, and in the afternoon aeroplanes passing along the position, often almost lost to sight by the smoke of the shrapnel fired at them by anti-aeroplane guns. At one time I saw eight aeroplanes at once, two of them scouting, I suppose (I will never wish to see them in action again). I have a good pair of German Zeiss glasses, and it was really thrilling to watch the aeroplanes working. We watched this till dusk, and then the train was moved forward into the railway station. Here it would require a Zola to describe the scene.

"Very little light, all the platforms crowded with refugees, shells falling with terrific noise in a distant part of the town. All the entrances and waiting rooms full of stretcher cases. Two or three aeroplanes; every available corner crowded with wounded that could walk. The air was quivering under the weight of heavy guns firing about half a mile from us, so much that I had to have all the cases carried to prevent them from falling. Well, the work of entraining the wounded began according to the definite system on which I have trained my personnel. My train is a quarter of a mile long, and consists of first and second-class carriages (corridors) communicating one with another. Each corridor is a ward, and the seats prepared as beds. The extreme value of organisation was never more proved or more highly tested than it was that night. Railway shrapnel began to fall ten or twenty yards from the train, and this excited the unfortunate refugees, who were crowding into special trains as fast as they could. By 10 p.m. we had completely filled the train and evacuated nearly 400 cases, one-third of which were stretcher cases. Off we moved for our destination and began the work of washing, redressing, dressing wounds, resetting fractures, and last but not least, feeding our patients. Twelve hours later, by the time we had reached our base, every wound was dressed and a nominal toll of patients was ready, while every patient was suitably clothed and clean. Detaiming took some six hours, and in another ten hours all suitable cases were in England, and those unfit in the field hospitals, having been sent to hospitals at the base. A fresh supply of stores had been obtained, food, medical supplies, and dressings, and we were on our way up to the front again. This is a very condensed description of what we did to us every 24 hours. The evacuation and treatment of our sick and wounded is a phase of the war of which my corps will be very proud when the history is written and which must very materially conduce to the success of field operations of the troops.

NOTICES TO CORRESPONDENTS. &c.

For Correspondents requiring a reply in this column are particularly requested to make use of the distinctive Signature "Reader," "Scholar," "Old Scholar," etc. False con-
fusion will be spurned by attention to this rule.
VACANCIES.

The Royal National Hospital for Consumption, Ireland.—Assistant Resident Medical Officer. Salary £290 per annum, with board and residence. Also a Laboratory Assistant. Salary £21 per week, with customary holiday. (See 2nd, p. 1.)

Presbyterian Royal Infirmary.—Assistant Resident Medical and Surgical Officer. Salary £210 per annum, with board, residence, and salary. Assistant Resident Medical Officer. Salary £150 per annum, with board, lodging, and laundry. Applications to Reginald A. Goodman, Secretary, 2nd, p. 1.

Trouton and Somerset Hospital, Axbridge.—Senior House Surgeon. Salary £200 per annum, with board, residence, and salary. Application to the Secretary, 5 Wincherry Street, Bristol.

York County Hospital.—Medical Officer and House Surgeon. Salary £150 per annum, with board, residence, and salary. Application to Mr. W. Trolley, 253, W. 0., 2nd, p. 1.

The Medical Press.

APPOINTMENTS.

RAW, STANLEY, M.D., B.S. Durh., F.R.C.S.Edin., has been appointed Honorary Surgeon to the Sunderland Royal Infirmary.

TAYLOR, JOHN MAXWELL, M.A., M.B., Ch.B. Aberd., D.P.H., Assistant Medical Officer and House Physician, has been appointed Medical Inspector of Scholars to the Borough of Bolton.

BIRTHS.

BEECH.—On November 2nd, to Mr. and Mrs. G. N. Beech, of 31 Wimpole street, and 2 Blackheath Road, Wondsworth, Common, S.W.—a son.

CARLILE.—On November 22nd, at 13 Melavon Avenue, Liverpool, the wife of Oliver Carlyle, F.R.C.S., of a daughter.

CURTIS.—On November 24th, at 23 Beaverton Mansions, Clapham Park, the wife of Captain Kenneth Curran, Royal Army Medical Corps, of a son.

FAKERSON.—On November 21st and 28th, at 84 Harley Street, the wife of H. A. T. Fairbank, M.R.C.S., of a daughter.

MCCULLUM.—On November 21st, at 9 Temple's Avenue, Golders Green, the wife of W. H. McCullum, F.R.C.S., of a son.

SEYMOUR PRICE.—On November 27th, at 57 Sloane Gardens, S.W., to Dr. and Mrs. P. Seymour-Price—-a son.

WINE.—On November 24th, at Ferndale, Cawston Road, Clifton-on-Sea, the wife of Charles Stewart Wink, M.R.C.S., L.R.A.M.C.—a daughter.

MEETINGS OF THE SOCIETIES, LECTURES, &C.

WEDNESDAY, DECEMBER 2ND.

ROYAL SOCIETY OF MEDICINE (SECTION OF OPHTHALMOLOGY) (1 Wimpole Street, W.)—8 p.m.: Discussion opened by Mr. Harold B. Grimsdale on the necessity for an exact definition of bilateral infarction. (See 2nd, p. 1.)

ROYAL SOCIETY OF ARTS (John Street, Aldwych, W.C.)—8 p.m.: Dr. W. R. Grimes—Clinical Cases of the Clinical Hospital, Tottenham, N 7.—4.1/2 p.m.: Clinical Meeting.

THURSDAY, DECEMBER 3RD.

ROYAL SOCIETY (Burlington House, London, W.)—M. de Lange—On the History and Development of Medical Education in the Netherlands. (See 2nd, p. 1.)

ROYAL SOCIETY OF MEDICINE (SECTION OF ONCIOLOGY AND GYNAECOLOGY) (1 Wimpole Street, W.)—8 p.m.: Specimens by Dr. Clifford White, Dr. H. MacNaughton-Jones, Dr. Trevor H. Davies, Dr. C. Hubert Lockyer, and Dr. C. Hubert Lockyer. Short Communication by Dr. Thomas G. Stevens, Dr. C. Hubert Roberts, Dr. Edward Sued, and Dr. Herbert Spencer.

ROYAL SOCIETY (Burlington House, London, W.)—M. de Lange—On the History and Development of Medical Education in the Netherlands. (See 2nd, p. 1.)

ROYAL SOCIETY OF ARTS (John Street, Aldwych, W.C.)—8 p.m.: Dr. W. R. Grimsdale—Clinical Cases of the Clinical Hospital, Tottenham, N 7.—4.1/2 p.m.: Clinical Meeting.

FRIDAY, DECEMBER 4TH.

ROYAL SOCIETY OF MEDICINE (SECTION OF LARYNGOLOGY) (1 Wimpole Street, W.)—8 p.m.: Discussion opened by Mr. Harold B. Grimsdale on the necessity for an exact definition of bilateral infarction. (See 2nd, p. 1.)

ROYAL SOCIETY OF ARTS (John Street, Aldwych, W.C.)—8 p.m.: Mr. John E. Eyre—On "Preventive Isolation," by C. G. Sims Woodhead, M.D., F.R.C.P., F.R.S.Edin.

DEATHS.

GREENWELL.—On November 26th, at 60 Fortune Lane, Golders Green, N., Edward Greenwell Greenwell, M.R.C.S., L.R.C.P., aged 87.

MUSGRAVE.—On November 21st, at Peasenhall, Suffolk, Charles Robert Musgrave, M.D., F.M.B., aged 49 years.

SHERWIN.—On November 21st, at Hackney, Bannister, William Simpson, M.D., M.B., aged 75.

SHEET.—On November 6th, at Mohamed Dar, Persia, Alex. John Francis Skettowe, M.D., Glasc., late of Helensburgh, aged 40.


STEEL.—On November 21st, at Croydon, Surrey, Dr. C. G. Sims Woodhead, M.D., F.R.C.P., F.R.S.Edin.

THOMPSON.—On the 21st inst., at Croydon, Henry George Thompson, M.D., V.D., J.P.
NOTES AND COMMENTS.

The Belgian Doctors' Fund. Fund have been announced. The Irish medical profession has responded with a handsome list, which will be found elsewhere in our columns. Scotland is also responding to the cry of Belgian distress, and to-day Professor Jacobs, of Brussels, will address the Edinburgh Obstetrical Society upon "The Position of the Medical Profession in Belgium." The meeting takes place in the rooms of the Society at 8.30 p.m. on our day of issue, Wednesday, the 9th December, under the presidency of Sir J. Halliday Croom. In Liverpool a meeting was held on Friday last. Our list has been augmented during the week, thanks in great measure to the exertions of Dr. H. Macnaughton-Jones. With regard to the whole question, it may be noted that the enlarged central committee has apparently not adhered to the original resolution of the small "provisional" committee of eight to purchase 2,000 packages of drugs at £5 each for despatch to Belgium, and has substituted the policy of sending 50 such packages as a tentative measure. It is interesting to note that the small provisional committee felt justified in its earliest meetings in sanctioning an expenditure of £10,000, as it affords some indication of their views as to the amount likely to be forthcoming in response to their appeal. For our own part, we still believe that no effectual and permanent relief can be offered to the Belgian doctors and pharmacists by private philanthropy alone, and that the sensible and statesmanlike course would be to urge upon Mr. Asquith's Government the desirability of granting an adequate loan for the purpose. Elsewhere we publish a list of additional contributions that have come during the week to the offices of the Medical Press and Circular,—also the Irish list. It need hardly be said that we shall be extremely grateful for any further donations that may be sent either to the English or to the Irish Editor.

The Sale of Poisonous Drugs. The lax way in which poisonous drugs are often sold to the public is abundantly illustrated in the reports of police and coroners' courts proceedings. The legislature has logically gone to the root of the matter, and has endeavoured to safeguard, so far as may be, the sale of poisonous drugs. Its results show, however, that their well-meant efforts fall lamentably short of the mark when applied to the daily life of the community. The poison schedule might in all probability be strengthened with advantage. Veronal, for instance, which is at present in Schedule II. of the Sale of Poisons Act, might be brought under the more stringent restrictions of Schedule I. That drug is still responsible for deaths, and it is little short of a scandal that its sale should not be better safeguarded than by affixing the word "poison" and the name and address of the vendor upon the appended label. The failure of the Act, however, may be attributed in no small degree to defective administration, a not uncommon flaw that undermines many a sound and desirable law.

Evasion of the Act. The fact of the matter is that the conditions attached to the sale of schedule poisons are often openly and flagrantly broken. That fact is demonstrated with monotonous persistency year in and year out by the evidence before the courts whose duty it is to inquire into accidental and criminal deaths from poisonous drugs. It is only in rare instances that the police take action in such cases against the vendors, so that the failure of the Sale of Poisons Act may be ascribed to the supineness of the Home Office and of the local authorities primarily concerned. Why should not the Public Prosecutor intervene if it be shown clearly in a public judicial court that any person has sold a schedule poison without due observance of the statutory conditions imposed upon the transaction? If the scope of his official duties be too restricted, or if he is afraid to permit him to undertake so elementary a task as that of the protection of human life against an obvious statutory danger, then let the State extend his office and add to his powers. So far as that goes, he should, in our opinion, be required to look after the sale of a great number of dangerous drugs which are not at present scheduled, but which are more or less capable of doing a vast amount of damage to the health of our citizens.

A Case for the Police. A case in point may be taken from the Coroner's Court of the City of London, where the death of an Indian subject from the drugs of cocaine and morphine was recently investigated. Deceased lived with a retired civil engineer, and both were addicted to drug habits. While on a visit to London the female was found unconscious, and died shortly afterwards under circumstances that left no reasonable doubt that the death resulted from narcotic drugs, to the taking of which deceased had for many years been addicted. The engineer stated in evidence that he had known her take ten grains of cocaine in one day. The point with which we are more immediately concerned, however, is that part of the evidence in which the engineer swore he had obtained cocaine of a Holborn chemist and did not sign the poison
book. Several of the bottles were produced in court and were without label or any indication of any kind whatever as to the poison or its nature, the name and address of the chemist. Neglect of statutory precautions in this way clearly becomes an offence under the Act, and the learned coroner, Dr. F. J. Walsh, very properly called the attention of the City Police to the matter, in order that the truth of the engineer’s evidence might be sifted, and, if necessary, a prosecution might be there after undertaken. The matter is one of considerable social importance, and the report of the police investigation will be awaited with interest. As things stand, it seems pretty evident that it is to the zeal and efficiency of police administration that the public must look for the proper enforcement of the Sale of Poisons Act. We hope to deal further with this matter at a future date.

**Iodine in the Field.**

Now that the futility of attempting to carry out the principles of asepsis in the treatment of wounds inflicted in battle has been recognised by the medical staffs of the Allied Forces, there seems to be a likelihood of some uniformity in the antisepctic employed in first-aid. The French soldier has for some time been equipped with his own field-dressing of iodine, in the shape of two small glass bulbs joined together by a neck, one containing a little tincture of iodine, and the other a brush for applying the same to a wound. It was announced last week that Sir Frederick Treves, with the full approval of the War Office, has been enabled, through the generosity of two private donors, to effect an improvement in the medical equipment of the troops at the front. The British Red Cross Society and the St. John Ambulance, it is understood, will now make it possible for every man armed with a kit a neat little ampoule of iodine, prepared by English manufacturers, so that the British soldier shall not be behind his French colleague in the important matter of first-aid equipment. If by this means the number of suppurating wounds can be reduced, with all their untoward sequelle, the innovation will indeed be a blessing.

Since the publication of our last list, the following casualties among medical officers serving at the front: have been reported:—Officers killed: Major P. P. Atal, I.M.S., and Capt. Indarjit Singh Kunwar, I.M.S. Officers died of wounds: Lieut. G. H. Chisnall, R.A.M.C. Officer previously officially reported missing, now unofficially reported prisoner of war: Captain H. G. Robertson, R.A.M.C. Officer reported wounded from Persian Gulf: Major T. G. F. Paterson, I.M.S.

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**LEADING ARTICLES.**

**MODERN MEDICAL JOURNALISM AND ITS DIFFICULTIES.**

Medical journalism, needless to say, is intimately concerned with the welfare and the progress of the learned profession with which it is connected. Upon its accuracy, its uprightness, its impartiality, and its general good faith and tenacity to high ideals depends to no small extent the progressiveness of the medical world, not only in its collective ethics, but also in its politico-social and in its scientific aspects. That being so, we make no apology for referring pointedly to a recent occurrence in that particular branch of journalism to which attention has been drawn. The matter has been called attention to by more than one correspondent. It is a sin of omission—if sin it be—rather than of commission, and it is to be hoped, for the credit and honour of certain of our leading journals, that some ample, convincing explanation may be forthcoming. In our issue of November 15th we commented upon a series of eleven cases of poisoning by amylene hydrate, a hypnotic drug of comparatively recent introduction, at Bethlehem Hospital. The facts were simple: a temporary assistant medical officer, in the absence of a dispenser, dispensed the medicine with his own hands, and instead of the diluted preparation gave one ounce undiluted to each of the eleven patients, five of whom died shortly afterwards and a sixth at a later period. The case was clearly one of misadventure; it was one in our opinion that pre-eminently called for mention and comment in a medical journal. The drug concerned is seldom used, we believe, outside asylum practice, but it was regarded as a safe hypnotic; on that account its adoption into general practice would sooner or later inevitably follow. So far as the medical man is concerned his part, although unfortunate and calamitous, was one that would secure sympathy rather than blame from his medical brethron. As to the system that left the dispensing of such drugs, whether temporary or a habitual, in the hands of any but a skilled dispenser that is a point demanding, in our opinion, careful investigation, with a view of the prevention of similar accidents in future. From all points of view, that of the medical man chiefly concerned, of the ancient institution in which these fatal poisonings occurred, of the medical profession requiring scientific information, of asylum inmates demanding future protection, and of the public interests, we venture to assert that the case demanded full and impartial notice in our professional journals. What are the facts? Two inquests were held, but we fail to find a line of editorial comment in either the British Medical Journal or the Lancet. Were it not for the notice in our own journal the future student of toxicology would ransack in vain the columns of the two former journals for any record of so tragic and important an event as that of six fatal cases of poisoning by amylene hydrate. That being the case, it remains only to speculate as to the silence observed by the two journals in question. It is difficult to accept either of the explanations that would, perhaps, be sufficient in the case of journals of lesser standing, namely (1) that the matter was purposely hushed up; (2) that it was not regarded by the editors as sufficiently important to be noticed in their columns. We should be sorry to attribute in either case either lack of independence or of journalistic competence. For all that the fact remains, and the medical world, in our opinion, is entitled to ask
for some explanation, which will doubtless be forthcoming. The fatal poisonings took place at no remote date, and it is still open to the journals in question to publish an account of the inquests and to comment upon the whole matter from the various scientific, administrative and medico-social aspects. Failing some such step a somewhat unhappy doubt will be thrown upon the vigilance and impartiality that are usually associated with two at least of the journals that claim to form medical opinion.

Then, again, the scientific aspects of the case are of considerable interest. The learned coroner, Dr. F. J. Waldo, suggested at the inquest that death was due to acetone intoxication, a possibility that was not disheartened by Dr. Spilsbury. In our issue of December 2nd the history of the drug was reviewed by a correspondent, Dr. George Foy, of Dublin, who showed that our knowledge dated from the researches of Karl Scheele into the nature of fusel oil in 1780. The first fatal case was reported in 1857, in which year the Academy of Medicine of Paris recommended the disuse of the drug. In curious contrast with the silence of our contemporaries is the wide publicity given to the asylum fatalities in the Ibb Press.

CURRENT TOPICS.

Thanatology.

There is usually supposed to be some difference between life and death. The conditions are not commonly confused. We see a man walking in the street, and, however antediluvian his mentality and semi-comatose his manner, we still know, in our heart of hearts, that he is alive. Life has never been efficiently defined. It is too common. We are so surrounded and imbued with it and its many manifestations that we cannot dissociate ourselves from it. We cannot look at it disinterestedly from the outside and give an unprejudiced account of it. No one has disinterestedly eye-witnessed life and lived to tell the tale. For all that, we think we know life when we see it. The man in the train smash knows little of cell death if bone is broken, or a corpse—or he thinks he can. Some men will take no responsibility. They proclaim loud and often in the papers, that they know not life from death. They think no one else does, either. They expect people to make mistakes. They look forward to being buried alive. They live in fear of life. They could be sure of death they would die happy. Some of them insist the physician who personally conducts them to Charon to divide their cargots or to carry out some other equally messy and drastic operation. Others use the thanatograph. This is an indication of the cessation of life not a prophet like the death watch nor an acacomplice like the death rattle, but just a tetter of the past. It is a pincer with a cruciform punch. It is pressed into the grey lips of the dead and left there for six or eight minutes and then withdrawn. If the dead agrees with the diagnosis he gives no sign. On the other hand, the protesting, flickering life obliterates the sign of the cross: being dead, yet he speaks. The instrument may be useful, as its inventor hopes, but we cannot look for its universal application. We doubt the frequency of premature interment, and we believe that this ingenious idea will do little to distinguish more accurately those who have passed and those who have to pass across the Great Divide.

German and French Bullets.

During recent wars many observers have been astonished at the apparently comparative harmlessness of the modern rifle bullet, and lately German military authorities have put forward the paradoxical claim that the German projectile is a "humane missile." It is interesting, therefore, to compare the German "S" bullet with the French "D" missile. Both are antediluvian, and the German is composed of a hard leaden core with an envelope of soft steel; the French bullet is of solid brass without an envelope, and is the longer and heavier of the two. Up to a distance of 500 yards the German ball has not the penetrating force of the French, but at distances of 1,000 and 2,000 yards it has a distinct superiority. As regards the severity of the wound inflicted, the French round caused by a "balle ricochée" is much more serious than that caused by one which has found its billet without interruption of its course. The bullet which ricochets becomes deformed, jagged, flattened out, or separated from its envelope: it strikes the body either obliquely or transversely, and tears, instead of boring, like a bullet. The French bullet, with its leaden core and cuirass of steel, becomes a much more injurious missile after contact with the soil than the French bullet of solid brass. Delorme, in the book we noticed last week, states that one out of every three rifle wounds are caused by balles ricochettes. Journée has estimated that 25 percent of bullet wounds are fatal; 15 percent produce grave injury; the remainder, 60 percent, producing only slight flesh wounds. If, thanks to their slender calibre and pointed extremities, the "S" and "D" bullets actually produce a series of 60 per cent, of hits causing only slight wounds, nevertheless it still seems to us to be pushing the love of paradox rather far to call a missile "humane" which causes death to men at 500 yards, and can exercise a fatal effect at a distance of two miles! In the course of every war one side or another is accused of using explosive bullets: the use of these inhumane missiles has been included amongst the list of German "atrocities." Prof. Delorme authoritatively states he has come across no such instance. He tempers this reassuring statement with the observation that the "humane" ricocheting bullet is far more deadly, as an explosive bullet could not longer lay any man low after the slightest contact with the soil.

Fresh Air and Metabolism.

An interesting report to the Local Government Board under the grant for auxiliary scientific investigation has recently been made by Professor Leonard Hill, F.R.S., on ventilation and the effect of open air and wind on the respiratory metabolism. After disposing of the idea that an organic poison of a protein character exists in exhaled air, Prof. Hill states that, as a result of numerous experiments upon students and also upon animals, heat stagnation is the cause of the discomfort and of the symptoms arising in the so-called voting atmosphere of crowded assemblies and stuffy apartments. The effect of a warm confined atmosphere upon the mucous membrane of the nose has been described by Dr. E. F. Muecke in conjunction with the author of the report. So great is the swelling of the mucosa in a close and ventilated
place that on going out into the cold the blood vessels shrink at once leaving a thick secretion and a good deal of tissue lymph as a capital medium in which bacteria may develop. Thus a "cold in the head" is acquired. By the use of the Kathathermometer, a modification of the ordinary instrument devised by Prof. Hill, the rates of cooling of the body can be determined, and experiments conducted therewith have demonstrated the fact, among others, that the cooling of the face and hands in cold winter weather excites an increase of metabolism. The results of the beneficial effects of open-air treatment and exercise upon the consumptive act through the improved metabolism resulting from more ample ventilation of the lungs and a more vigorous circulation, rather than from auto-inoculation. When the atmosphere is still and saturated with moisture, as it so often is in great cities, the advantageous increase in metabolism does not take place. Practically, it comes to this, that excessive protection from cold weather—in other words, edodling—only lessens individual immunity and increases the susceptibility to pulmonary affections.

The Liverpool Tropical School Expedition to West Africa.

Last week we referred briefly to the fact of the departure from Liverpool of an expedition from the School of Tropical Medicine, in search of the site of the residence of the mosquitoes which transmit the yellow fever. The members of the party, who are now on their way to Sierra Leone, consist of Professor Warrington Yorke (Walter Mayers Professor of Parasitology) and Dr. B. Blacklock, the director of the Runcorn Research Laboratory. The object of the expedition is different from those of its predecessors, for it is mainly concerned with the inspection of the district with a view to the selection of a suitable site for the erection of the "Sir Alfred Jones" Laboratory of the School in Sierra Leone. The establishment of such an institution upon the coast will prove to be a great advantage, for it will serve as a centre for research which cannot be satisfactorily carried on in this country, for students can be trained actually among the diseases with which they will have to deal. A study of the biting insects and of the tropical diseases incidental to West Africa must ultimately tend to the material improvement in the health of the colony. Thus the Liverpool School, in sending forth its thirty-second expedition, is maintaining its high reputation in its efforts to ward the advancement of public health in the tropics. Its members have already covered themselves with glory, and we doubt not that their newest venture will be as productive of gain to the cause of preventive medicine, and, therefore, of beneficial results to the race, as those in the past have been.

Idiosyncrasy to Cow's Milk.

We all know that the transition from human to cow's milk is often marked by disagreeable disturbances. There is a certain intolerance due to changed diet which is soon overcome by use. But there is apparently a more definite condition in which the child is unable to take even minute portions of cow's milk without the most striking and disastrous effects. All the cases in literature, with one exception—by the author of the book in German hospitals. The subjects of this curious condition are invariably weakly children who have been artificially fed and, having done badly, have been fed by a wet nurse, and thereby have recovered weight and vitality. Any attempts at weaning are followed by a violent reaction. The first bottle containing cow's milk is drunk with difficulty by the child, who vomits repeatedly during the meal. He then becomes collapsed, pale and cyanosed. The temperature ranges from 100 deg. to 104 deg.; the pulse is feeble and intermittent. The tongue is sometimes coated, and sometimes contains albumin. The child recovers when put back on a diet of human milk, but takes some eight or ten days to do so. And the same reaction occurs when the child is again given cow's milk unless he is given it very gradually and cautiously, when he ultimately becomes immune, and may fed on it without ill effects. The constituent in the milk responsible for the symptoms has not been discovered. They can be induced by the casein alone or by the fats alone. Per rectum the milk is innocuous. The idiosyncrasy may become apparent even after ten drops of equal parts of cow's milk and oatmeal soup. As we have said, this condition has not yet been noted in these countries. We must suppose it exists, and at any rate it will be a convenient diagnostic label for many of our nutritional difficulties.

Ptyalism—a Danger Signal.

The excessive secretion of saliva that occurs in certain nervous disorders, and as a result of the administration of mercury and pilocarpine, is, of course, familiar to all medical practitioners. That ptyalism may constitute a pathological sign of considerable importance in connexion with arteriosclerosis has been shown by Dr. H. Stern, of New York (a), who points out that measurements of the actual quantity of saliva excreted are apt to be fallacious, since what might be regarded as an excessive secretion in the case of one individual may not be so in another. The best clinical guide as to the existence of general arteriosclerosis is the patient's own feelings, for the uncomfortable sensation of having the mouth constantly over-full of saliva is quite characteristic. Three cases are described in which profuse salivation was the precursor of paralytic phenomena by a few months. Each patient was the subject of renal disease in the early stages. The kidneys were functionally active almost up to the last. In all three, in connexion with arteriosclerosis, the latter following a hemiplegic attack in one case. Little doubt existed as to the degenerated state of the cerebral blood-vessels in these cases. The occurrence of ptyalism in uraemia has frequently been noted by clinical observers, and has been attributed to chemical irritation of certain areas of the cortex. When salivation takes place earlier in the course of renal vascular disease, it may be assumed that the vessels in the neighbourhood of the salivary secretion centres are affected. At any rate, the appearance of ptyalism under such circumstances, in the absence of any other cause, may be looked upon as an unfavourable sign in the course of arteriosclerosis.

The Darley Dale Sanatorium Colony.

In August last it was decided by the Leicester Corporation, acting in conjunction with the Leicester Borough Insurance Committee, to establish an experimental sanatorium colony for male consumptives at the Darley Dale nurseries. Accordingly a gallows-like iron building within the nursery was occupied, and twenty-four patients, and the colony, which was a going concern for nine weeks, was provisionally recognised by the Local Government Board as an "approved institution." The building was lighted by gas, well-ventilated, and it had a concrete floor. All

(a) Archives of Diagnosis, October, 1914
necessary equipment was provided by the Leicester Sanatorium. The men were allowed ten shillings each per week for food and eighteen pence per head for pocket money. The daily routine consisted in doing the cooking of the colony, in which the patients cheerfully took turns, and in working six hours a day in weeding and tying-up plants in the nurseries. During the nine weeks the total earnings amounted to £14 8s. 4d., equivalent to 4s. 11d. per week per man. All the patients put on weight at the expiration of the time, and when examined by the medical officer of the Corporation tuberculosis dispensary upon their return, were found to show signs of improvement. The patient, says the Leicester Daily Post, has even been accepted as a recruit for Kitchener's Army. Dr. C. Killick Millard, the Medical Officer of Health, in an official report upon the Colony, regards the scheme as having been a success so far as it has gone, and he hopes that it may be possible to give it a trial in another part of the city, for five minutes every morning, or even to indulge in other forms of bedroom athletics, such as the gentle art of chair-swinging, which, when righfully performed, requires the space of a good-sized gymnasium. Enthusiasts in the practice of massage have devised various mechanical helps which, to use the words of the report, supersede the fingers, and which are said seldom to fail to excite the desired tonic contractions. Dr. Hale Powers, of Boston City Hospital, (a), recommends the use of half-pound wooden dumbbells with which to knead the abdomen. The patient should lie down with thighs partially flexed, so as to relax the abdominal muscles, and the massage is begun at the caecum, the course of the large intestine being gently followed. Only deep pressure is required, and the dumb-bells should be held by the head farthest away from the body. The method is said to be superior to that devised by Sahli with cannon-balls, because a gentle to-and-fro movement can be kept up, similar to that performed by a skilled masseur. After massaging in the supine position for a short time, the patient is directed to turn on his left side and to apply the massage again. Needless to say the movements should only be attempted when the stomach is empty.

**Self-Massage in Chronic Constipation.**

The value of external abdominal manipulation for the relief of chronic constipation has long been known. The reason why it is not more generally adopted is largely due to a failure to appreciate its beneficial influence, to want of time, and to a general aversion to muscular effort. It is so much easier to take drugs than to perform the massage for five minutes every morning, or even to indulge in other forms of bed room athletics, such as the gentle art of chair-swinging, which, when righfully performed, requires the space of a good-sized gymnasium. Enthusiasts in the practice of massage have devised various mechanical helps which, to use the words of the report, supersede the fingers, and which are said seldom to fail to excite the desired tonic contractions. Dr. Hale Powers, of Boston City Hospital, (a), recommends the use of half-pound wooden dumbbells with which to knead the abdomen. The patient should lie down with thighs partially flexed, so as to relax the abdominal muscles, and the massage is begun at the caecum, the course of the large intestine being gently followed. Only deep pressure is required, and the dumb-bells should be held by the head farthest away from the body. The method is said to be superior to that devised by Sahli with cannon-balls, because a gentle to-and-fro movement can be kept up, similar to that performed by a skilled masseur. After massaging in the supine position for a short time, the patient is directed to turn on his left side and to apply the massage again. Needless to say the movements should only be attempted when the stomach is empty.

**PERSONAL.**

His Majesty the King has been graciously pleased to approve the appointment of the undermentioned Medical Officers to be Companions of the Distinquished Service Order, in recognition of their services with the Expeditionary Force, specified below:

**CAPTAIN JAMES STUART DUNNE, R.A.M.C.—** During German attack on night of October 31st, near Messines, he established a dressing station behind the trenches, and was the means of saving many lives, he himself going several times into the trenches to attend to wounded men who could not be moved.

**CAPTAIN PATRICK SAMPSON, R.A.M.C.—** Has shown frequent and conspicuous gallantry throughout the campaign, especially on October 21st and 22nd, attending wounded men under very heavy shell fire.

**CAPTAIN STONEY JOHN STEWARD, R.A.M.C. (Special Reserve).—** Went with party of stretcher bearers across ground swept by rifle and shell fire to Langemarck village and removed 11 wounded men.

The names of the following medical officers were included in the supplementary list issued last week to be added to those appended to Sir John French's dispatch dated October 8th—Col. S. Westcott, Staff R.A.M.C., and Lieut. H. Beddington, R.A.M.C.

The name of Fleet-Surgeon E. J. Finch, R.N., is included among the names of officers mentioned in a dispatch from Major-General A. Paris, dated October 31st, as having rendered good service during the operations around Antwerp on October 30th to 4th.

Dr. Henry Jellett, Master of the Rotunda Hospital, Dublin, has left for Flanders in charge of a motor ambulance with our Forces.

Sir Berkeley Moonshy, F.R.C.S., left for France last week to take up his appointment as a Consulting Surgeon to the Expeditionary Force.

Mr. George G. Farquhar, M.B., Ch.B. Aberd., F.R.C.S.Eng., has been appointed Honorary Surgeon to the Darlington Hospital.

Dr. George Norton Bartlett, M.B., B.S. Lond., L.R.C.P., M.R.C.S., has been appointed Medical Superintendent of the Exeter City Asylum.

Mr. R. Atkinson Stoner, Surgeon to the Royal City of Dublin Hospital, has left Dublin for Villeneuve to take temporary service under the French Red Cross.

Lieut.-Col. R. E. S. Davis, J.M.S., Hon. Secretary of the Ulster Volunteer Force Medical Board, has been appointed in charge of a hospital in Brighton for Indian troops.

It is announced that Professor John Wylie, M.D., who has recently been made Chair of Medicine in the University of Edinburgh for fourteen years, has intimated his resignation thereof.

Dr. J. D. Ingram, M.D.Edin., D.P.H. of the Crossley Sanatorium, Kingswood, Birmingham, has been appointed Assistant Medical Officer of Health to the Borough of Yarmouth.

Sir C. B. Bailey and Sir Thomas Myles have been appointed Consulting Surgeons to the troops in Ireland with the temporary rank, pay and allowances of Lieutenant-Colonels while so employed.

Dr. A. A. Bathe, of the Winsley Sanatorium, was the recipient the other day of a suitable presentation by the patients resident therein upon his leaving the institution to take up an appointment in Hampshire.

Dr. Howard Davies, who has recently retired from the position of Medical Officer of Health of the Pontypool district after 28 years service, was the recipient the other day of a handsome piece of silver by the chairman and members of the Council.

Sir Frederic Eve, F.R.C.S., has been elected Consulting Surgeon to the London Hospital upon his resignation of the position of Senior Surgeon thereto. Sir Frederic will deliver the Bradshaw Lecture before the Royal College of Surgeons of England on Tuesday, December 15th, at 5 p.m., on "Aute Haemorrhagic Pancreatitis, with remarks on the Pathology of Chronic Pancreatitis."
The carbon or iron arc lamp and the Kromayer lamp have up to the present been the two principal sources of ultra-violet rays utilised in the various medical applications of their therapeutic properties. It is extremely difficult to obtain a sufficiently steady and continuously uniform light with the arc lamp, whatever pains we may have taken in the outfit and adjustment. And with the Kromayer lamp we can carry out a course of treatment of cutaneous affections in such cases only as are limited to small superficial areas.

Then, again, the mercurial vapour lamp has for some time been utilised by certain dermatologists who recognise the facts, that: \[\text{slightly more powerful than the Kromayer, and is adaptable to therapeutic applications of wider range of extent and more distinctly medical nature. These lamps have been tried in France by Nagier, Vignard, and Joffray; their therapeutic properties have also been tested in Germany by a certain number of experimental clinicians.}

Thanks to the obliging courtesy of the Cooper Hewitt Institute, I have been enabled to use a quartz mercury-vapour lamp for several months in the service of my master, Professor Gilbert. This lamp is furnished with a continuous electric current of from 110 to 220 volts, or with an alternating current produced by the adaptation of a Cooper-Hewitt converter. It furnishes a very large proportion of extreme and intermediate ultra-violet rays, which have, as we know, an injurious effect on the eyes (producing conjunctivitis as the result of even an exposure of brief duration), and on the skin itself. Accordingly, in order to limit the field of action of the light, and prevent the rays from reaching the eyes of either the patient or of the assistants, the lamp is placed in a metallic reflector, the opening of which is directed downwards. The whole being then suspended on a hook, it will be found very easy to raise or lower the lamp at will, according to the needs or convenience of its therapeutic application. We have also had care taken to cover the lamp, and the part of the body that we want to isolate, with a thick black screen which serves to protect the eyes of the patient and of the assistants.

Technique adopted in our procedures.—The lighting of the lamp is effected by causing it to tilt, so as to connect the two electrodes by mercury, which thus forms a short-circuit and vaporises; and the mercurial arc then furnishes a luminous glow. When this has continued for about ten minutes, the lamp attains its normal régime, and the therapeutic application can be commenced. Then we adjust that portion of the surface of the body on which we desire to have its therapeutic effects obtained (canterisation, slight erythema, progressive pigmentation) at a distance of 10 to 40 centimetres, or even a little, from the lamp; and the period of exposure is made to vary between limits of about five to thirty minutes, according to the requirements of the individual case.

Then, again, baths of this light can be arranged for the whole surface of the body as easily as the localised exposures. In the latter case, we can cover with black paper all the integumentary areas which we desire to screen off from the effects of the illumination. We have utilised the unfiltered light of the lamp, taking care to adopt due precautions. A standardised supply of citrate photographic paper has enabled us to estimate the dosage of rays employed—much more crudely, it is true, than if we had utilised the actinometers of Bodier and of Nagier.

Technique of l’ignard and Joffray.—These authorities, acting on the advice of Professor Nagier, have filtered the luminous rays of the mercury-vapour lamp through a glass of which the composition and thickness are calculated so as to effect the complete arrest of the noxious ultra-violet rays; and permit the passage of those only that have a wave-length of 4,000 to 3,000 Angström, which constitute the ordinary ultra-violet radiation. As a result, we can permit the insolation to take effect for several hours daily without deleterious consequences, and without production of much more pronounced pigmentation of the skin than that provoked by a five minutes’ exposure to the unfiltered light of the quartz lamp.

Accordingly, we are here provided with two forms of technique, each of which has its special indications. Before describing the respective results obtained by their adoption, I wish to glance rapidly at the phenomena provoked by exposure of patients to the insolation. The unfiltered light may produce, when applied to a surface placed at a small distance from the lamp (10 to 20 centimetres), a superficial burn with vesication—if the period of exposure exceeds four or five minutes at the first séance (this is a chemical effect, not a bactéric one, as the light is practically cold). In case of an unseasoned subject, vesication can be obtained at a distance of one metre by an exposure of a dozen minutes. On the other hand, if the patient has been progressively subjected to increasing dosage of the light rays, the skin may be found to bear without injury exposures of much greater duration—of half-an-hour, and even more, and at the same distance.

If, however, we diminish the duration of the exposure, we obtain, after that of the first day, a more or less pronounced degree of erythema, which is accompanied with a slight pruritus. This erythema appears after the lapse of an interval of about an hour from the time of exposure, and is accompanied by pigmentation of a degree which is always more marked in proportion
to the degree of prolongation of the exposure; this is succeeded by desquamation. Thus we can produce as will on our patients the various local effects of coup de soleil. The resulting pigmentation disappears towards the end of the third week.

Just as has been remarked in cases of application of the solar rays, there are subjects of bloudé complexion, whose skin is not readily pigmented by exposure—even on utilisation of much larger doses than those used with persons of brownish skin. Then, again, notwithstanding the noxious qualities of the extreme ultra-violet rays, I have never yet—thanks to the precautions always taken—produced either conjunctivitis or any intense reaction of the general integument.

By filtration of the rays of the mercury vapour lamp, Vignard and Joffray have also in this way obtained pigmentation after a certain number of exposures. Those exposures were very prolonged—one patient had had his knee exposed to the lamp for a period of nineteen hours daily, and yet displayed no evidence of being affected. Nevertheless the degree of pigmentation appears to be less pronounced than that produced by the natural heliotherapy in similar conditions of weather.

From the above data, it is necessary to bear in mind above all things that, in the first of the above-mentioned forms of technique we utilise the extreme and intermediate ultra-violet rays—1,000 to 3,000 A—of the action of which we possess but a quite superficial knowledge. In the second technique we utilise the ordinary ultra-violet rays, 3,000 to 4,000 A, which are transformed by contact with the skin into rays of greater wave-length, which are consequently more penetrating.

The following are the conclusions presented by Professor Nogier at the close of an article on this subject of ultra-violet radiations:

"From this rapid examination of the properties of ultra-violet rays it results:"

"1. That, if we wish to obtain biotic effects in the depths, it will be necessary to limit ourselves to the clinical use of the rays of the visible spectrum and the ordinary ultra-violet ones;"

"2. That, if we seek for bactericide effects, we must have recourse to the intermediate ultra-violet;"

"3. That, it is useless to seek for sources of light rich in their proportional production of the extreme ultra-violet rays, inasmuch as those rays do not act at a depth, while they are productive of very painful cutaneous reactions."

**Therapeutic Results.**

These conclusions are confirmed by the facts, and the therapeutic results demonstrate the fact that the first technique (that with extreme and intermediate ultra-violet rays, unfiltered light) should be reserved for superficial affections, for cutaneous diseases; while the second seems to be very efficacious in deep-seated affections, for cases of osseus tuberculosis are cured by prolonged exposure to the filtered rays of the quartz lamp. Thus, by exposing patients, once or several times, to the unfiltered radiations of the quartz Westinghouse Cockcroft lamp (3,000 candle-power) and utilising the bactericidal and caustic properties of the ultra-violet ones, I have obtained interesting results in such cases as the following, which I have had occasion to treat:

_Bronze acne_, which can be destroyed all over the surface of the body at a single séance, with a complete bath. It does not reappear if we have occasion to treat the pigmentation by subsequent exposures;

_Sypho_ of the bearded portion of the face has disappeared after the séances, which also produced strong pigmentation;

_Varicose ulcers_ of many years' standing have been improved with a fair degree of rapidity, but without our being able to produce the slightest degree of pigmentation of the defective tissues;

_Tuberculoses_ of the skin and indolent wounds have been benefited by the rays.

Cases of recurrent _furunculus_ of the nuchal region have been arrested, without any visible cutaneous reaction, by one or two séances of eight minutes' exposure, at a distance of 20 centimetres.

In Germany numerous cases of cure have been published: of _pulviris_ pellae, _panniculitis_, _eczema_, _etc._, _etc._

With the unfiltered rays I have not been able to obtain any modification of deep-seated lesions, _arthritides_, _swelling_, etc. In these cases, it is necessary to follow the technique of Vignard and Joffray (filtered rays, prolonged séances). Those authors have recently shown patients at the Congress of Thalassotherapy held in Cannes, who had been affected with _articular tuberculosis_, which were perfectly healed, and with almost perfect re-establishment of the normal movement, the sole treatment being with artificial heliotherapy—which was carried out with a lamp of 6,000 candle-power. Vignard has just published photographs of those cases in _L'Avenir Medical_ (May 1st, 1914).

In those cases, it is obviously difficult to isolate for purposes of clinical recognition the respective actions of the ultra-violet and the visible spectrum; for, as I have already remarked in a former publication, the therapeutic results furnished by luminotherapy were more perfect in proportion as the intensity of the light used was more elevated, and the duration of exposure more prolonged—even in the absence of ultra-violet rays (Société de médecine de Paris, 1914). This is also the opinion of Vignard and Joffray, and of Nogier.

Then it is also true that I have been able to obtain a cure of a _spina ventosa_ by the prolonged action of the Nernst lamp, which has a great power of penetration and yields a smaller proportion of ultra-violet rays than does the vapour of mercury lamp.

From the facts already detailed, we may deduce the conclusion that in the quartz mercury-vapour lamp we possess a very powerful source of light—ranging from a 1,000 to a 9,000 candle-power—and one which yields a large proportional quantity of ultra-violet rays—extreme, intermediate, and ordinary—the direct action of which can be successfully utilised in the most extensive cutaneous affections, and the attenuated action in deep-seated affections—in default of natural heliotherapy.

**Note.—**A Clinical Lecture by a well-known teacher appears in each number of this Journal. The lecture for next week will be by Henry Russell Andrews, M.D., B.S. Lond., F.R.C.P. Lond., Obstetric Physician to the London Hospital, etc.: Subject: _"Ante-Natal Syphilis."_
SOME LEGAL AND PRACTICAL ISSUES RAISED BY THE NEW BRITISH PHARMACOPEIA.

By J. Wippell Gadd, F.C.S.,

Barbados, Jamaica, &c.; formerly Lecturer on Pharmacy, University College, Exeter.

The new British Pharmacopoeia, which is to be published and become authoritative on the first day of January next, but which has already been available for inspection and review, presents features of more than common interest and involves issues of more than common gravity.

This is not because the changes are more sweeping or drastic than on former occasions; indeed, they are less in number than were those which were brought about some sixteen years ago, when the then new Pharmacopoeia of 1858 replaced the volume issued in 1845. But the edition which we are now considering is epoch-making by reason of the fact that it appears to close more than one chapter in the history of medicine, and definitely, if imperfectly, to introduce or accentuate chemical methods.

Time was when physicians culled their own simples from which they personally compounded the medicines, which they subsequently administered to their patients, but the complexities of civilisation soon led to a differentiation of functions, and orders of compounders or dispensers, apothecaries and pharmacists, have arisen to relieve prescribers of some portion of their erstwhile duties.

That the essential co-ordination between the several branches of the healing art should be complete, it is necessary that they should have some common ground—that is to say, a language understood by both; a uniform guide at the service of each.

This is the origin of Pharmacopoeias, which register drugs and describe how medicines are prepared, thus ensuring that a name or short description shall signify the same substance in the same condition both to the one who prescribes and to the one who compounds.

In the earlier Pharmacopoeias the best results were thought to be obtained by giving careful and exact descriptions of crude drugs with detailed directions as to their cultivation, and subsequent treatment, but lately attention has been more devoted to the evaluation of finished products.

This has been largely due to the fact that in view of the infinite variation of natural products, much careful labour has been expended on the isolation of active principles (if perchance the secrets of what are to be in the future the virtues of a drug may be uncovered), but while active principles, notably alkaloids, have been in many cases successfully extracted, and isolated in a pure state, it has not always been found that they have produced the same beneficial results as are derived from the herbs from whence they have been extracted. In dissecting and analysing, perchance even in purifying, it may be that we have destroyed subtle entities of inexplicable power; and the best school of therapeutic thought has desired to use the natural drugs, but to have them standardised to a regularity of potency by an estimation and adjustment of their active principles.

To this end, alkaloidal estimations were introduced partially and tentatively in the Pharmacopoeia of 1885, and more completely in that of 1898, whilst in the volume now before me, they are extended and are accompanied by similar estimations of active constituents other than alkaloids.

Indeed, the whole trend of the new Pharmacopoeia is towards the application of chemical methods of analysis both to crude drugs and to compounded articles. Less stress than ever is laid on the sources of drugs; more on their yield, and even such products as volatile oils are valued more by their reactions in the laboratory than by the conditions of soil and climate, under which they have been produced. Again, synthetic chemicals are prominent; usefully, no doubt, and because of their proved value, for the official book err if at all on the side of caution, and casts the asp of its authority only over such combatants in the war against disease as have won their martial honours, so to speak, as free lances.

All these changes tend in the same direction, namely, that of sharpening the instruments in the physician's armoury, and, whilst increasing their potency and usefulness when correctly and carefully applied, accentuating pro tanto the danger of misuse.

In an editorial article published in this paper on October 5th last, it was remarked, after detailing the alterations in strength and dosage of some important drugs:—"It is always difficult to adjust oneself to the habit of giving a familiar drug in an uncustomed dose, and we fancy that on and after January 1st, when the book becomes official, there will still be a brisk demand for the 1898 tinctures of the above-mentioned drugs."

Doubtless this statement is correct, but will all prescribers recognise or even know the necessity of putting the side of an official Pharmacopoeia first? For the name of the preparation they order, and, if they do not, what will be the effect? For answer, it may be necessary to examine legislative enactments referring to the Pharmacopoeia and to consider briefly its legal position and purpose.

The Medical Act, 1858, 21 & 22 Vict. c. 90, section 54, enacted:—"That the General Council shall cause to be published under their direction a book containing a list of medicines and compounds and the manner of preparing them, together with the proper weights and measures by which they are to be prepared and mixed, and containing such other matter and things relating thereto as the General Council shall think fit, to be called the British Pharmacopoeia, and the General Council shall cause to be altered, amended and re-published such Pharmacopoeia as often as they shall deem it necessary."

The Medical Council Act, 1862, 25 & 26 Vict. c. 91, recited, inter alia, that different Pharmacopoeias had hitherto been in use in England, Scotland and Ireland, and that the Pharmacopoeia to be published by the General Council was intended to supersede these Pharmacopoeias, and enacted that the British Pharmacopoeia after publication should for all purposes be deemed to be substituted throughout Great Britain and Ireland for the several above-named Pharmacopoeias, and any Act of Parliament, Order in Council, or custom relating to any such last-mentioned Pharmacopoeias should be deemed after the publication of the British Pharmacopoeia to refer to such Pharmacopoeia.

As it was succinctly stated in the Preface to the
1898 Pharmacopoeia that work was intended to afford to the members of the medical profession, and those engaged in the preparation of medicines throughout the British Empire, one uniform standard and guide whereby the nature and composition of substances to be used in medicine might be ascertained and determined. Further by Section 15 of the Pharmacy Act, 1858, 31 & 32 Vict. c. 121, it was enacted that: "Any person who shall... compound any medicine of the British Pharmacopoeia except according to the formularies of the said Pharmacopoeia, shall for every such offence be liable to pay a penalty or sum of Five Pounds.

Knowing this to be curious to note, however, that the authority of the Pharmacopoeia has only been tested in connection with prosecutions under an Act in which it is not named.

The Sale of Food and Drugs Act, 1875, laid down that "it is an offence to sell any article of food or any drug which is not of the nature, substance, and quality of the article demanded by the purchaser."

The general effect of the judgments in a series of cases brought under this Act that which constitutes a medicine is defined by a name which occurs in the Pharmacopoeia, an article made in accordance with the Formula and answering the tests, if any, of the Pharmacopoeia is presumed to be required, and that only very strong evidence to the contrary will suffice to rebut such presumption. (Vide White v. Bywater (L. R. 1887), 10 Q.B.D. 582. Dickins v. Randerson (L. R. 1901) 1 K.B. 437. Boots, Cash Chemists (Southern) Limited v. Cowling (1903) 67 J.P. 190.)

It that, however, we turn to the legal position of a pharmacist to whom is presented for dispensing a prescription dated on or after the first of January, 1915, and specifying a preparation, the name of which occurs both in the 1898 and 1914 Pharmacopoeias?

The latter work will be authoritative, although only just published, for by a practice which differs essentially from that of other countries, the gazetting of the British Pharmacopoeia as an official medicine book synchronizes with its publication date.

The positive ignorance of all concerned as to its contents being only modified by such information as they have been able to gather from the exhibition of, so to speak, chained copies in Oxford Street, and the comments and extracts made and abstracted by medical and pharmaceutical editors, working under the shadow of threatened penalties for possible breaches of copyright, it may be submitted with confidence that all prescribers will not early in the New Year be in possession with the new book.

Now the contract between a pharmacist and his customer is an implied one, to the effect that he will make up the medicine required, according to the directions of the physician, translated by means of his technical knowledge as a skilled dispenser; but the uncertainty which may arise as to which Pharmacopoeia the prescription refers to will increase the normally heavy burden of responsibility of the dispenser, and may, and, indeed will, involve serious risks. This will be evident by a consideration of some of the changes introduced by the new Pharmacopoeia.

The Editor of this journal has already referred to tincture of strophanthous, a preparation which has had a somewhat varied history. Introduced into official medicine in the 1890 additions to the 1885 Pharmacopoeia, its strength was then given as 1 in 20. Presumably this was found to be too strong, for in the Pharmacopoeia of 1898 the strength was reduced to 1 in 35. Since that date a good deal of work has been done on the drug by pharmacologists, and in 1905, in a paper read before the British Pharmaceutical Conference at Brighton, Dr. W. E. Dixon recommended the physiological standardisation of the tincture, and stated that the official tincture would generally have to be diluted to bring it down to the proper standard.

The standard, as given by Dixon, was that quarter of a minin of the tincture should be sufficient to arrest the heart in systole of a frog, weighing 20 grammes, in about an hour.

Now I have evidence before me, accumulated during the last five years, that tried by this standard tinctures made in accordance with the 1898 Pharmacopoeia proved in the majority of cases to be too strong.

It was, therefore, naturally to be supposed that, when a change was made, it would be by way of reducing the strength of the preparation.

The new Pharmacopoeia, however, has made the strength 1 in 10, or four times that of the 1898 Pharmacopoeia, which, as shown above, has been generally found to be too strong. It is true that the dose is at the same time reduced from five to 15 minims to 2 to 5 minims, but this change, even if it be always remembered by prescribers, does not entirely meet the case.

Again, tincture of opium, or, as it is often called, "laudanum," is increased in strength from 75 per cent. to 1 per cent. of morphine. One result of this change is that the tincture becomes transferred from the second part of the poisons schedule to the first part, and therefore in future can only be retailed with the accompanying formalities of signing the Poisons Book.

This is doubtless a good thing, as it may be hoped that it will check improper use of the drug, but the increase of one-third in the strength must be very carefully noted by prescribers.

On the other hand, tincture of cum cinchonism is reduced to one half its present strength, as is also tincture of colchicum, but the potency of tincture of aconite is doubled.

Tincture of belladonna will in future contain only 710ths of the proportion of mydriatic alkaloids contained in the tincture of the British Pharmacopoeia, 1898.

With regard to tincture of iodine, in the 1885 Pharmacopoeia this had a strength of 1 in 40 and there was also a limen with a strength of approximately 1 in 100. In the 1898 Pharmacopoeia, the tincture was left unchanged, but the name of the limen was changed to that of "Strong Solution." In the new Pharmacopoeia the "Strong Solution" again has its name altered, and is now called 'Strong Tincture of Iodine,' although it is not intended, of course, for internal use, whilst the present tincture is, in future, to be called 'Weak Tincture of Iodine.' It will become, therefore, rather a nice point as to what should be dispensed when tincture of iodine, without any qualifying adjective, is prescribed.

Amongst the injections, injection of cocaine and injection of morphine are both reduced to half strength. Mercury ointment is reduced to 3-5ths of its present strength. For the latter change, at least, there is doubtless good reason,
for much trouble has been experienced concerning this article, as at present the official ointment is too strong for many purposes, for which it is properly required; whilst on the other hand, pharma-
cocists have been subjected to penalties, under the sale of Food and Drugs Acts, for diluting it, although they have done this in the best interests of those they serve.

It is impossible in a short article to deal at all adequately with the new Pharmacopoeia. Suffi-
cient has perhaps been said to show the vital importance of its being studied, with particular care; but it may be added that, apart from these difficult points of practice, the tests and analytical methods generally show a very great advance, and should tend to raise the standard of quality and potency of medicines.

**ENDOCARDITIS IN CHILDREN. (a)**

By FLOYD M. CRANDALL, M.D.

It is not my purpose in this paper to present a systematic review of an heart disease in children, but rather to record certain views reached after many years of observation.

In selecting the title, I hesitated between using the term "carditis" or "endocarditis," but decided upon the latter. I am well aware that in the graver forms of heart disease which come to autopsy the disease is never limited to the endo-
cardium alone. The pericardium and the myo-
cardium are also involved. This was the experi-
ence of Sturges twenty or more years ago, and has been the constant experience of pathologists since that time. It is undoubtedly true that a certain amount of degeneration of the fibres of the heart muscle occurs during the course of every febrile disease or intoxication. This is frequently mild in degree, but myocarditis with little or no valvular involvement may cause the death of the patient, as in diphtheria. In watching the course of these cases, it is difficult to believe that in some of the less severe types, which run a favourable course and which are not regarded as endo-
carditis is present. It certainly seems that a poison like that of rheumatism circulating in the blood may so irritate the sensitive myocardium as to cause the primary and essential lesion in that membrane, rendering the designation of endo-
carditis proper. The probability of grave myo-
carditis, however, must never be forgotten.

Examinations for its detection should be frequent and careful, for upon it, more than any other element, depends the prognosis and much of the treatment.

I have come to rely upon four symptoms as particularly suggestive of muscle involvement. The cardinal sign is general cyanosis or palpitation, and this is usually the most distinctive symptom. Syncope is characteristic of decided myocarditis, particularly in diphtheria. In addition to these two symptoms, cyanosis and precordial distress are very suggestive of muscle involvement. One or more of these symptoms in conjunction with physical signs warrants us in belief that in addition to the endocardial disease we have also muscle involvement. In the later stages the occur-
rence of cyanosis and edema is of more grave significance in the child than in the adult. They indicate a grave type of carditis, certainly endo-
cardial and myocardial, and perhaps pericardial as well.

It is always good in a young child to determine the condition of the heart muscle, unless an examination can be made during sleep as well as during waking hours.

In determining the condition of the heart muscle, a blood examination may give assistance in addition to the aid usually expected of it. Palpitation and shortness of breath are such frequent accompaniments of anemia that it is helpful to ascertain the blood condition, and not always jump to the con-
clusion that the symptoms are wholly due to myo-
carditis. If the anemia is found to be marked, the prognosis may not be so gloomy, for its relief may directly mitigate the symptoms.

A point of great interest to me has been the occasional rapidity of the development of the physical signs of endocarditis. I have heard a loud endocardial murmur fully developed in a closely watched case within eighteen hours. It is not always the fact that a soft indistinct murmur precedes the development of distinctive sounds. Recognition of this fact would sometimes have saved criticism of practitioners by others who have been brought into the case and I think should be remembered before strictures are passed. It is quite possible that a distinctive blowing murmur may be the first sign of the day in a patient who has been in health the day before. It is possible that the advent of fever with increased heart's action may sometimes aid in the apparent rapid development of endocardial lesions.

It is a common statement in text-books that the severity of the case is not in proportion to the amount of sound heard on auscultation. There is truth in this in the sense that there may be increased amount of sound alone. If the murmurs are judged as they should be in connection with other signs, then the statement is not wholly true. Other things being equal, I find it hard to feel, when studying a case, that a loudrasping murmur is not more serious than a soft blowing one. I do not, of course, mean that a very rapid heart is judged by the sound. The blowing murmurs with irregular and uncertain heart's action, which accompany certain cases of myocarditis with but slight endocardial involve-
ment, but I certainly do not prefer a loud rasping murmur to a faint one.

The final course of cardiac cases is always of great medical interest. The patients in which the disease begins before twelve years have a very important period before them. The physician who ignores the gravity of a cardiac murmur and lightly says that the child will grow out of it, is taking almost a criminal risk. It is quite true that during the period of growth change some children do materially change for the better. I have during the past two months seen two such satisfactory cases—one a boy and one a girl. A murmur has been left, following an acute endocarditis and I had concluded that in neither case was it likely to disappear. Much to my satisfaction, however, the murmurs have dis-
appeared and the hearts give evidence of being in normal condition. This is probably the most common condition in both cases not been apparently involved at any time and the compensation had been excellent.

Results like this, however, are not often to be expected and should never be relied upon. The unfortunate opposite in my experience has been more frequently the result. Several children at this trying period have done badly and succumbed, even without repetition of the acute endocarditis. On the whole, I should say, when a murmur has been left and the myocardium has been in fairly good condition, children have gone through this critical period without material changes in the cardiac condition. If they go to eighteen or twenty with a reasonably good heart and without symptoms, there is a very good chance of going through the next three decades without cardiac symptoms. When the de-

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(a) Archives of Pediatrics, September, 1914.
later life, the individuals with impaired heart have not the chance possessed by normal subjects. They more readily succumb to acute disease and to arterial changes, and are not as apt to live to advanced age.

In general terms my experience leads me to agree with Dunn that, whereas the primary endocarditis occurs the better is the ultimate prognosis, because of the more perfect adaptation of the child to the heart and the heart to the child. They grow up together and are more apt to adapt themselves to each other than they can do in later years.

In the matter of prognosis, I am not willing to agree with the proposition that the number of murmurs is an index of the outcome. The patient with a mitral regurgitant murmur alone, other things being equal, has a much better outlook than the one with a double mitral murmur, and vastly better than the one with an aortic murmur. An aortic lesion is a very dangerous thing in a child, but aortic insufficiency is fortunately rare in children. The picture is type of other pump. A leak in a valve reduces its efficiency. If there is also obstruction to the flow of the fluid, the impairment is increased and two damaged valves are assuredly worse than one. This is a simple mechanical proposition which cannot be effaced by any amount of statistics. Two murmurs are more serious than one, especially when they are not confined to two. There is too much tendency in statistical papers to make out tables based on one element alone. We cannot safely do that in practice. It is true that a heart with three murmurs and a good muscle may be found acting better than a heart with one murmur and a poor muscle. Prognosis based on one element only may be more efficient than one based on one element alone will lead equally to error.

The evil effects of anemia upon the child with cardiac disease can scarcely be overstated. It is a contributing factor to weakness and fatty degeneration of the heart muscle. If uncorrected it may be a factor in turning the scale against the child. This is true even of young children, and particularly true in the period after fourteen. The picture is type of common to girls of that period should be watched for and should be vigorously combated by diet, moderate outdoor exercise and medication.

The sources of infection of acute rheumatism and the portals of entrance are still somewhat uncertain. The evidence against the tonsils, however, is very strong.

The arrival of the child in my opinion is not so much from the tonsils, therefore, in a rheumatic child, whether he has cardiac disease or not, are vastly greater than in any other constitutional type. The child with a cardiac lesion who is subject to tonsillitis should certainly have that dangerous portal of infection closed. In my experience, the type of tonsillitis most frequently white, nearly spots and in an comparatively clean, has not been as serious as that type marked by a grayish exudate upon a soft, spongy-looking tonsil. Two of my patients a few years ago developed endocarditis in the same week with that type of throat. Cultures were taken primarily in the suspicion of diphtheria. No diphtheria bacillus were found, however, but quanti- ties of streptococci. I have come to dread that soft, spongy type of throat with smeary exudate almost as much as an articul rheumatism.

The statement is so frequently made that quinsy is the type of sore throat most closely associated with rheumatism that there must be some truth in it. There have been a hundred and one subjects and have watched them carefully, but can only say that I have been unable to demonstrate any relationship between quinsy and rheumatism, and certainly none between quinsy and heart disease.

The effect of endocarditis on the growth and development of a child has been a question of considerable interest to me. There are certain ones of the more grave cases, particularly those of decided rheumatic tendency with recurring attacks, which do not develop well. It has seemed to me, however, that the constitutional tendency of the child and its treatment must be more important than the heart lesions. I have seen child after child with distinctive blowing murmurs develop in a perfectly normal manner. I saw a little girl a few days ago who went through an acute endocarditis accompanying an inflamed ankle at six years, which left a loud, harsh murmur. She has done perfectly well, and menstruated at twelve years and five months. Now at thirteen years and four months the murmur is but slight; she is developed beyond the average girl of fourteen and is heavier and stronger than her twin brother, who is a perfectly sound boy. When the compensation is good there seems to be no reason why the child should not go on and develop in a normal manner.

The treatment of endocarditis divides itself into two very distinct stages—that of the acute and that of the chronic condition. I have become more and more impressed as the years have passed with the importance of absolute rest during the earlier stages. By rest I mean complete inhibition of all the muscles involved in aortic changes, with as little labour to perform as possible. We treat a broken bone with absolute quiet and an inflamed eye by removal of the light. We can even put the ulcerated stomach at rest. With the heart, however, the rest must be comparative, but it should be as near perfect as we are able to keep the child in bed during the febrile stage alone. Six weeks is the shortest time that any endocardial case can be safely permitted to leave the bed, and it is very rare that it is safe within two months. In fact, I would arbitrarily place the time at two months and beyond that be guided by symptoms. Two symptoms are of especial value in determining this important question of leaving the bed—namely, rapidity and regularity of the heart's action. I do not consent to the child's leaving the bed, whether it be six weeks or six months, until his pulse is well below two, and is regular. Even then it becomes irregular or unduly rapid upon moderate exertion or just upon continuing the quiet. The rapidity I insist upon continuing the quiet, however, as he is looked upon with some judgment. A child who has been several weeks in bed is certain to show rather more rapidity of pulse than one who has been leading an active life, and it is often a question how much importance should be attached to increased frequency of the pulse in the first efforts, if it continues and regular. A child should not be allowed to sit up in bed and engage in pastimes which will use the arms and involve some physical effort before he is allowed to actually leave the bed.

The management of the acute stage in ordinary cases has been with me a comparatively simple matter. The education of the family has been more the result of the treatment of the patient. But family training is necessary. In this particular I have frequently had the experience, especially in the chronic stages, that Dr. Dunn speaks about: the families are prone to go to one extreme or the other. They either ignore your advice and look upon the doctor as an alarmist, or they restrict the child under the mistaken idea that it is bad for the child to do anything. After the child is out of bed with a murmur left behind and the chronic stage entered upon, many difficult problems present themselves. The management then often settles itself to one of judgment alone. Text-books give but little help as a rule,
and the questions that arise must be decided largely by experience and reason. I am more and more convinced that to maintain the restrictive treatment too rigidly and too long after the preliminary stages is an error. Too much confinement to the house and restriction of muscular exercise may defeat its own object. We are now in a stage where medical nutrition should be maintained at its highest possible point; where muscular development should be encouraged, and the child prepared to perform its ordinary duties in life. The management of girls is usually easier in this regard than that of boys. Skipping the rope with little girls; dancing, lawn tennis and basket ball with the older ones are the exercises which are most productive of benefit. With boys who develop well and grow strong and athletic, the question of athletic games is a very difficult one, and I do not feel that general rules can be given. Here, as in the earlier stages, the rate and frequency of the pulse offers us the best guide, provided the patient is in a reasonably good physical condition. Action of the heart under exercise is the most reliable guide. If it becomes irregular or unduly rapid, there should be no hesitation in forbidding the more strenuous exercises.

A period of daily rest is of great importance to the cardiac child. This can usually be enforced more readily with girls than with boys. Even a half-hour during the day, when the patient can sleep or not, is of great value. If that can be secured, we may feel warranted in granting considerably more leeway in the matter of actual exercise.

After the acute stages of endocarditis are passed, we have to deal with a condition rather than a disease. In the management of this condition arbitrary rules may do harm rather than good. In few other conditions is it more essential that we study the case and treat the patient rather than the disease.

THE RAPID ARREST OF ACUTE INFLAMMATION BY DIELECTRIC TREATMENT.

THE ELECTRO-PATHOLOGY OF ACUTE INFLAMMATION: A PLEA FOR ITS ADOPTION IN THE PRESENT WAR.

BY J. HORNE WILSON, M.D.,
Assistant Physician, Chief Tuberculosis Dispensary, Chicago,
Chief Tuberculosis Dispensary, Surgeon-Captain 15th Cadet Corps, City of London.

In this war of war when a large number of men on both Services are suffering from the risks attendant on many forms of acute inflammation resulting from wounds, burns, scalds and gangrene and many also placed hors de combat by acute pneumonia and other acute inflammatory conditions, I am anxious to take this opportunity of bringing before the medical profession a simple, safe and rapid method of treatment, experience having shown its effect on acute local inflammation to be most striking, with the result that heat, pain, redness and swelling disappear in a few hours and the body temperature falls to within safe limits in a few hours.

This dielectric treatment is the outcome of scientific research into the electro-pathology of acute inflammation, and to put it shortly it has been found that in such conditions there is an escape of nerve-electricity or nerve energy (trophic influence you will) locally owing to a breakdown of the local insulation resistance of the nerves, and the resulting treatment consists of applying externally or internally a non-conducting fluid which will penetrate and insulate the nerves, thus stopping the leak and by restoring the trophic influence to the cells allows them to resume their normal metabolic action.

It is interesting to note that the application of the theoretical views in actual practice has been attended by such striking results. It is otherwise quite impossible to explain the rapid action of a dielectric in such acute conditions.

For fuller information on the electrical condition of the body in health and disease and also the electrical condition of fruits, vegetables and plants I would refer to a paper in The Practitioner, June, 1914, and to the Medical Times, July 23rd, and to an article dealing with the "Electro-pathology of Acute Inflammation" in the Therapeutist, July 15th.

The research was carried out by a very sensitive Kelvin astatic galvanometer and it has been found that the human body generates its own neuro-electricity (nerve energy) in the brain, and this current is found to be constant in the same individual in health, falling considerably, however, during sleep. It is not possible to drain the body of this neuro-electricity by placing it in contact with an earth plate of ininesimal resistance or to bring it down to the potential of the earth. It is found also to be constant when the body is absolutely motionless and when the body is well beyond the influence of induction, and it is this latter factor which has led to so much unreliable data in the past.

Such research work must not be carried out within about a mile of any electric current of high potential.

If this current is being constantly generated in the body it must as constantly be given off, otherwise the electrical pressure would become unbearable.

The insulator of the body is the skin, which has not a very high resistance, so that there is around every living person a magneto-electrical field.

The nerves are insulated by their sheaths only sufficiently to maintain in or on them nerve energy at a certain pressure and the ganglia are probably a series of storage cells or condensers.

Sign, electro-motive force and current vary in different individuals, resembling thus a galvanic cell whose terminals E.M.F. and internal resistance are unknown until tested and ascertained.

It has been found that disease does one of at least four things:—
1. It alters the resistance of one or more conductors in the part affected.
2. It affects the electromotive force locally or generally.
3. It alters the skin resistance locally or generally.
4. It affects insulation resistance locally.

In each case there is a "fault" which can be localised, a area defined and its character determined.

It has been found that where there is local inflammation, superficial or deep, there is an escape of the nerve energy, due to a breakdown of the local insulation resistance of the nerves, which can readily be detected by the marked rapidity of the deflection obtained by the galvanometer.
All normal metabolic action is dependent on the proper supply of this neuro-electricity or trophic influence conveyed to every cell, even the nerves themselves are supplied with it by means of the "nervi nervorum."

Very few works on physiology take any serious notice of the nature of this trophic influence on cell metabolism, being content merely with mentioning one or two outstanding cases of inflammation resulting from the removal of this trophic influence, as in section of the fifth nerve causing corneal necrosis. When the eye is exposed to dust, it does not happen if the eye is kept closed or perhaps the fact is mentioned that section of the pneumogastric causes vagus pneumonia and gangrene or again the fact that acute bedsores follow certain spinal lesions.

Then there is the case of herpes zoster which as the result of a large number of post-mortem examinations there has been shown in every case acute inflammatory exudations with small round cells in the corresponding root ganglia and it is not to be wondered at, therefore, that local treatment of the herpetic rash by anaesthetic dusting powders has little effect on the course of the disease.

In such cases the arrest of the inflammation over the spine ought to be accomplished by means of dielectric treatment.

Now why should the cutting off of trophic influence result in acute inflammation? It is not loss of sensation per se that is the cause, for, as in the case of the eye, this merely allows the foreign substance to remain for a sufficient length of time to be an exciting cause. Cell metabolism breaks down if this influence is interfered with, as is very readily seen by applying a very small electric current of, say, one volt to the skin for any length of time. The patient is quite unable to feel this current, but it alters the ionic condition of the cells and normal trophic action becomes arrested and the tissues become inflamed and ulcerate leaving a troublesome sore which is particularly low in healing.

Now what is the nature of this trophic influence? It was of course formerly thought that cell metabolism was the result of simple osmotic action such as occurs through the membrane of a dialiser or it was explained as the result of surface tension between the plasma within the cell and the fluid that lay without it, and of course the factor of filtration, due to difference of mechanical pressure, plays a certain part, but most physiologists at the present time confess that there must be some other vital force at work because it acts alone so as to interfere with or oppose the action of osmosis, etc.

This is discussed in a recent work (a) by Dr. Johnstone.

In dealing with this vital impetus the author draws two main conclusions:—(1) that physiology encourages no notions as to a "vital principle" or force or form of energy peculiar to the organism; and (2) that although physiological analysis resolves the metabolism of the plant and animal body into physico-chemical reactions, yet the data obtained by these is not that taken by corresponding reactions occurring in inorganic materials. From these two main conclusions, he adds, we have therefore to construct a conception of the organism which shall be other than that of a physico-chemical mechanism.

Living cells do not therefore act like the dead membrane of a dialyser; they have selective action, picking out some substances while rejecting others. The physical or chemical properties of living matter have not been brought into line with the known chemical and physical processes which operate in the inorganic world, though Professor Bose (a) goes a long way in uniting the organic with the inorganic.

This new so-called vital factor (vital in the sense that it can only act where there is life) is therefore a condition of electrical attraction dependent on the electrical condition of all living things.

Recent research by Professor Czapek (b) has shown that every cell has a plasmatic membrane or selecting layer, and, viewed in the light of ionic reactions the transference of the substances which takes place is governed by the electrical condition of the dielectric groups on the two sides of the selecting layer.

The dissolved substances in the body do not pass into the living cell plasma except in the condition of ions; one cannot, for example, find a trace of iron or potassium in the living cell by the most delicate tests. Strong acids and alkalis when diluted down to 0.001 of a gramme molecule in a litre of water are entirely broken up into ions, so that the reactions in metabolic activity may be considered as taking place between ions.

Cell protoplasm is always in the form of an emulsion colloid along with crystalloids and as the salts in the circulation are always highly ionised (from their state of dilution) practically it is only the ions or groups of ions which are absorbed.

The reaction between ions always takes place and is complete in an immeasurably short space of time, and this is also the case when the metabolism ceases between ions alone, although the reactions necessitated by the colloidal condition of part of the cell plasma take a relatively longer time.

The speed depends on the part played by the crystalloids during the reaction.

It is difficult for the ordinary mind to realise the rapidity of this change. Take, for example, the mammary gland:—on the one side of the epithelial cell there is blood and on the other an entirely different substance, milk, and the depth of the area in which this rapid change takes place is microscopic.

In many cases there is strong evidence to show that the ions do not act singly, but in groups, and the formation of complex ions is of great importance in metabolism, but living cells can even form new ions from non-ionic material, and thus under the influence of a sufficient stimulus become regenerated with all their functions restored.

So intimate is the connection between electricity and the metabolic changes which occur in a fully ionised cell that it has actually been found possible to start the process of cell division in the ovum of a sea urchin by a simple electro-chemical stimulus.

The ions or groups of ions in the protoplasmic membrane determine the character of the material
which shall be absorbed and also of that which shall be passed out from within the cell. These interchanges can only take place when the sum of the electrical charges on the two sides are of opposite electrical condition so that they attract one another.

The disappearance of ions within the cell as the result of metabolic activity tends always to keep the potential lower on the inner side of the selecting layer.

This may be the cause of the continual difference of sign, since anaerobic reactions fix the free ions again into groups, and so the free ions, which are absolutely necessary for the working of the cell, have continually to be replaced or supplied from the ionised material if to be continued. Some extent it is possible that the re-arrangement of the ionic grouping necessitated by the metabolism, may result in partial atomic disintegration and the liberation of free ions within the cell itself.

Along with metabolism there is always inseparably associated a transformation of energy which has as a result the activities of the organism, more especially motion, heat, light and electricity.

The thermic reactions which occur in all normal metabolic reactions are the result of alternations in the molecular structure and the temperature generated is the difference between the exo- and endothermic results of the change, the temperature rising with the excess of the former over the latter.

This is a definite amount which can be calculated when the exact nature of the change is known; when, however, the cell is generating ions, its reactions are atomic and not molecular, as the ions can be obtained by the expense of atomic disintegration, when the heat liberated is enormously greater than that arising from molecular change, even if the results are all exothermic.

It is found to be roughly about a million times greater than would be generated by the combustion of the same weight of coal, a source of energy within the organism only recently discovered as the result of the metabolic activities of the cell and which fully explored may yield thermic results.

Each cell therefore forms a separate laboratory in which continuous metabolic changes are occurring. In it there is a minor consumption of organic matter which exhausts the oxygen conveyed in the blood by the red cells allowing them to be capable of absorbing the products of combustion.

This combustion in the cell warms the cell contents independently of the heat supplied by the blood. Now if for any reason, such as an injury or the effect of toxins on the nerves or the selecting layer, this latter becomes paralysed, the warmed cell contents are not removed, the temperature of the cell rises and causes local pyrexia. This is apt to spread and become cumulative and the temperature of the blood in the capillaries at this point is also raised, which interferes with the action of the red corpuscles and renders also phagocytosis more sluggish, so that the cell contents become more poisoned, an action which also becomes cumulative. This rise of temperature also renders micro-organisms more active and their propagation more rapid.

But there is also another very important effect of this local pyrexia which in the past has been overlooked.

I have said that all normal metabolic action is dependent on the proper supply of neuro-electricity conveyed to the cells and as the nerves are only insulated sufficiently to retain the current up to a certain pressure or potential, the effect of this local pyrexia is at once to cause an increased resistance in the conductive capacity of the nerves affected; but also, and this is of still greater importance, this local rise of temperature causes a decrease of insulation resistance in the nerve sheath, allowing thus an escape or leak of the natural nerve currents, with the result that the cells do not receive the necessary supply of neuro-electricity and normal metabolic action cannot therefore take place.

If any cell or group of cells is isolated from nervous influence and control, the whole of its activities cease in a short time; not immediately, however, for each cell always contains a store of potential energy which by its action is changed into the kinetic form. This is especially the case where the isolated region is well supplied with ganglia and can draw upon these when the main supply is cut off.

It is evident that from the standpoint of an electrician, temperature means a drop down of local insulation resistance, or in other words local pyrexia is a shunt of varying resistance.

Electrical research has shown that this escape of neuro-electricity can be readily detected by a sensitive galvanometer and also the rapidity of the deflection on the scale is proportionate to the severity of the inflammation.

The first step in dealing with acute local inflammation is therefore to stop this leak or escape of neuro-electricity by the action of a suitable dielectric or non-conducting fluid, which, by its osmotic action is capable of penetrating the tissues, thus coating all the nerve sheaths with a very fine insulating layer, thus stopping the leak and therefore allowing the cells again to receive their proper supply of nerve energy.

To be successful, however, this must be done before suppuration or gangrene has taken place, for it is evident that a restoration of nerve influence cannot have any effect on cells that are dead or that have become separated.

In dealing with acute and chronic inflammation on these lines, what is required is a harmless, insoluble and indecomposable fluid of very great penetrative power and high electrical resistance (infinity at 60 deg. F.).

Another important point is its specific gravity, not only as regards its absorption of oxygen, both by selection and as a vehicle, but also as regards the influence of specific gravity on osmosis. In ordinary cases a specific gravity of 1,085 is desirable but when it is intended to penetrate through fluids as in pleurisy, pericarditis with effusion and pleuro-pneumonia, etc., a specific gravity of 1.0 is necessary.

It is also of the greatest importance that it should be entirely free from ions so as to avoid forming any combination with the ions in the cells, hence absolute denionisation is necessary, otherwise any dielectric would be entirely unreliable, and to avoid it becoming re-ionised it should not be exposed to sunlight or ultra-violet rays.

It must be kept in mind also, that the least trace of acid, oxide of iron or other and similar
impurities may not only impair but utterly destroy its action.

One other important point is that the temperature of dielectric should be kept as low as possible, for the resistance of all dielectrics rapidly decreases with a rise in temperature.

A liquid hydro-carbon, such as liquid paraffin, prepared to meet these necessary requirements, makes a very efficient dielectric and its effect on local inflammation, both superficial and deep, is most striking, the almost invariable result being that heat, pain, redness and swelling disappear in a few hours and the body temperature rapidly falls to normal.

From considerable experience one can confidently assert that within two or three hours of its application in cases of acute local inflammation with high temperature the patient will be practically out of danger.

METHOD OF APPLICATION.

It is best applied on thick, absorbent, non-medicated cotton wool which is thoroughly soaked in the fluid.

In the case of the dielectric with sp. gr. .885, no shaking is required, but in the case of the dielectric emulsion, sp. gr. 1.0, the liquid in the bottle should be well shaken before pouring out as it is in the form of a fine emulsion.

The cotton wool must be saturated with the dielectric and placed over the inflamed area so as to completely cover it. On no account must it be allowed to come in contact with any metallic substance or solution so that dry, clean, sterile basins must be used in which to soak the pads.

It is then covered over with a sheet of oil silk considerably larger than the pad so as to avoid soaking of the clothes as far as possible and is kept in place by a light bandage.

In very acute conditions the dielectric will act more rapidly if the bottle is placed in crushed ice for ten minutes before applying it.

Where a large area has to be covered as in double pneumonia, the easiest method is to soak a pneumoniæ jacket such as the "Zudor" in the dielectric.

WOUNDS, BURNS, SCALDS.

It has been found when a wound is treated by the dielectric without any antiseptic precautions, beyond the wiping away of visible foreign matter, that no inflammation takes place and there is very rapid relief from pain and very rapid healing.

Its application to severe burns and scalds, after the removal of fluid from the blisters, will remove all pain in a few seconds and will therefore reduce to a minimum all danger from shock.

Its early application to wounds in the battlefield will also in a great measure prevent tetanus from gaining a foothold in the tissues and unless there is severe destruction of the tissues, its early application will be a potent factor in the prevention of gangrene.

In wounds which already show signs of acute inflammation prior to suppuration the application of the dielectric will in an hour or two remove all pain, redness and induration, the wound healing very rapidly.

In wounds which are already suppurating, provided the pus is not pent up and there are no signs of general septicemia, the pus formation will rapidly cease.

I know of no antiseptic dressing which will bring about such a rapid arrest of all signs of acute inflammation.

It is my earnest wish that those responsible for the treatment of the wounded in this war will take advantage of this simple and rapid method of preventing wounds becoming a source of danger.

A large number of cases of acute pneumonia (double and single) and of acute broncho-pneumonia and acute bronchitis have now been treated by this method and in every case the temperature has been reduced to within safe limits in a few hours with rapid relief of symptoms and rapid recovery, but I would especially emphasise one point and that is, that where there is effusion, as in pleurisy, pleuro-pneumonia, pericarditis with effusion, etc., the employment of the dielectric of higher specific gravity is absolutely necessary if satisfactory results are to be obtained.

In acute uncomplicated cases of appendicitis, its application over the lower right half of the front of the abdomen and the taking by the month at the commencement of the attack of two ounces of the dielectric, will rapidly remove all pain and signs of inflammation and bring the temperature in the course of a few hours to normal.

When, however, an operation is unavoidable, as in abscess formation, gangrene or perforation, its prompt application will prevent further spreading of the inflammation and place the patient in a far better condition for operation.

I have seen many cases of acute cellulitis, tonsillitis, acute laryngitis and acutely inflamed piles, where the symptoms have disappeared over night and also cases of erysipelas with high temperature have obtained rapid relief from pain with a rapid fall of the temperature in a few hours.

In acutely inflamed rheumatic joints and in inflamed joints due to trauma or thrombosis, it has given very satisfactory results and in rheumatoid arthritis, especially in those cases not due to some septic focus as the source of the infection, the application of the dielectric emulsion of the higher specific gravity has given very gratifying results in these somewhat difficult cases.

As regards pulmonary tuberculosis there has not yet elapsed sufficient time to form an absolute opinion, but I am convinced that the cases that do not show a septic blood picture are doing very well, as also are the cases of tuberculous joints and lupus. In such cases it is advisable to apply the dielectric day and night or in some cases only at night, renewing the pads once a week.

I am very much impressed with the fact that the more acute the inflammation the more prompt is the result.

The method is so simple in its application and so free from danger or unpleasant after effects that its adoption by the medical profession, and particularly the general practitioner, will result in the having at hand a safe, reliable and sure remedy for the arrest of acute inflammation which may and ought to be applied at the earliest possible moment.
OPERATING THEATRES.

ST. MARK'S HOSPITAL.

OPERATION FOR OVARIAN DESMOID CYST WITH TWISTED PEDICLE, WHICH SIMULATED APPENDICITIS.—Mr. ADELT BALDWIN operated on a woman, 41, about 36. She was known to have had an abdominal tumour 2½ months before and had been rejected for surgery on account of the inconvenience she had taken no notice of it. For several days she had had vague pains in the abdomen, which she had put down to indigestion. On the previous day to operation she had vomited, and had been paralytic. On the morning of the operation the pain had become much worse; the abdomen was tender all over, but the tenderness was much more marked on the right side. There was an overlying abdominal tumour which could be felt up umbilicus. Her temperature was over 100°, pulse 140, and the tongue dry and somewhat brown in colour. Under the anaesthetic it was ascertained by vaginal examination that the tumour was apparently unconnected with the uterus.

The abdomen was opened by McBurney's gripdon incision. The appendix could not be found, but the tumour could be felt with the finger, and on directing a strong light into the wound it was seen to be quite black. Another incision was then made over the lower part of the right rectus muscle, which was turned outwards, and the abdomen again opened. The incision had to be continued upwards for several inches before the tumour could be delivered, which tumour proved to be connected with the right ovary and was very deeply congested; it was the size of two coconuts, and its pedicle was rotated eight complete turns. The pedicle was dissected out, untwisted, and the tumour removed. The stump of the pedicle was buried in the broad ligament by sutures to prevent adhesions. The left ovary was then examined and found to be occupied by a similar tumour the size of a small potato. It was removed. The whole of the intestines appeared to be injected, and the coils that had been in contact with the large tumour were intensely inflamed. The appendix was examined, but beyond taking part in the general inflammation present there was nothing abnormal about it; it was therefore not removed. The abdomen was filled with normal saline solution and closed.

Mr. Baldwin said that the doctor who had asked him to see the patient had considered the urgent symptoms to be due to appendicitis, and the case certainly closely simulated that disease. The abdominal pains which started several days previously when the patient had been vomiting, had only been relieved by dehydration of the fluid in the large tumour on its pedicle. The general abdominal tenderness was due to early peritonitis. The pain and tenderness were most acute on the right owing to the large tumour being in that situation, and to the intestinal coils which were in contact with it being more acutely inflamed than anywhere else. He thought there was considerable risk of intestinal obstruction following the operation, owing to the formation of adhesions, and gave instructions that the bowels should be kept empty by moving, Punitive food was ordered to be given every four hours for four doses, and with it too to the grain of salicylate of eserine. These drugs were given to promote intestinal peristalsis and so prevent the formation of adhesions. They were also placed in the abdomen for the same purpose. Sterilised liquid paraffin, he said, would have been preferred, but it was not available. Daily aperients were prescribed by the month to keep up the intestinal movements, and the dose of the tumour was found to be divided into two compartments: one contained a brownish fluid, in which were floating vast numbers of cholesterin crystals, which had the appearance of powdery soil round the body of the tumour and within a cyst. The other half of the tumour was filled with sebaceous material in which were numerous hairs, each about 5 in. long. On dissecting a hard solid portion of the tumour, a large piece of bone was found afixed in it by sebaceous teeth. Mr. Baldwin pointed out that these ovarian dermoid cysts are of great clinical and pathological interest. They are frequently bilateral, so that when one has been removed the other ovary should always be examined, or the patients will often have to submit to a second operation. They have a particular tendency to twist on their pedicles, producing acute pain, faintness, and symptoms which may be confused with a very large number of acute abdominal conditions; but he thought a mistake can generally be avoided by carefully going into the history: the patient will generally have had a palpable abdominal tumour for a considerable time, and the onset of the other symptoms is generally associated with some sudden movement on the part of the patient, and if the case is seen early before the onset of peritonitis due to necrosis of the cyst the temperature will not be raised, although the pulse will be increased in frequency. The patients may be faint, the bowels may refuse to act, there may be vomiting, there will be pain and localised tenderness, but not the distension and rigidity of peritonitis or perforation.

The patient made an uninterrupted recovery, and has not had any intestinal troubles since the operation.

TRANSACTIONS OF SOCIETIES.

ROYAL SOCIETY OF MEDICINE.

SECTION OF OPHTHALMOLOGY.

MEETING HELD WEDNESDAY, DECEMBER 2ND, 1914.

The President, Mr. Priestley SMITH, F.R.C.S., in the Chair.

Miss ROSA FORD showed a case in which an eye of a horse pierced the lid border backwards.

Sir ANDERSON CRITCHETT showed a patient with small optical iridectomies in a case of lamellar cataract. He described an operation, which was initiated by his father fifty years ago, and narrated cases so treated in which the result was very permanent. Mr. W. H. Jessop spoke favourably of the procedure, which he had himself carried out with great success, in adults as well as in children. In one case, operated upon 22 years ago, the result was as good to-day as at the time.

Dr. ANGUS MACGILLIVRAY (Dundee) said he had done the operation described several times. The results by removal of the lens were not so satisfactory in lamellar as in other forms of cataract.

Mr. LESLIE PAYTON showed a case which he regarded as Minkulice's disease, and gave his reasons for the view.

Col. R. H. ELLIOT referred to a case of the disease which he published in The Ophthalmoscope, that of a Hindu woman, 34, in whom the lacrimal glands on both sides bulged like small worms, and the accessory portions of these glands projected into the conjunctival sac. The parotid, sublingual, and submaxillary glands showed fullness. Removal of the lacrimal glands not only improved the appearance, but was followed by subsidence of the other glands. The tissues removed presented a close resemblance to the appearance of round-cell sarcoma.

Mr. ROBINSON exhibited a case of irido-cyclitis, and Mr. EASON of bilateral iridocyclitis, illustrating the importance of taking the fields of vision in each case of optic atrophy. The patient, though he had seen many ophthalmic surgeons, became so blind that he had to be led about. His fields had not been benefited by Mr. Heit and the doctor's tumour was found to be divided into two compartments: one contained a brownish fluid, in which were floating vast numbers of cholesterin crystals, which had the appearance of powder soil round the body of the tumour and within a cyst. The other half of the tumour was filled with sebaceous material in which were numerous hairs, each about 5 in. long. On dissecting a hard solid portion of the tumour, a large piece of bone was found afixed in it by sebaceous teeth. Mr. Baldwin pointed out that these ovarian dermoid cysts are of great clinical and pathological interest. They are frequently bilateral, so that when one has been removed the other ovary should always be examined, or the patients will often have to submit to a second operation. They have a particular tendency to twist on their pedicles, producing acute pain, faintness, and symptoms which may be confused with a very large number of acute abdominal conditions; but he thought a mistake can generally be avoided by carefully going into the history: the patient will generally have had a palpable abdominal tumour for a considerable time, and the onset of the other symptoms is generally associated with some sudden movement on the part of the patient, and if the case is seen early before the onset of peritonitis due to necrosis of the cyst the temperature will not be raised, although the pulse will be increased in frequency. The patients may be faint, the bowels may refuse to act, there may be vomiting, there will be pain and localised tenderness, but not the distension and rigidity of peritonitis or perforation.

The patient made an uninterrupted recovery, and has not had any intestinal troubles since the operation.

Mr. HOLMES SPICE showed a case with angioid streaks.

The President made a sympathetic reference to the death, on the battlefield, of Mr. Angus McNab, an active member of the Section, and proposed a resolu-
tion of sympathy with his family, which was passed. The Section then proceeded to the discussion of the subject of the

NECESSITY FOR AN EXACT DEFINITION OF BLINDNESS.

Mr. HAROLD B. GRIMSDALE, in opening the debate, stated that the importance of defining, if possible, the condition of blindness had long exercised the minds of those concerned in the teaching and maintenance of the blind, and the recent awakening of public interest in the subject made it imperative that a clear answer be given.

On the recently appointed Committee on the subject, he was the sole representative of ophthalmic surgery; he had therefore invited this Section of the Medical profession to contribute to arrive at something like unanimity on the question.

Many members of the profession whom he had addressed had found it impossible to define the status of a blind child otherwise than was done in the Act of 1862—namely, that such a child shall be considered blind who is too blind to read the ordinary school books. Yet all children who did not come into this definition were not fit for the ordinary school; for instance, subjects of high myopia. It was desirable to have some rule for evaluation, as a guide, in each case. Many factors must be taken into account, and these concerned both the state of the patient and his employment. Both central acuity and the state of the peripheral field were essential, as was the relative value of the two eyes and the presence or absence of binocular vision. For certain employment, a greater acuity was needed than for others. Their having no perception of light, a small proportion of the blind, while among others the proportion was smaller. Among adults the blindness from optic nerve atrophy and glaucoma led to a preponderance over children.

In Boston, in 1891, a school of 68 children, all of whom were registered blind, could not be taught by any means of light. In Boston, Mass., of 2,021 eye patients, .6 per cent. were totally blind, 7.7 per cent. practically blind, with a vision less than 6/60 of normal.

These figures were not a guide, because the practical blind person was not a blind child. The blind published in the United Kingdom number about 27,000, according to the census, but these could not be accurate. The ratio of the totally blind to the economically blind was about 1 to 7.

The causes of economic blindness in children differed considerably from those in the adult. In the former, the chief trouble was loss of central acuity from corneal conditions, while in adults disease of the optic nerve, with contraction of the visual field, operative upon vision, was even greater. The central acuity made the standard of vision too high, and thus threw a large number of children into the "blind" class.

One reason was that a child with bad sight demanded more individual attention than an adult, and other children constituted a drag on the class as a whole. This was a stimulus to put such children into a special school. This might ensure his education being better looked after for the time, but once labelled "blind" he was liable to be drafted into a blind workshop. The co-education of the blind and the seeing was one of the most interesting experiments which had been conducted. The blind child was first started in a special school until he had mastered the elements of Braille writing and reading; then he took his place among sighted children in the universal school, and often competed successfully with normal children.

The capacity to read separate letters was a very different matter from being able to read words. From experiments he found that the "near" acuity as measured by reading words, was often more than twice the distant acuity measured on single letters.

Often-so-called blind children tried to read the Braille by touch. He contended that between the "blind" school and the normal school there should be a third school for children who had such visual defect that they could not be taught by the aid of sight. So he had a certain number of children with a distant acuity of 6/60 should be taken as the highest limit of vision for a blind school child. Those whose vision was better than 6/14, unless otherwise recommended by a medical man, have in no case to ordinary schools should be inspected at least once a year, and the vision of each

child tested and recorded. Among the blind there were almost always to be two or three persons who could not see at all or scarcely at all, and those who could distinguish large objects, and so could guide themselves by their eyes in unfamiliar surroundings. Given a good field an acuity of well below 6/60 enabled a man to move about in ordinary circumstances without assistance; and, as with as high a standard below which a man should be regarded as practically blind. Mr. Grimsdale then dealt with the question in relation to various trades, and in conclusion suggested the appointment of a sub-committee to deal with the question.

It was undesirable that a Bill on the subject should pass through Parliament without any reference to the opinion of that Section of the Royal Society of Medicine, for it was most important that it should be left to the decision of absolutely unqualified amateurs.

Mr. ROCKCLIFFE said that for many years he had advocated some definition of blindness. The Local Government Board defined blindness as "Too blind, in the opinion of the Local Government Board, to perform work for which eyesight is ordinarily required." Others expressed it as "Blind for the practical purposes of life." During thirty years he had examined and admitted into a blind school large numbers, and his decisions had not been questioned. He divided cases into (a) blind; (b) partially blind. The latter were those who were able to differentiate fingers in a greater distance than three feet. There should be a distinction between one who could be disqualified for ordinary school education, and for technical education. A good, broad distinction was: Those who could count fingers at three feet and those who could not.

The question was: Who should be in pensions for the blind? Dr. ANGUS MACGILLIVRAY (Dundee) said that for industrial purposes so-called blind people could be divided into three classes: (1) Totally blind, those who had no perception of light; (2) practically blind, those possessing perception of light, but unable to take part in industrial occupations owing to marked impairment of vision; (3) the partially blind, whose defective perception of ordinary sight was not great enough for ordinary sighted workshops, their vision being such as to disqualify them from entrance to a blind institution. Thirty per cent. of the inmates of blind institutions belonged to the category of partially blind. He discussed the case of children, and the general question in relation to occupations.

Mr. N. BISHOP HARKES contended that there was only one exact definition of blindness, the dictionary definition: "the term was applied to a state of incapacity to see," and so included many varieties of partial blindness, and for those a definition was sought. Vision was a complex act, acuity, field, mobility, mentality, and effects of miscellaneous lighting, habit, and custom, all took a share in the definition. It was, he contended, a sufficiently simple definition to gather up possible varieties, any one of which might constitute partial blindness of serious order.

Any definition must be related to the facts of life, must have reference to the person's capacity for work. If it could be certified that he was incapacitated from engaging in profitable labour by reason of his defect, his was a state of blindness. The blindness drawn in professional terms to operate through the legislature was, he contended, doomed to failure, and was liable to be altered out of recognition. The definition in the Elementary Education Act, "inability to read the ordinary size of print, " was worthy of the judgment of Solomon, for it defined blindness in terms of life.

He pointed out the parallelism of the case of mental defectives, in which are referred to "a capacity for work as limited by the degree of blindness by two independent and duly approved medical men, who should be required to state their opinion, and the facts upon which that opinion was based; such opinion being subject to the scrutiny of the medical profession for their correctness" was the answer to Mr. Richardson Cross (Bristol) thought the Legislature was rightly attacking this question. If a child's sight was such that it could not attend the ordinary school, some arrangement for educational work had to be made. There were blind schools for those nearly blind, and intermediary schools for myopes. Any-
thing, brought forward, to deal with the infirmity in adults would not influence the good work being done for the children. Ophthalmic surgeons should agree among themselves as to a proper definition of a blind person. He thought it would be unwise to take the view that every child was now to be judged on the

He thought the Registrar would find two or three cases. One would embrace those who had no more than a perception of light; the other either Snellen’s types, or finger-counting, the latter for preference. Any one who could not count fingers at a greater distance than a yard should be regarded as practically blind. In order to be practical, he thought that at first there should be some sacrifice of scientific precision; this could be made up as it arrived at.

Mr. W. T. Holmes Spicer contended that the persons to decide this question should be expert ophthalmologists, not lay members of a County Council. Any rules arrived at should be for the guidance of expert examiners.

The President pointed out now well qualified this Section was for giving expert advice on such a matter, which was of the first importance.

ROYAL ACADEMY OF MEDICINE IN IRELAND.

SECTION OF SURGERY.

MEETING HELD FRIDAY, NOVEMBER 13TH, 1914.

The President, Mr. F. Conway Dwyer, M.D., P.R.C.S.I., in the Chair.

The President read an address on “The Treatment of Perforating Gastric and Duodenal Ulcers.” He stated that he had selected this subject as he had recently been in hospital in practice several cases of this sort. He pointed out that for many years he had given up the use of lavage, which he believed to be extremely harmful and responsible for many untoward results. He removed the gastric fluid with large sponges relieved on pads or drains for getting rid of any fluid left behind. He further stated that although formerly he was of opinion that gastro-enterostomy should be done, if the patient’s condition permitted it, in the cases detailed he had performed it only in one case, and then only because the perforation was so large and the edges so friable that when the rent was sewn up he feared the lumen of the bowel was too much narrowed.

Details were then given of a case which had been under his care during the past 13 months. Eight made a complete recovery, three did not survive operation more than a few days, and one died a fortnight after operation from pneumonia.

LIVING EXHIBITS.

Mr. H. Storey showed a case of regeneration of ruptured sciotic nerve. The case was one of arthritis of the hip-joint accompanied by intense pain. Operation was performed for excision of the hip-joint, in the course of which the sciatic nerve was accidentally ruptured. The injury to the nerve was not discovered for two or three weeks after operation. When a half year has elapsed since the operation, and the case was shown in order to demonstrate the amount of regeneration that had taken place. The suturing of the nerve was done about three weeks after the excision. The small loss of sensation now present in the case was remarkable.

Captain W. C. Stevenson showed some cases treated by radium emanation needles. The first patient was a sufferer from cancer of the bladder, which was removed by Mr. Graham about the end of May last. It subsequently grew again, and the whole of the posterior wall of the bladder was to be removed, but not proceeding this the tumour began to grow again. The patient was under Captain Stevenson’s care in the end of June with a large gland on one side and a smaller one on the other, accompanied by considerable proptosis of the eye. He inserted six needles into the gland, and in about three days afterwards six more needles were put in, and left in for about 24 hours. After about six weeks the tumour got smaller and redder. When the needles had been inserted four times the tumour showed considerable diminution. A recurrence of the swelling having taken place six weeks after the first application, further needles were applied, and the patient showed the effects of the radiation. He had put on a considerable amount of weight. Plans had to be made to have the patient operated upon, and it was hoped that the other gland would be removed also.

The second patient shown had not yet been treated, and there was, therefore, no case to show whether the case was considered suitable for surgical interference. The object of showing the patient before treatment was to give an opportunity to those present to observe the present condition, as it was his intention to bring him forward again after treatment.

The third patient shown had been pronounced by Professor McWeeney to be suffering from epitheliosis of the palate. The condition seemed to be much improved, and it was pointed out that Mr. New was seen not only about half of its original size.

The President said that he had no experience of the application of radium except what he had gained from a short visit to the Middlesex Hospital. In some cases what would seem to have been an almost miraculous cure was brought about. One notable case was that of a man who had come into hospital with enlarged prostate, which left hard and nodular, and did not seem suitable for surgical treatment. When the patient was examined by him, he had not heard the previous history, he would have looked upon the prostate as normal.

Mr. A. Blayney read a paper on the case was presented, which was published in our last week’s issue (p. 560).

The President suggested that, owing to the hour being late and the importance of the subject, the discussion should be postponed to the next meeting of the Surgical Section.

This was unanimously agreed to.

THE NEW DERMATOLOGICAL SOCIETY OF LONDON.

MEETING HELD THURSDAY, NOVEMBER 14TH, 1914.

The President, Dr. David Walsh, in the Chair.

The following cases were exhibited.

Dr. H. Samuel showed the case of lupus vulgaris of the buttock of a man who had been previously operated upon for fistula in ano.

Dr. G. Seguera said that it was surprising how many cases of fistula he saw in which he could find no other evidence of tuberculosis, and whether tuberculosis, or failing that, vigorous local measures such as scraping and the application of strong carbolic. At the Dermatological Section of the British Medical Association at Aberdeen last summer Dr. Noothan Walker advocated the rubbing in of tuberculin ointment.

Dr. Norman Meachen said he had tried tuberculin ointment in one case. He used 10 per cent. in that case, and on the second day the temperature had risen to 100. After that he used 20 per cent., and he had stated there was little or no reaction.

A woman with patches on the chest and lower extremities in which scalliness, telangiectases, and atrophy were features. The borders were hyperemic and violaceous. The Wassermann test was negative.

The President did not regard the case as one of scleroderma. She was several shins papules on the neck, and he was inclined to regard the case as a form of lichen planus.

Dr. Meachen referred to the very exhaustive paper recently published by McKee, the President of the American Dermatological Association, on “White Spot Disease,” which is a condition of which he called “circumscribed scleroderma.” The author discussed the relationship of this condition to lichen sclerosus, a synonym adopted by some English authors. In that there was an ivory-like smoothness of the skin which was let into the skin. There are a number of cases which was the characteristic feature of all the author’s cases of morphea. In the class of case now exhibited, he
thought the borders were raised in practically every instance, and he suggested it was a case of lichen sclerosus; in other words, lichen planus which had become annular and had begun to atrophy. The lesion in the face was typical of lichen planus, the keratinization of the skin.

(3) A young man, exhibited at a former meeting of the Society, with typical annular lesions, with seborrhceic keratosis, and lesions which were now present on the backs of the hands.

(4) A woman with an extra-genital chancre upon the hand, and a secondary syphilitic eruption.

(5) A case of Raynaud's disease with dystrophy of the nails.

(6) Lupus erythematosus of the scalp in a woman who had had lesions upon the face. The latter were now cured, but two small places existed upon the scalp.

The President agreed that apart from the history of lupus erythematosus on the face, he would not have been able to diagnose the scalp condition. The skin was simply thickened, and in its present condition one might think one was dealing with parietal pustules.

Dr. Meachen thought the case showed very well the commencement of the disease on the scalp: there were first erythematous spots, then a follicular patch which showed slight infiltration.

The President saw a case diagnosed some time ago by another medical man as frontal herpes. The young man now exhibited several pitted scars upon the forehead and adjacent part of the scalp, and the diagnosis was probably of a more serious nature.

Dr. D. Vinrace showed (1) a case of occupation-dermatitis in a gardener.

The patient was a middle-aged man, who presented an eczematous eruption of the hands and arms. The exact source of the dermatitis was unknown.

The President said that in all cases similar to this which he had seen there was something wrong with the circulation. This man's heart was found to be intermittent, and there was reduplication of the first sound. Almost any plants might produce such irritation—though some were more acrid than others—in the presence of some predisposing condition, especially a previous trauma. This man had been exposed to tar. The arm abscess was secondary to this, and was probably syphilitic. One saw a similar condition in some of the people whose work was collecting lilies. He would like to have a drawing of the case. He saw a striking set of cases in Jersey, and nearly all had heart disease, with failure of compensation.

(1) The case of a syphilitic ulceration of foot improved by intravenous injection of neo-salvarsan in a man who had had prolonged treatment with mercury and iodides with no benefit. The exhibitor said that the smallness of the dose—half he had used—was experimental, but had proved sufficient for the purpose in this instance. He had had without exception excellent results by giving to c.c. of fluid with the dose intravenously. He gave a pint of fluid by the mouth an hour beforehand, and an apert in view of the ordinary cream produced pain and focal inflammation, sometimes abscess which needed incision, as had happened in some of his patients. As compared with the intravenous method, he did not favour intramuscular injection, which in the present case, within a few weeks of the first intravenous injection of 0.3 gm. of neo-salvarsan by Dr. Benjafeld there was a band of almost normal tissue across the foot. He himself had given a second dose of 0.3 with further improvement. Three-fourths of the ulceration had now disappeared following upon that treatment.

(2) A man with an ulcer of the leg, who denied all venereal disease. He also had a psoriatic patch on the right arm.

(3) A case of seborrhceic dermatitis of the face and scalp in a young man.

Dr. Meachen showed (1) Two cases of lupus erythematosus of the scalp alone.

One patient was a woman who had had the affection for twelve years, and the other was a man who had suffered for fourteen years. Neither presented any lesions elsewhere.

The President remarked upon the rarity of the condition when entirely confined to the scalp. He had only seen a few such in all his hospital experience, and Dr. Meachen was fortunate to encounter two at the same time.

(4) A man with nodular lesions upon the backs of the knuckles of four months' duration. They were said to disappear in warm weather and not to itch. Their appearance suggested that of rheumatic nodules or severe chilblains. He had similar tophi-like nodules in the ears. Some of them had broken and left a small scar, suggesting a papulo-necrotic tubercle.

The President said the case reminded him of osteo-arthritis nodules on the elbow. They disappeared afterwards, having been seen by the late Dr. Murrell, of Westminster Hospital, who did not hesitate to call them rheumatic nodules.

Dr. Samuel said he had not had experience of erythema diutinum, but from the descriptions this might be a case. Rheumatic nodules in children, in association with acute rheumatism, were of had omen, usually indicating endocarditis, pericarditis, or myocarditis.

Dr. Vinrace said he would apply the term "rheumatoid" rather than "rheumatic." Sometimes the condition went on to deformity of the hands, and might affect many joints. The thickening in this case was not in the joints, but in the long bones.

Dr. Sequiera said he had seen several cases of erythema diutinum, and there usually seemed to be a history of goit.
on November 1st, 1913, signed a certificate that one Patrick Matthews, 69, Raglan Street, Southsea was suffering from gastric colic and was unable to follow his occupation, whereas you had neither seen nor examined the said Patrick Matthews, which said certificate was untrue, misleading and improper.

And that you therefore have been guilty of infamous conduct in a professional respect.

The Complainants were the Lords Commissioners of the Admiralty.

At the conclusion of the proceedings the President announced the decision of the Council as follows —

Mr. WILLIAM BLAIKIE MASON: I have to inform you that the Council has found that the facts alleged against you in the Notice of Inquiry have been proved; that the Council takes a very serious view indeed of the offence you have committed, and that it has already marked down the gravity of such offences by issuing in the Medical Journals and elsewhere in November, 1911, a warning notice.

In order to give you an opportunity to prove to the Council that you realise the gravity of your offence, and to produce evidence from your professional brethren regarding your character and conduct generally, the Council has postponed judgment till the November Session, when you will be required to attend and produce testimony to the effect above specified.

Mr. Mason attended in answer to his Notice; he was not accompanied by Counsel or Solicitor.

The Lords Commissioners of the Admiralty, the complainants, were not represented.

The acting Registrar having read the Notice in the absence of the Complainants, the Council’s Solicitor read a communication from Mr. W. Graham, Greene, of the Admiralty, dated November 2nd, 1914, intimating that their Lordships had no further evidence to offer.

Mr. Mason then read a Statutory Declaration which he had made, and four certificates of good character from his professional brethren and others in Portsmouth, exhibited thereto, which he put in.

Mr. Mason also addressed the Council in his own behalf, and renewed the undertaking which he had given at the previous hearing.

The Council’s Solicitor did not desire to put any questions to Mr. Mason.

Strangers then, by direction from the Chair, withdrew in order that the Council might deliberate on the case in camera.

Strangers having been re-admitted, the President announced the Council’s judgment as follows —

Mr. Mason also addressed the Council in his own behalf and renewed the undertaking which he had given at the previous hearing.

The Council proceeded to the consideration, adjourned from May 28th, 1914, of the case of Alexander Girvan, registered as of 8 Palace Street, Birmingham, Gate, London, S.W., M.B., C.M., 1894, M.D., 1904, U.Glasg., who had been summoned to appear before the Council on the following charge —

That being a registered medical practitioner, you, on or about the 4th, 1913 (after having elected to be dealt with summarily), convicted at the Westminster Police Court of unlawfully and wilfully making a certain false declaration under and for the purposes of a certain Act relating to the registration of deaths, and thereupon ten pounds and ten pounds costs.

At the conclusion of the proceedings on May 28th, 1914, the decision of the Council was announced by the President as follows —

Mr. CHATERJEE: I have to inform you that the Council have carefully considered the facts alleged against you in the Notice of Inquiry, and have found that the following fact has been proved, viz., that you have by public speaking in the South Moor district and by advertising in such speeches your own qualifications taken a prominent part in inducing and endeavouring to induce persons to join the said Association and so to become your patients.

And further that throughout the year 1913, knowingly and wilfully you were being advertised in the South Moor district as the doctor of the said Association, you acquired in such advertising and continued to be employed as its medical officer.

And that in relation thereto you have been guilty of infamous conduct in a professional respect.

The Complainants were the British Medical Association.

At the conclusion of the proceedings on May 28th, 1914, the decision of the Council was announced by the President as follows —

Mr. GIVAN: I have to inform you that the Council have found your conviction for the misdemeanor alleged against you in the Notice to have been proved; that the Council takes the gravest view of the offence of which you have been convicted, but that, having regard to the punishment which you have already received, the Council has suspended its judgment until the November Session, when you will be required to attend and to produce evidence from medical men and others that in the interval your professional conduct has been without reproach.

Dr. Givans attended in answer to his Notice, accompanied by Mr. H. W. Wickham, Counsel, instructed by Messrs. Walton and Hurst, of 55, Fore Street, E.C., his instructions.

The Acting-Registrar having read the Notice, the Council’s Solicitor, in the absence of a complainant, stated that he had no further evidence to tender.

M. Wickham, or behali of Dr. Givans, sought leave to put in certain unattested certificates of character. The Council’s Solicitor did not object, and leave was accorded.

Mr. Wickham then read the certificates which he put in from Medical Practitioners and others.

Mr. Wickham addressed the Council on behalf of Dr. Givans.

Strangers having been re-admitted, after the Council had deliberated in camera, the President announced the judgment of the Council as follows —

Mr. Givans, I have to inform you that the Council has considered once more the conviction which has been proved against you, that the Council takes a very grave view of the misdemeanor of which you have been convicted, but in view of the certificates of character which have been put in on your behalf, the Council has not seen fit to direct the Acting Registrar to erase your name from the Medical Register.

The Council proceeded to the consideration adjourned from May 28th, 1914, of the case of Haripado Chatterjee, registered as of 1, East Durham, L.R.C.P. and S.Edin., and L.R.F.P.S. Glasg, 1914, who had been summoned to appear before the Council on the following charge —

That, being a registered medical practitioner, you, in the year 1913, accepted the post of medical officer of an association known as the South Moor Medical Association in the knowledge that such association had through its officials, by widely distributed circulars, by personal canvassing and by solicitation of members of the Miners’ Union in the South Moor district, having regard to the character of such association who, on joining it, would become the patients of the medical officer thereof.

And further that you have by public speaking in the South Moor district and by advertising in such speeches your own qualifications taken a prominent part in inducing and endeavouring to induce persons to join the said Association and so to become your patients.

And further that throughout the year 1913, knowingly and wilfully you were being advertised in the South Moor district as the doctor of the said Association, you acquired in such advertising and continued to be employed as its medical officer.

And that in relation thereto you have been guilty of infamous conduct in a professional respect.

The Complainants were the British Medical Association.

At the conclusion of the proceedings on May 28th, 1914, the decision of the Council was announced by the President as follows —

Mr. CHATERJEE: I have to inform you that the Council have carefully considered the facts alleged against you in the Notice of Inquiry, and have found that the following fact has been proved, viz., that you have by public speaking in the South Moor district and by advertising in such speeches your own qualifications taken a prominent part in inducing and endeavouring to induce persons to join the said Association and so to become your patients, but that the Council has suspended judgment till the November Session, when you will be required to attend and to produce evidence as to your professional conduct in the interval, and as to the methods of the Association under which you have accepted employment.

The President explained to Mr. Chatterjee’s Solicitor, Mr. Stewart, that the other facts alleged
in the Notice of Inquiry had not been proved to the satisfaction of the Council.

Mr. Chatterjee attended in answer to his Notice; he was not accompanied by Counsel or Solicitor.

The British Medical Association, the Complainants, were represented by Mr. W. E. Hemson, their Solicitor.

The President called upon any member of the Council who was also a member of the British Medical Association, the Complainant body, to withdraw. No member of the British Medical Association was present.

The Acting-Registrar read the Notice. Mr. W. E. Hemson, on behalf of the Complainants, stated that he had no further evidence to tender.

Mr. Chatterjee: The Council have carefully considered the evidence which you have brought on your own behalf, and from two registered practitioners, and being satisfied that as you severed your connection with the South Moor Medical Association in December last, you could not bring the other evidence which you were required to furnish, as to the methods by which this Association is now conducted, the Council has not seen fit to direct the Acting-Registrar to erase your name from the Medical Register.

That being a registered medical practitioner you were convicted:—

(1) On February 22nd, 1913, at the City Police Court, Liverpool, of being guilty while drunk of disorderly behaviour in Windsor Street, Liverpool;

(2) On August 2nd, 1913, at the City Police Court, Liverpool, of being guilty while drunk of disorderly behaviour in Boundary Street, Liverpool; and

(3) On December 13th, 1913, at the Inns-quay Police Court, Dublin, of going found drunk in a highway.

At the conclusion of the proceedings the President announced the decision of the Council as follows:—

'have to state that the Council has found that the convictions for misdemeanour alleged against Mr. Caspar Denis Downing in the Notice of Inquiry have been proved, but that judgment has been postponed until the next Session of the Council in November, when Mr. Downing will be required to be present and to produce satisfactory evidence as to his conduct in the interval.'

Mr. Downing did not attend in answer to his Notice, nor was he represented by Counsel or Solicitor.

The Acting-Registrar having read the Notice in the absence of a Complainant the Council's Solicitor placed the facts before the Council.

He stated that he had received a telegram from Mr. Downing the day before stating that he would be unable to be present. He put in the record a further conviction in Liverpool, September 9th, 1914, and a letter from Mr. Downing in answer to the charge.

Strangers having been re-admitted, after the Council had deliberated in camera, the President announced the decision of the Council as follows:

'I have to announce that Caspar Denis Downing having been proved to have been convicted of the misdemeanour alleged against him in the Notice, the Council has directed the Acting-Registrar to erase from the Medical Register the name of Caspar Denis Downing.'

The Council proceeded to the consideration, adjourned from May 25th, 1914, of the charge against Mr. Vallecott Cartwright Mallan, in regard to whom the Dental Committee had found the following facts:—

The said Vallecott Cartwright Mallan was registered in the Dentists' Register on December 6th, 1913, as a Dental Surgeon.

In practice on July 22nd, 1876, and his address in the Register at the current year is 106 Edgware Road, London, W.

The said Vallecott Cartwright Mallan practises at 106 Edgware Road aforesaid, and issues and distributes as widely as he can a catalogue and advertisement of an artizan of a photographic and edition and manner of advertising his practice. The card contains a number of illustrations of American plateless teeth; the pamphlet enlarges upon the advantages of consulting the said V. C. Mallan, and contains a photographic reproduction of a recent photograph on the long-standing reputation of the said V. C. Mallan and his family since the beginning of the nineteenth century. The said V. C. Mallan stated that the paragraph appeared in the Catholic Times, and was not an advertisement, although he advertised in that period. TheComplainants also submitted a two-column article which had appeared in the Hampstead Advertiser of July 17th, 1914, containing a portrait of the said V. C. Mallan, and a photograph of a challenge cup which had been presented in connection with local prize:

The said article contained a lengthy and full description of the said V. C. Mallan as a dentist as well as a public man interested in the public affairs of Marylebone.

The Complainants did not offer any proof that the said V. C. Mallan was responsible for this article, but he admitted in answer to questions that he had been interviewed by the Hampstead Advertiser and had given the information, some of which was untrue, therein contained, that although he had not paid for the latter, he had sent for one hundred copies which he had sent out to various people, and that he had in fact used the article as an advertisement for his practice.

At the conclusion of the inquiry before the Dental Committee, the said V. C. Mallan offered to give an undertaking that in future he would not advertise in any form of which the Council disapproved.

At the conclusion of the proceedings of the General Council on May 28th, 1914, the President announced its decision as follows:—

Mr. Mallan: The Council has considered the Report of the Dental Committee in regard to the facts proved against you and it has considered the undertaking which you have given, that in future you will not advertise in any form of which the Council disapproved. The Council has deferred the further consideration of your case to the November Session, when you will be required to be present and to produce satisfactory evidence as to your conduct in the interval, with particular reference to the manner in which you have carried out the undertaking regarding advertising which you have given to the Council.

The complaint against Vallecott Cartwright Mallan having been considered by the Council and directed to be considered further at a subsequent occasion, the Dental Committee reported further as follows:

The case was considered by the Dental Committee, on May 28th, 1914.

The following parties attended before the Committee and were duly heard:—

The Council, the British Dental Association, represented by Mr. R. W. Turner, Counsel, instructed by Messrs. Bowman and Curtis-Hayward, Solicitors.

The said Vallecott Cartwright Mallan personally.

Mr. William Fletcher Thomas Brown, managing clerk to Messrs. Bowman and Curtis-Hayward, gave evidence of a visit he had paid to the premises of the accused at 106 Edgware Road, W., and that the only difference he had observed in the appearance of the place since the hearing in May last was that the photographs of patients and testimonials from them
had been removed from the entrance lobby. Mr. Turner stated that the complainants believed that the distribution of cards and pamphlets had ceased.

The said Vallec Cartwright Mallan admitted the advertisement, but not Mr. Bregg's evidence, but denied that he had broken the undertaking not to advertise which he had given to the Council, and contended that such undertaking was intended to apply only to the first ground of complaint (as to cards and pamphlets) but not to the second ground of complaint which had been made of his registered undertaking. He had broken no part of his undertaking, and had removed the photographs and pamphlets with which the premises were provided.

Mr. Turner then addressed the Council in his own behalf, and answered questions put to him from the Chair as to the undertaking which he gave in May. Mr. Hart addressed the Council on behalf of the Complainants.

Strangers having been re-admitted, after the Council had deliberated _ex camera_, the President announced the judgment of the Council as follows:

_Mr. Mallan_: I have to call your particular attention to the following charges against you:

1. That being a registered dentist you have extensively advertised your practice:

2. By means of various conspicuous notices on the outside and inside of your premises at 106 Edgware Road, W., where you carry on your practice, there is a shop window on the ground floor thereof filled with shelves of false teeth, and notices advertising your practice.

3. The Council are not entirely satisfied that you have fully understood the undertaking which you gave to the Council in May, and that you had implicitly kept his undertaking by the particular means set forth in this paragraph of the charge.

The Council then invited Mr. Mallan to explain to them the meaning of advertising as specified in paragraph (c) of the charge, as they are not altogether clear as to the particular undertakings to discontinue advertising by the other means specified in the charge.

Mr. Mallan then asked the Council to impress upon them that the means of advertising specified in paragraph (c) of the charge are no less objectionable than the others, and fall within the resolution of May, 1894, of which you are aware.

They propose to give you a further opportunity of explaining to the Council the objectionable forms of advertising which you have continued to adopt, and for this purpose postpone their judgment in your case until May next.

A copy of this judgment will be sent to you in due course.

Moved by the Chairman of the Business Committee, seconded by Sir Charles Ball, and agreed to:

_That Dr. Little be elected a member of the Business Committee in the room of the late Sir Christopher Nixon._

The Council proceeded to the consideration of the case of James Sirran Acremly Walker, registered as of 60 Oldham Road, Manchester, M.B., C.M. 1887, M.I. 1898, Univ. Aberdeen, who had been sum-sumned to appear before the Council on the following charge:

_That being a registered medical practitioner you gave under the National Insurance Acts 1911 and 1913 a certificate of sickness dated July 30th and August 7th, 18th and 25th, 1913, respectively, certifying that you had on those days respectively seen one Henrietta Horridge, and that she was suffering from chest affection, and was thereby still totally incapable of work, whereas you had not even seen any of those days, either seen or examined the said Henrietta Horridge. And that you authorised John Watt, a registered medical practitioner, to furnish similar certificates on your behalf in respect of the said Henrietta Horridge, and that you had not even seen the said Henrietta Horridge on either of those days, either seen or examined the said Henrietta Horridge._

And that in relation thereto you have been guilty of infamous conduct in a professional respect.

The complainants were the Manchester Insurance Committee.

The Council proceeded to the consideration of the case of John Watt, registered as of 416 Oldham Road, Newton Heath, Manchester, M.B., C.M. 1802, Univ. Glas., who had been summoned to appear before the Council on the following charge:

_That being a registered medical practitioner, you gave under the National Insurance Acts 1911 to 1913 two certificates dated July 28th and August 5th, 1913, respectively, certifying that you had on those days respectively seen one Henrietta Horridge, and that she was suffering from chest affection, and was thereby still totally incapable of work; whereas you had not on either of those days seen or examined the said Henrietta Horridge, both of which certificates were untrue, misleading or improper._

That in relation thereto you have been guilty of infamous conduct in a professional respect.

The Council's attention was called to this case by the Manchester Insurance Committee.

Dr. Walker and Mr. Watt attended in answer to their Notices, accompanied by Mr. A. J. F. Wedderburn, S.C., their Solicitor.

The Manchester Insurance Committee, the complainants, were represented by Mr. R. V. Clayton, and Dr. T. A. Goodfellow, of the Medical Service Sub-Committee, and Mr. J. E. Lilley, the Clerk to the Committee.

On question put from the Chair it was ascertained from Mr. Wedderburn, their Solicitor, that Dr. Walker and Mr. Watt were willing that their cases should be taken together.

The Council's Solicitor having read the Notice, Mr. Clayton stated the case for the Complainants, and put in the six certificates complained of, four signed by Dr. Walker and two by Mr. Watt.

Mr. Clayton tendered the printed copy of the correspondence in the case and the printed form of the certificates, Mr. Wedderburn did not object to the reception of the prints as accurate, and they were accordingly put in.

Mr. Wedderburn then called Dr. Walker as a witness on his own behalf, and examined him as to the certificates for the medical examination by various Industrial Societies, of which Dr. Walker had been Medical Officer prior to the passing of the National Health Insurance Act, in none of which was there any reference to the date of the medical examination of the member. He was examined as to the circumstances in which he had given the certificates complained of, and expressed his regret for his negligence.

No member desired to put any question to Dr. Walker through the Chair. Mr. Clayton did not desire to cross-examine Dr. Walker.

Mr. Wedderburn called Mr. John Watt and examined him as a witness on his own behalf. Mr. Watt concurred with the evidence given by Dr. Walker which he had heard. He was examined as to the accuracy of the statement which had been drawn up for him.
by Mr. Wedderburn, gave an undertaking not to give certificates in a similar manner in future, and expressed his regret for his negligence.

No member of the Council desired to put any question to Mr. Watt. After a long speech by the Counsel for the defendants, the Council deliberated in camera, and on remission of strangers the President, addressing the parties concerned, said that the facts had been proved to the satisfaction of the Committee, and with the assistance of the case, the Council had taken the explanations given in good faith, and therefore the Acting Registrar had not been ordered to erase from the Register the names of J. A. Walker and John Watt.

The Council then considered the case of Cartwright Davis registered as of 81 Knightbridge, S.W., in practice on July 22nd, 1875, in regard to whom the Dental Committee have found the following facts:—

The Dental Register contains the following entry:—

<table>
<thead>
<tr>
<th>Name</th>
<th>Address</th>
<th>Date of Registration</th>
<th>Description and date of Qualification</th>
</tr>
</thead>
<tbody>
<tr>
<td>Cartwright Davis</td>
<td>81 Knightbridge, London, S.W.</td>
<td>1875 December 31st</td>
<td>In practice on July 22nd, 1875.</td>
</tr>
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</table>

Information having reached the British Dental Association early in the present year that the person practising as above was neither Cartwright Davis nor a dentist, the President, with the assistance of the officials of the Council, made careful and thorough inquiry and ascertained the following facts:—

Cartwright Davis was a name under which a Mr. Mallan practised dentistry, and in 1878 registered under the Dentists Act. Some years ago he took as an assistant one John Edwin Sutton, who, however, never qualified as a dentist or registered. On the death of Mallan his widow carried on the practice through Sutton, who married her daughter, and since 1873 Sutton had regularly signed the returns to the Registrar of the Council in the name of Cartwright Davis, thereby maintaining that name upon the Register and himself practising as a dentist under that name.

The British Dental Association prosecuted Sutton under the Perjury Act, 1911, and pressed for his committal for trial at the Central Criminal Court. He was tried on July 21st, 1914, at the Central Criminal Court before the Common Sergeant and pleaded guilty to the charge of unlawfully procuring himself to be registered in the name of Cartwright Davis on the Register of persons qualified to practise as dentists. The Common Sergeant bound Sutton over in a recognizance of £50 to come up for judgment if called upon, but seeing that this was the first case brought forward under the new Act he did not impose any other penalty.

The facts as above stated have been formally brought to the attention of the Council by the British Dental Association, and the Committee is advised that as Sutton, by pleading guilty, admitted the facts it is not necessary, in dealing with the question of the removal of Cartwright Davis from the Dentists’ Register, to hold a formal inquiry as to the further proof of the facts. The Committee, therefore, being satisfied that the facts are as above stated, reported them to the Council as follows:—

The Council then adopted the name of Dr. Lambert Ormsbey, nominated by the Irish Branch Council, as a member of the Education Committee in the place of the late R. H. C. W. H. Lock, F.R.C.S., and also, as nominee of the same Branch Council, the name of Dr. Magennis in the room of Dr. A. H. Curran.

The reports from the Examination Committee, presented by Sir Chas. Hall, (a) On a question relating to the Indian Medical Service; (b) On the examinations held by the Apothecaries’ Hall of Ireland, 1913-1914, (c) On reports by the Assistant Examiners in Surgery of the examinations held by the Apothecaries’ Hall of Ireland since May, 1914, were received and entered on the minutes.

A long discussion took place with regard to (b) and (c) dealing with the Apothecaries’ Hall of Ireland.

A. Moved by the Chairman of the Examination Committee, seconded by Mr. Verrell:— "That the Irish Branch Council be authorised to appoint for a further period of one year a Deputy to attend and present on behalf of the General Council at the Professional Examinations held by the Apothecaries’ Hall, for the purpose set forth in Section 18 of the Medical Act, 1858; that the Deputy so appointed present to the Council in the time of such examination the report of such examination; and that he be paid a salary of £50 for the year." which was carried after Dr. Magennis proposed as an amendment the motion of which he had given notice: That the time had come when any exceptional treatment of the Apothecaries’ Hall of Dublin as regards inspection of its examinations and reports on them should cease." This amendment did not find a seconder, and therefore dropped.

B. Moved by the Chairman of the Examination Committee, seconded by Dr. Taylor, and agreed to:—"That the Examination Committee be authorised to refer to the Apothecaries’ Hall the reports by the Assistant Examiners in Surgery on the Examinations of the Apothecaries’ Hall of Ireland, held since May, 1914, and the tables relating thereto supplied by the Apothecaries’ Hall, with a request that that body will furnish its observation in regard to them.

Moved by the Chairman of the Examination Committee, seconded by Dr. Saundby, and agreed to:—"That the question referred to in the foregoing resolution A of this day’s proceedings be taken into consideration at the May Session of the Council on the day following.

Moved by Sir Henry Morris, seconded by Mr. Thomson, and agreed to: "That the Examination Committee be requested to draw up a summary statement of the particulars to be considered by the Council in pursuance of the foregoing resolution A."
The Council considered the report of the Public Health Committee, brought forward by Sir John Moon, and seconded by Dr. Newsholme. It was received, entered on the minutes and approved.

The oral report from the Chairman of the Pharmacopoeia Committee was approved.

The Report of the Students' Registration Committee, brought forward by Dr. Norman Moore, seconded by Sir H. Morris, was received, entered on the minutes and approved.

The report from the Dental Education and Examination Committee was received, entered on the minutes, and approved after Mr. Trench had reported on a motion.

In the discussion which followed Dr. Newsholme, who had seconded, remarked that in 34 years there had been no increase in the number of qualified dentists. Mr. Lambie, seconded by Dr. Macdonald, and Mr. Housden, was carried that this matter be referred to the Dental Committee, so that facts might be gathered.

Dr. Langley Browne, seconded by Sir J. Moore, brought forward the report of the Unqualified Practice Prevention Committee, which was received and entered on the minutes and its recommendations approved.

The Committee dealt with the report of the Select Committee on Patent Medicines, and recommended: (e) "That the General Council should convey to the Lord President of the Privy Council an expression of its complete approval of the recommendations of the Select Committee on Patent Medicines." (f) "That the General Council represent to the Government through the Lord President the necessity for the immediate creation of a Ministry of Public Health in pursuance of the recommendations of the Select Committee on Patent Medicines.

A vote of thanks to the President was carried by acclamation, and the Council, having received in concord a report from the Office Site Committee, rose.

GOVERNMENT AND CIVIL AND MILITARY SANITATION IN THE TROPICS.

The first of two Chadwick public lectures was delivered by Sir Ronald Ross, K.C.B., F.R.S., at the London School of Economics, on December 1st.

The lecturer set out by stating that the subject of the relations between administration and public sanitation had not been completely discussed. The older theory of government, well enunciated by Dr. Hume, was that the only object of the government was to prevent disease, hence there was no department of public health, no sanitary administration, no sanitary legislation. The present system was to provide a sanitary service which was considered a public charge, and the idea had been abandoned in favour of the view that government should do everything possible for the prosperity of its subjects. The lecturer then proceeded to trace the history of the past of tropical sanitation, and observed that tropical sanitation had been excluded from large tropical areas such as tropical Africa, and ascribed this largely to the presence there of great tropical diseases which had not been investigated until recently. We now know how many of these maladies are caused and may be prevented; but the question still remains whether public administration can utilise the preventive measures suggested by science. Examining the history of this question, the lecturer pointed out that in the old days medical and sanitary matters were originally in the hands of the priestly caste, many of whose religious injunctions were really of a sanitary nature. Thus the ancient agriculturists of the East were concerned with sanitary matters, and epidemics often provoked ridiculous attempts at prevention.

The modern history of tropical sanitation begins from the time when the European nations commenced colonisation. Terrible sickness was experienced in the time of the old voyagers and conquerors. Little attention was given to good food, water conservancy, dilapidation and housing. About the middle of last century sanitation in Europe began to approach its modern growth, and naturally affected tropical sanitation.

The lecturer enumerated the seven commandments of sanitary science and concluded by describing how they began to be obeyed by governments and people in the tropics, although it had not come to pass.

The second lecture, on Friday next, December 11th, illustrated with lantern slides, will give a review of the present sanitary conditions, the efforts made by governments to deal with sickness, and the lecturer's suggestions on various points.

BELGIAN MEDICAL MEN AND PHARMACISTS' RELIEF FUND.

Amount previously received at Offices of MEDICAL PRESS and CIRCULAR 74 13 0

Additional list, per London Office:

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Further donations will be most gratefully received at the Offices of the MEDICAL PRESS and CIRCULAR, 8 Henrietta Street, Covent Garden, London, W.C., or 20 Nassau Street, Dublin. Cheques should be drawn in favour of the Belgian Doctors' Relief Fund, and addressed to the Editor.
CORRESPONDENCE.

FROM OUR SPECIAL CORRESPONDENTS AT HOME.

SCOTLAND.

University of Edinburgh—Resignation of Prof. Wyllie.

The resignation of Professor John Wyllie, the occupant of the Chair of Practice of Physic, is announced. He has been in bad health for some little time, and has of late found that the duties of the chair make demands on his strength to which he is unequal. He has therefore resigned and has been succeeded, after fifteen years of active service in the ward, by Professor Wyllie, who has been in the hands of a medical practitioner for the past few years and has been found suitable for the position.

The resignation of Professor Wyllie will be followed by the appointment of Professor John Mair, who has been associated with the University for some years.

Privileges to Students in H.M. Services.

The Senators of the University of Edinburgh, like other University authorities, have granted certain privileges to their students, who are admitted to the services of the University, and are required to attend the meetings of the University and to pay a certain amount of money. This privilege is extended to students of the University, who are enrolled in the military forces, and to students of the University, who are enrolled in the police force. The privileges are extended to students of the University, who are enrolled in the criminal courts, and to students of the University, who are enrolled in the police force, and to students of the University, who are enrolled in the criminal courts.

Victoria Infirmary, Glasgow.

The annual report of this infirmary states that the average number of resident patients was 260, and the death-rate, after deducting those who died within 48 hours of admission, was 6.2. The report of the War Office, which has been issued, shows that the number of wounded soldiers in this country is 15,000, and that these have been occupied by wounded Belgians. Although there has been a slight falling off in the total subscriptions for the year, the working-men's contributions show a substantial increase, notwithstanding the Insurance Act. An appeal for funds to erect a pavilion to accommodate 80 more patients was about to be made, and plans had been prepared by the architects for the year when the war broke out and it was deemed advisable to suspend the work. The £5,000 which was raised was not sufficient to cover the cost of the pavilion, and it was necessary to appeal for additional funds.

The Late Surgeon R.N.

Surgeon William Miller, R.N., who was killed by the explosion on H.M.S. Bulwark, qualified at Glasgow University in 1896. He was a son of Mr. and Mrs. William Miller, Torbex, Maxwell Drive, Pollokshields, Glasgow, by the late Miss Miller. The King and Queen have sent Dr. Miller's parents a telegram expressing their sympathy.

Glasgow Medical Missionary Society.

Dr. W. L. Reid presided at the annual meeting.
of this Society, held in the hall of the Royal Faculty of Physicians and Surgeons. Owing partly to the
insurance Act, the number of attendances at the
dispensary was considerably larger than it was a few
years ago. No one was treated at the dispensaries who
was entitled to medical benefit under the act. About
six hundred male and female students had received
training at the dispensary during the year, and weekly
most of them were prospective missionaries. The patients
were mostly women and children, and only those not
certified for parish relief and unable to pay for a
doctor's attendance. Sir Donald MacMillan, Honorary
President; Drs. W. L. Reid, President;
and Mrs. J. D. Maclean, C. R. McLean and
Yellowles, Vice-Presidents.

MOTOR AMBULANCE.

Principally through the exertions of Miss N. Anderson,
Bazskimming, and the generosity of Mr. K.
Crane, of the Haughe, Mauchline, Ayrshire is
serving a motor ambulance named Bonny Jean, to the
front. Major Edmund Pullar, of Westerton, Bridge
of Allan, is also sending a motor ambulance waggion.
The County of Roxburgh is also making arrangements
to provide a motor ambulance.

BELFAST.

WHITESTABY SUMMATORIUM.

At the monthly meeting of the Council of the County Borough of Belfast, held on the 1st inst., Dr.
Hans Gilliland was elected Resident Medical Superintendent subject to the approval of the Local Govern-
mant Board. The salary attached to this post is £500 per annum. Personal board and lodging are
also provided in the institute. Dr. Gilliland is to be
congratulated on his appointment as the first resident
medical superintendent of this sanatorium, recently
acquired by the Belfast Corporation from the
Guardians.

PREVALENCE OF SCARLET FEVER IN BELFAST.

The Chairman of the Public Health Committee of
Belfast, Dr. Thomson, commenting on the report of
the Medical Officer of Health, said the notifications
from scarlet fever continued high. During 1912 there
were 916 cases notified, with 48 deaths; in 1911,
2,155, with 133 deaths, and up to the 30th November
of this year, 2,092, with 131 deaths. He said the causes
of infection were, first, from patients before detection;
secondly, from patients whose illness was concealed;
thirdly, from patients in whom the disease had not
been recognised; and fourthly, from carriers who
were not themselves suffering from the disease.

LETTERS TO THE EDITOR.

[We do not hold ourselves responsible for the opinions expressed by our Correspondents.]

CHRONIC RHINORRHEA IN A SEPUL-
GENARIAN.

To the Editor of The Medical Press and Circular.

SIR,—Perhaps one of your numerous readers may be
able and good enough to help me in a difficulty. I
have a patient, aged 70, who for ten years has
complained of nasal tachycardia. This has now
toned down gradually to a generally rapid, feeble
and very irregular cardiac activity, under the constant
use of digitals, however—to minims of the standard
amount. Twice daily. As my patient naturally
does not wish to be obliged to take drugs for the
remainder of his life, I shall be glad to hear of something
that will give a more lasting relief—special nerve tonic
for the aged, for instance. I should perhaps add that the
nasal discharge is thin and watery when the atrope
is not used, clear and thick when it is used, and not
copious when sprayed two or three times a day.

Hoping for suggestions from some of my professional
brethren,

I am, Sir, yours truly,

November 30th, 1914.

EXPERIANT.

THE STUDENT'S TRAINING.

To the Editor of The Medical Press and Circular.

SIR,—I note with a sincere pleasure and some little
pride that my last letter has had some effect—which
I hope will be otherwise than good—upon the
sagacity "Observer." Observer has been quoted with
a fortitude of reformation that I like to see "confine
himself to civilized discussion." So far so good.
"Observer" has confessedly tried to alter his methods,
and in his new light we must consider his matter.
It is poor.

He maintains that a man's "school education, his
medical preliminary, and subsequent reading" can
with advantage take the place of physics, chemistry
and zoology, which, he says, have "no direct bearing
on his professional work." This last phrase looks to
me very like begging the question.

Of course, it is possible that "Observer" honestly
thinks that, for instance, physics has no direct bearing
upon the physical examination of the chest. Take
the phenomenon of vocal fremitus. We learn that it
is increased in lobar pneumonia and decreased in
pleural effusion. If, as "Observer" would have it, we
learn these lessons disconsolately, there is
no reason why we should not confuse one with
the other. But if we have assimilated the elements
of physics, and have the slightest realisation of the
fact that the "Observer" invites us to perform this
instant as to those signs' respective incidence. That is
my argument.

"Observer" thinks he has caught me tripping. I
advocate the assimilation as opposed to the absorption
of knowledge. "Observer" asks impatiently—
in the word's literal sense—"Can knowledge be
assimilated without being absorbed?" I reply, "No,
sir; yet there is a difference between the one and the
other. A commoner or bolder the phenomenon absorbs but
momentarily, it takes a living organism to
assimilate part of what it absorbs, to make it into
itself and part of its own ego."

That is the difference. I am sorry it has to be
explained to "Observer." I had some hope for him
until he asked that question. I have little now. His
last letter places him among the intellectual sponges
whose ideals he advocates.

I am, Sir, yours truly,

TOM A. HAWKE.

OPERATIONS FOR APPENDICITIS.

To the Editor of The Medical Press and Circular.

SIR,—It has long been in my mind to give utterance
to my thoughts in reference to operations for appendi-
itis. I am quite satisfied in my own mind that
more lives are lost from that disease at the present
time than was the case before frequent operations
came into vogue. Whether cases are operated on too
early or too late does not matter; the only thing that
is worth considering is the life and limb of the patient.
Whether a case be an acute appendicitis or a chronic
appendicitis, the pendulum will in time be the other way, but at
present operations are too frequently performed. It is
an abomination, too, that the physician cannot render
these operations unnecessary. With all our serum
treatments these cases ought to be successfully
treated without operation. Perhaps when the surgeon
has taught the physician a little more he will be able
to dispense with the former. Too often, however, he
does not consider that the physician is not even consulted
by the surgeon. I have repeatedly heard of operations on the alimentary
canal being performed without a physician seeing the
patient at all. In such cases the family attendant and
the operating surgeon take too much on themselves.
The patient has a right to all the advice he can get,
and to deprive him of this is not giving him fair play.
To every family medical attendant I would say with
all the earnestness in my power: In all cases of
appendicitis call in a surgeon, and then, and
not till then, if his advice is to call in a surgeon, do
so. But a one-man advice, never.
All inflammatory diseases of the abdomen, or their consequences, ought to be treated successfully by the physician. The present generation has not the rage of former times for removing the ovaries and Fallopian tubes for mere inflammatory disease. Inflammation, as we all know, is only a passing and fairly transient phase.

I am, Sir, yours truly, Liverpool. 

A PHYSICIAN.

ALCOHOL AND THE WAR.

To the Editor of The Medical Press and Circular.

Sir,—I read with pleasure the courteous letter of your correspondent "Therapeutist" in reply to mine on the above subject. I may say with regard to the small amount of alcohol required to set up phagocytic action, about which he is sanguine, I must refer him to Dr. L. H. Boden-Davies Practical Anatomy, London, 10th of October, and to my clinical experience published in the Medical Times of October 31st, under the heading "Our Sailors' and Soldiers' Grog." From very careful observations of 10,000 men, I am unable to endorse "Therapeutist's" opinion that "the vast majority of our soldiers, if tempted to drink, are in great danger of becoming immoderate in their use of alcohol." On the contrary, I believe that if you treat soldiers as gentlemen, and rely on the physician for the temptation to drink does not come into the question. Further, I believe restriction only incenses the men, does not add to the prestige of their calling, and prevents many educated men and patriots from enlisting. Lastly, if both opium and alcohol are subject to the inspection, why cannot soldiers always get such luxuries in the trenches and on forced marches?

I am, Sir, yours truly, 

Thomas Dutton.

London, December 4th, 1874.

OBITUARY.

DR. OSCAR JENNINGS.

We regret to announce the death of Dr. William 

Oscar Jennings, of Carlisle Mansions, S.W., which 

took place suddenly at Ramsgate on November 23rd, 

aged 63. The deceased, who qualified as M.R.C.S. 

in 1848, and F.R.C.S. in 1853, wrote a small 

medical book, "Diseases of the Spinal Cord," which 

was translated into the French language. He is well known to the medical profession as an authority on the urethra, and the pathology and treatment of which he has made a close study. Most of his published works deal with this subject and may be regarded as classic contributions. He was a member of the French Society of Medical History, and a Fellow of the Royal Society of Medicine. Dr. Jennings leaves behind him a widow and a daughter to mourn his loss, and with them the greatest sympathy will be felt.

MEDICAL NEWS IN BRIEF.

Royal College of Surgeons in Ireland—Students' Union.

There was a large gathering in the Royal College of Surgeons last Thursday night at the inaugural meeting of the Students' Union, presided over by Mr. F. Conway Over, President of the College. The inaugural address on "The War" was delivered by Mr. T. E. Gordon, F.R.C.S.I., who addressed himself particularly to the students who would be engaged in surgical duties at the front, and pointed out their duty.

The vote of thanks was proposed by Major-General Friend, seconded by Mr. Justice Barton, and passed, the latter declaring that the war was entered into under absolute necessity. The President expressed pride in the College's contribution of young men. The Lord Mayor, in seconding a resolution declaring the Union worthy of support, said that all Ireland was

one in view in supporting the Empire in this war. There were 500 licentiates of the College at the front, and 100,000 Irishmen with the colours. A vote of thanks to President was passed on the motion of Mr. J. C. Ferguson, seconded by Mr. H. Hurst, and put by the Recorder.

Royal College of Physicians of Ireland.

At the monthly meeting of the Royal College of Physicians last Friday, Dr. James Little, Senior Fellow of the College, on behalf of Miss Gerrard, presented a portrait in oils of Dr. Jonathan Osborne, President in 1834-5, and for many years King's Professor of Materia Medica and Pharmacy in the School of Physic. Dr. Little is one of the last surviving Dr. Osborne's pupils, and in a delightful speech he gave some personal reminiscences of one who, in his time, occupied an honourable place in Irish medicine. The thanks of the College were given to Miss Gerrard for her generous gift.

Presentation to McDowell Cosgrave.

On Saturday night last Dr. McDowell Cosgrave was entertained to a complimentary dinner at his Chelsea Hotel, Dublin, on the occasion of his election to the Presidency of the Royal College of Physicians. Dr. Graves Stott was in the chair, and a presentation was made of a piece of plate by the Medical School and his long association with the Hospital for which he has done so much. The presentation was made by Dr. O'Keefe.

Royal Naval Medical Service.

The following have been appointed Temporary Surgeons:—A. F. Adamson and P. McGrundy, both to the Victory, additional, for SS. Majic, to date November 3rd; H. Harvey, to Hospital Ship China, to the County of Cork, for R.N. Air Service; J. C. Baggs, to R.M. Division, Portsmouth, vice Faill; E. M. Molesworth and F. S. Calthropp, both to the Victory, for R.N. Division; G. F. Jones and T. C. Blackwell, both to the Victory, additional, for R.N. Division, Crystal Palace, vice Molesworth and Calthropp, respectively, to date November 30th.

Army Medical Service.

The following have been appointed:—Captain Sir Bertrand Edward Dawson, K.C.V.O., M.D., and London General Hospital, T.F., to be temporary Colonel (November 21st).


The Medical Officer of Epsom College.

It is announced that the Council of Epsom College has appointed Mr. P. Jenner Verrall, M.B., B.C. Cantab., F.R.C.S., Medical Officer to the College, in succession to Mr. W. W. Collart, L.R.C.P., M.R.C.S., who has resigned that position after holding it for 28 years.

The Royal Institution.

Dr. CHARLES SCOTT SHEPPARD, D.S., M.D., F.R.S., has been elected Fullerian Professor of Physiology at the Royal Institution for a term of three years.
NOTICES TO CORRESPONDENTS, &c.

Do not send replies to this column unless they are particularly requested to make use of a "Distinctive Signature" or "Subscription Number." "Reader," "Subscriber," "Old Subscriber," etc. will be acknowledged by us. No correspondence will be returned unless postage is prepaid.

SUBSCRIPTION.

Subscriptions may be suspended at any time, but the subscription will continue from the date the subscription is received, and the amount paid will be advanced. For India, Meser, Theaker, Spick, and Co., of Calcutta, are our officially-appointed agents for the sale of the Journal. Messrs. Dawson and Sons are our special agents for Canada. For South Africa, The Record Publishing Co., Cape Town, are our officially-appointed agents. Messrs. Maclean, Bromley, & Co., are our special agents for Australia. Communications and applications for reprints should be addressed to the Editor at the London office, 8, Henrietta Street, Strand; if remittances are to be sent to the Dublin office, in order to save time in forwarding from office to office. When sending subscriptions the same rule applies as to office; these should be addressed to the Publisher.

Reprints—Reprints of articles appearing in this Journal can be had at a reduced rate, providing notice is given to the publisher or printer before the type has been distributed. This should be done when returning proofs.

Meetings of the Societies, Lectures, &c.

**Wednesday, December 28th.**

HURSTHAWK SOCIETY (Barbers' Hall, Monkwell Street, E.C.1).—9 p.m.: Clinical and Pathological Reading. Cases and Specimens will be shown by Dr. E. Fox, Dr. T. Thompson, Mr. L. Bromley, and Mr. W. G. Bell. Dr. A. J. Jordan and Mr. E. H. Williams: Demonstration Illustrative of War Injuries and Diseases in South-West London Medical Society (Beaumont Hospital, Wandsworth Common, S.W.).—9 p.m.: Dr. S. Dodd: Echinococcus Tumours in the Brain.

**Royal Society (Burlington House, London, W.),—Papers, Mr. J. Gray, Dr. J. P. Willis.**

ROYAL SOCIETY OF MEDICINE (Section for the Study of Disease in Children) (Mr. Wimpole Street, W.,—4.30 p.m.: Specimens and Cases of Snoring.—By Dr. R. D. Macdonald, Dr. E. K. J. Pollard, and Dr. G. H. K. Nix.

**Tuesday, December 29th.**

ROYAL SOCIETY OF MEDICINE (Clinical Section) (Mr. Wimpole Street, W.).—8 p.m.: Clinical Cases by Dr. Alexander Morison. Paper: Dr. A. A. Hertz and Mr. C. H. Fagg: Case of Spontaneous Eruption—A 40-Year-Old Woman with Subsequent Perforation and Recovery after Operation.

Vacancies.

Royal Albert Edward Infirmary and Dispensary, Wigan.—Senior House Surgeon. Salary £700 per annum, with board, apartments, and washing. Applications to Mr. E. May, Acting General Superintendent and Secretary.

City of Norwich Infirmary and Dispensary.—Resident Medical Officer. Salary £200 per annum, with board, washing, and medical and surgical applications. To Dr. Pattin, M.O.H. and S.M.O., Municipal Offices, Norwich.

Sherburne Hospital, near Durham.—Medical Officer. Salary £600 per annum and house. Applications to Dr. J. Jessop, Durham.

Somerset Institution for the Blind.—Assistant Medical Officer. Salary £250 per annum, with furnished apartments. Apply to Dr. H. H. Lockyer, Barnstaple.

St. Mary's Hospital.—Assistant Medical Officer. Salary £200 per annum, with furnished apartments. Apply to Dr. H. H. Lockyer, Barnstaple.

Stepney Green, E. C., and Borough of Warrington.—Assistant Medical Officer of Health. Salary £250 per annum. Applications to W. W. N. Joseph, Medical Officer of Health, Warrington Department.

Clayton Hospital, Wirksworth.—Senior House Surgeon. Salary £600 per annum, with board, lodging, and laundry. Applications to Mr. H. E. Hearn, Ilkeston.

Certifying Factory Surgeons.—The Chief Inspector of Factories announces the following vacancies for the above appointments:—Penarth (Glamorganshire); Wymondham (Norfolk).

Galway Hospital.—Resident Medical Officer and Compulsory Medical Officer for both offices, £450 a year. Application to J. J. Leonard, Acting Clerk. (See advert.)

Appointments.

BRENNER, A. F., M.B., B.S.Dublin, Medical Officer and Public Vaccinator for the No. 7 District by the Lunanston (Ireland) Board of Guardians.


DECKERT, A., M.B., Ch.B.Aberdeen, Non-resident Medical Officer at Aberdeen, £300 per annum. Applications to Dr. W. J. Douglas, Aberdeen.

PEACOCK, GEORGE E., M.B., Ch.B.Edinburgh, Honorary Surgeon to Dalkeith Infirmary. Applications to Dr. A. R. Hunter, Dalkeith.


LONDON, K. H., M.B., House Physician at University College Hospital.

Births.

FINCH.—On December 20th, at 34, Humberstone Road, Leicester, to Dr. C. F. G. Finch, M.B., M.R.C.S., of a daughter.

DEKRY.—On December 1st, at The Holles, Harpenden, to Dr. and Mrs. Sydney J. Dekry, of 3, Powell Gardens, Harpenden, Herts., of a daughter.

GARNETT.—On Sunday, November 29th, at 29, South Street, Greenwich, the wife of Graham H. Garnett, M.B., of a daughter.

GEORGE.—On December 3rd, at 30, Finchley Road, Hampstead, to Dr. and Mrs. W. Stanley George—a daughter. (New Zealand paper. please copy.)

JOHNSTON.—On December 1st, at Bangalore, India, the wife of Lt.-Col. F. Johnston, M.C., of a son.

LIDCOMBE.—On November 29th, at Portrica, South Africa, the wife of Dr. A. L. Longborough, M.R.C.S., L.R.C.P., of a daughter.

MCKEEN.—On November 22nd, at Wimborne, the wife of Capt. R. A. McKee, R.A.M.C., of a daughter.

NICHOLL.—On December 1st, at Wellesley Lodge, Croydon, to Dr. and Mrs. E. E. Nicholl—a son.

O'GILvie.—On December 2nd, at Long Grove House, Epsom, the wife of David O'Gilly, M.D., of a daughter.

ROSE.—On December 24th, at 7, Cottage, Russell Road, Hall Green, the wife of F. G. Rose, B.A., of a son.

SMITH.—On December 3rd, at the Red House, Virginia Water, the wife of G. W. Smith, M.B., of a daughter.


Marriages.

BREWINGTON TINDALL.—On December 28th, at Christ Church, Bromborough, N.W., Elmore Wright Brewington, F.R.C.S., of N.W. Infirmary, Manchester, to the daughter of Mr. and Mrs. Brewington, of Stansfield Abbot, to Oliver, youngest daughter of the late A. McFolr Tindall, of Hooton Park, Wirral. (High Court of Justice.)

LAID.—On December 4th, at Beauchy, William Talbot Laid, R.M.C., third son of Gen. Sir W. Talbot Laid, of Warren House, Orpington, Kent, to Phyllis Katherine, only daughter of Mr. and Mrs. Bernard Dale, of 71, Victoria Park Road, Wimbeldon. (By belp.)


Deaths.

COCKRILL.—On November 29th, at Trebach, South Wales, Dr. William Lawton Cockrill, aged 42.


MORRIS.—On December 1st, suddenly, Albert S. Morton, M.R.C.S., of 31, Melford Road, East Putney.


POLLARD.—On November 22nd, at Cape Town, Roger Harvey Pollard, R.M.C., of Her Majesty's ships the H.M.S. "Nelson" and the late Frederick Pollard, M.D., and of Mrs. Pollard, late of Bournemouth.

SCOTT.—On December 1st, at 28, St. Aunby, Hove, Edward Irwin Scott, M.D., in his 66th year.

TAYLOR.—On December 2nd, at 28, Runnymond, London Road, at 58, Runnymond Park Road, S.E., Herbert Taylor, M.B., aged 64.
The Medical Press and Circular

“SALUS POPULI SUPREMA LEX”


Notes and Comments.

Funds are still coming in satisfactory for the relief of the Belgian medical men and pharmacists. A week ago Professor Jacobs gave an address to the Edinburgh Obstetrical Society. Prior to the meeting Dr. Jacobs was the guest of the evening at a dinner given by the President, Sir Halliday Croom. As an immediate result, the meeting subscribed in the room one hundred guineas, which was then and there handed over to Dr. Jacobs. This gift, it should be clearly understood, has nothing to do with the fund organised by the Royal Colleges of Surgeons and Physicians of Edinburgh, which will be raised from the medical profession and from other sources. It was an absolutely spontaneous gift, to be administered in the way that seemed best to Professor Jacobs himself. Unconditional help of this kind is likely to be of special value at a time of financial stress and ruin such as that to which at least 1,000 Belgian medical men and 300 pharmacists are now being subjected. We cannot but think that the central fund will do well to adopt a similar principle with a view to the relief of immediate needs. The Central Committee, which is still described as “provisional” by the British Medical Journal, did not hesitate in the first few days of its existence to earmark 2,000 packages of drugs at £5 each for the Belgian doctors and pharmacists. Another £10,000 might well be earmarked for distribution in grants of money, but the point has doubtless been considered by the Committee. It is to be hoped that body will carefully consider our suggestion that it would be well to apply to Government for an adequate loan for this special national relief, as it is unlikely a sufficient sum will be forthcoming from private sources.

Typhoid in the Belgian Army.

There appears to be some likelihood in the statement that a serious outbreak of enteric fever has occurred among the Germans in Flanders. They are fighting in a district that is waterlogged, and therefore favourable to the spread of a water-borne malady, while it is difficult to treat a large number of sick troops in a hostile country. A certain proportion of the German cases will come as prisoners into our own hospitals, while convalescents will for some time to come (and here and there permanently) become centres for the spread of the disease far and wide. It is not easy to gauge facts at all accurately in the face of conflicting or contradictory reports from the seat of war. For instance, the official contradictions of the existence of enteric fever on a large scale in the Belgian army is hardly consonant with the fact that the British Red Cross Society and the Order of St. John recently sent an advance of £10,000 for the assistance of Belgian soldiers at Calais suffering from that malady. This grant appears to be both wise and humane, and indicates a generous policy on the part of the British Red Cross Society.

At the same time it may be perhaps permitted to pass a small criticism on the fact that the British Red Cross nurses are required to provide their own outfit at an expenditure of from £6 to £8. As a general rule, it may be assumed that the average trained nurse is not able to find £6 or £8 at short notice. If the Red Cross, or any other organisation, wish to maintain an adequate supply of trained and trustworthy nurses at the seat of war, they will have to treat their nurses on a financial basis that compares favourably with what would be earned at home. In Calais, we believe, there is a lack of skilled nursing, and it is certain that in some of the Belgian hospitals there is not only inadequacy in point of numbers, but also as regards proper nursing qualification. Under these circumstances, the British Red Cross might have availed itself of the services of some of the long array of fully-trained nurses which, we gather from various sources, is on its waiting list. Indeed, it may be doubted whether the Society has made the most of the proffered services either of medical or of nursing volunteers. The work achieved by the British Red Cross Society, however, is of an arduous and extremely difficult and complicated nature, and they have performed wonders in the face of great obstacles. It is more than probable, indeed, that there is more than sufficient ground for its policy in various matters that are apt to be misjudged by the outside public.

There is another class of nurse engaged in military nursing to whom (if our information be correct) the grievance of supplying their own outfit applies. The Regular Army nurse is engaged on a permanent footing, and a free outfit is provided. The Territorial Force, however, comes under different regulations, and no grant is made towards the cost of necessary outfit. A nurse, therefore, joining that branch of the service, incurs an outlay of some £8 for that purpose. The War Office should see to it that this small grievance is at once removed. The nation has poured out money like water for war purposes, and there can be no excuse for paltry economy in the case of military nurses, who have come forward in a time of national crisis to undertake work which is beset with discomforts, hardships and risks of various kinds, and which, moreover, often involves
the sacrifice of an easier and better-paid occupation.

Of all sorts and conditions of folk who are helping in our great fight there is none more deserving of generous treatment and careful solicitude than the nurses, whether soldiered or voluntary, whether trained or untrained, whether lay or military: their service in all capacities represents a high ideal of loving-kindness.

The general principle that officers of the Royal Army Medical Corps and civil medical men who accept posts under the various Red Cross Societies for tending the sick and wounded are, of necessity, non-combatants, has usually been accepted as an axiom of modern warfare. In every hospital for wounded soldiers—staffed by British officers, no distinction is made between our own men and those of the enemy; all alike receive the best available treatment.

To detain a medical officer or Red Cross man as a prisoner of war is a short-sighted policy, as well as contravening the principles laid down by the Geneva Convention. The wounded soldier, or one stricken by typhoid or pneumonitis, should not be deprived of the best help that modern science can give him, and, other things being equal, he will make best progress by being attended by one of his own nationality. The common cause of humanity is outraged by the senseless practice of tying the hands of medical men, as to speak, and rendering their skillful services are of no avail. We understand that the Geneva International Red Cross Association has been in correspondence with the German Red Cross upon the point of the alleged refusal of the German authorities to release British Red Cross surgeons and ambulance men. German Red Cross men have been sent back to their own country from France, and, so far as we are aware, none is detained in this country. It is to be hoped that sufficient pressure may be brought to bear upon the German military authorities so that British medical men who are prisoners of war may be speedily set free in order to carry out their beneficent task.

There are no deaths, happily, to report this week among officers of the Royal Army Medical Corps. We have to record the names of two wounded officers—Lieut. J. P. Charles, R.A.M.C., and Capt. G. H. Stack, R.A.M.C. The following officers not previously reported as prisoners are now reported, through the United States Embassy, to be prisoners of war: Capt. C. T. Edmunds, R.A.M.C., Capt. F. J. Garland, R.A.M.C., Lieut. J. R. Hayman, R.A.M.C., Capt. E. M. Middleton, R.A.M.C., Capt. A. M. Pollard, R.A.M.C., Lieut. W. A. Russell, R.A.M.C., and Major A. G. Thompson, R.A.M.C. Lieut. E. Hepper, R.A.M.C., is unofficially reported as prisoner of war.

LEADING ARTICLES.

THE STATE IN RELATION TO APPLIED SCIENCE.

There is reason to believe that the effects of the great European war will show themselves in various important socio-economic directions. In some cases results will be direct and obvious, whilst in others they will be more or less remote and at times revolutionary as regards preconceived ideas and practice. The sudden outbreak of patriotism that has arisen throughout the British Empire points to an underlying national quality that approaches somewhat closely the ideal of the higher form of collectivism. It seems likely that amongst these changes the relations of the State to science generally will undergo a considerable revision. In a rapidly progressive civilisation the monetary value of scientific discovery has become more and more apparent. That fact could hardly be more aptly illustrated than by considering the advanced science of the present war, with its mechanical propulsion in the air, on the surface of earth and sea, and beneath the sea itself; with its high explosives, its quick-firing guns of enormous range and accuracy—in a word, with a vast armamentarium derived from many fields of intellectual activity. In military matters it is clear that the State must keep in close touch with scientific advances in order to hold a position secure amid the armed camps of the world. Nor is it less necessary for her to maintain a similar vigilance with regard to her commercial prosperity. Hitherto it has been the custom of our Governments, with perhaps a few trivial and unimportant exceptions, to leave science severely alone. The scientific investigator has had too often to find in virtue his sole reward, and he has for the most part been left to sink or swim as Providence and his own genius might direct. The plea for the endowment of science has not yet found an active response from any British Government. This attitude, fortunately, is not that of positive rejection, and we may hope that some day our rulers will recognise the fact that the endowment of science offers a sound investment of national capital in the interests of Imperial finance. Whatever views we may hold as to the ethical standards of Germany as a nation, it must be admitted that she has shown the supreme value of endowed science as a national asset. A familiar illustration is that of the aniline dyes, which, discovered many years ago by an Englishman, were fostered by the German Government and gradually developed into a huge industry of world-wide range. The vicissitudes of war, with fateful irony, have deprived us of our regular supply of German dye-stuffs, so that the English woollen manufacturers find it increasing difficult to obtain the khaki tint which experience shows is best fitted to elucidate the marksmanship of an enemy in the field. But the important part played by the aniline dyes in arts and commerce is by no means finished, and, as it turns out, there is a prospect that the industry may be restored to the country of its origin. The outbreak of war has so far dissolved the obligation of patent rights that it is open for English manufacturers to work German patents with Government sanction. Under these circumstances it was natural that a commercial company should be at once formed to manufacture aniline dyes, and this has been done. The occasion, moreover, has been marked by a new State departure of the highest significance. It has been announced that the
Government will guarantee a certain rate of interest on the capital invested in the aniline company. This step takes us nearer State endowment and State industrialism than anything else with which we are acquainted. If it be right for the Government to endow this particular branch of industry in the interests of the nation, it can hardly be wrong for it to guarantee the financial position of any other business founded on similarly promising scientific basis. In any case the history of the rise and progress of the aniline dye industry has become extended into an object lesson of great value to all students of political economy, as well as to the large and increasing number of those who advocate the advantages of the State endowment of scientific research.

CURRENT TOPICS.

The War Office and Voluntary Hospitals in Ireland.

As unpleasant a crisis has arisen in the relations between the War Office and the several voluntary hospitals in Ireland in which wounded soldiers are being treated. At the beginning of the war the various hospitals were invited to undertake the treatment of wounded soldiers. They responded cordially, placing as many beds as possible at the disposal of the military authorities. The Government pays a rate per head per day for maintenance, and the treatment is supplied voluntarily and gratuitously by the visiting staffs. It is unnecessary to add that while this has thrown a considerable amount of work on the shoulders of the surgeons of the various hospitals, it has placed at the service of the wounded soldiers the highest surgical skill of the country. Unfortunately, the War Office has recently issued to the various hospitals a circular which, unless it be at once recalled, must put an end to the cooperation of the honorary staffs of the hospitals. We announced last week the appointment of two eminent Dublin surgeons as consulting surgeons for the troops in Ireland. We are sure that the cooperation of these gentlemen as consultants will be greatly welcomed by their surgical brethren. Unfortunately, however, the circular, which notifies the various hospitals of the appointment of Sir Charles Bell and Sir Thomas Myles, makes it clear that the duties sought to be imposed on these gentlemen are far beyond those ordinarily performed by a consultant. They are to visit all official and voluntary institutions where soldiers are being treated, "to ensure that the best possible surgical assistance is being afforded." They are to represent shortcomings, whether on the part of individuals or in matters of store or equipment. "In case of urgency they will take such steps as the occasion demands." They will operate themselves in cases in which they consider some course desirable, and will advise others engaged in operative work," and they are to exercise a general supervision over surgical work. We do not suppose for a moment that either of the consulting surgeons would exercise the powers given to them, but it is equally obvious that they are powers which cannot be tolerated by those who are sought to be subjected to them. The visiting surgeons of the various hospitals are tending the wounded voluntarily and gratuitously, and they cannot in their hospital work subject their responsibility to that of others, no matter how eminent. Even were they willing to do so, they have not, in most hospitals, the power to permit visitors to operate. Several hospitals have already notified the War Office of their inability to accept the terms of the circular. A difficulty also arises as to the staffing of the Red Cross Hospital about to be established in Dublin Castle. Like other voluntary institutions, it will be subject to the extraordinary powers of the consulting surgeons. Its staff is to be formed by surgeons and physicians of the several Dublin hospitals, nominated each by his own college. Some of the hospitals, while anxious to co-operate cordially in the work of the Castle Hospital, find themselves unable to answer the call. We trust that this matter will be speedily set right. The War Office could, after five minutes' consultation with its consulting surgeons, issue a letter which would abolish all cause of offence, and ensure the continuance of the patriotic assistance of the civil profession in the treatment of wounded soldiers. As matters stand, conditions are laid down to which no self-respecting independent surgeon can submit, and powers are conferred on two honourable members of the profession which they would never attempt to put into practice. It would be deplorable if, through mere blundering or misunderstanding, the wounded soldiers were to be debarred from receiving the best surgical treatment, given, as it is, freely and cordially.

Retirement of Lord Aberdeen.

The resignation by the Earl of Aberdeen of the Vicerealty of Ireland is of greater interest to the medical profession of Ireland than are most changes of the sort. During the nine years that Lord Aberdeen has held office, he and Lady Aberdeen have taken an extraordinarily active interest in all matters affecting the health of the country. Lady Aberdeen, through the medium of the Women's National Health Association, inaugurated a popular health campaign, first against tuberculosis, and, later, against the diseases of infants. This campaign is already bearing fruits in a diminished death-rate from tuberculosis. We have sometimes had to criticise some of the methods adopted by the Association, but we have always recognised its excellent intentions, and the indefatigable zeal of Lady Aberdeen. Not the least of the good effects of the direction of the interests of the Lord Lieutenant and Lady Aberdeen towards health matters was the stimulation to some extent of the conscience of the public departments of the Irish Government, whose duties have to do with the preservation of the health of the community.

The New "King George Hospital" at Waterloo.

The list of buildings, both public and private, originally designed for other than military purposes, that have been converted into temporary hospitals for the sick and wounded, continues to grow apace. Among the latest of these is the spacious edifice in Stamford Street, Waterloo, erected as the new Government Stationary Offices. In a short time, as soon as the necessary structural alterations and equipment are complete, the premises will be known as the "King George Hospital," and it will have accommodation for 1,650 beds. The following list of consultants for this, the latest and largest Red Cross institution, has been
Window Dressing.

The practice of medicine is generally dignified with the style and title of a profession. Usually the nomenclature is justified. It is true that, in some of our larger aggregates of buildings, where patients are multitudinous and fees microscopic, the professional element is in some danger of being swamped by the purely commercial. We have known for long that knowledge and skill are not the only qualifications for successful practice, and that the personal factor looms large as a contributor to the success or otherwise of the practitioner. For all that, we were unaware of the height to which the science of salesmanship has attained among us. We have seen a booklet issued to the profession which advertises a correspondence course on medical tactics and therapeutics. The latter part is not of present interest; most of us have learnt, at any rate, some therapeutics at one time or another. The “medical tactics” part is a godsend. It is full of courage. We are told that “The police may be set forth in the following propositions.—A. Skill.—This, divorced from the other factors, has little value. B. The Other Factors.—These if combined with a little of A, have considerable value.” This is the keynote—window dressing carried to a fine art, and a show made with or without material. The syllabus tells us we are to be instructed in such phrases as “Gratitude, how aroused. A golden rule.” “The sixteen impressions to be made in ordinary cases.” “A case where the doctor should show incredulity. The single case where it is judicious to laugh at a patient.” And many more like unto these. We wonder if such information is really valuable, if through studying the salesman side failure can be turned to success. We are afraid it can’t. We know men whose position is certainly not commensurate with their sterling qualities and undoubted skill, and we know men whose methods are sheer bluff. They are not in the majority. As a rule skill will out sooner or later, though it often takes years to live down a bad manner. For all that, we do not believe that any system of medical guilting the public will pay in the long run, and we are glad to think so. Skill, knowledge and honoured living will still carry a man farther than any such dubious methods.

The Working Hours of Medical Students.

“How many hours a day can a medical student work without injury to health?” is a question which can never be answered definitely, since the circumstances affecting mental capacity and environment vary so greatly in different cases. Some men can “grind” away at a text-book for hours at a stretch without feeling any the worse, whilst others are compelled to change their subject of study every hour. The influence of early training upon a man’s work at college or hospital is considerable, for many a student has cause to thank his former master or teacher for inculcating in him the habit of concentration, for instance, without which the best efforts are futile. British medical schools are more or less commensurate with their American colleagues, many of whom are compelled to support themselves during the curriculum by working in an office, upon a car, or at some trade. The Emeritus Dean of the Bennett Medical College, Chicago, Dr. William F. Waugh, has called attention in the Medical Record to the great load which the students bear at some of the training schools in the States. Thus, out of 443 students in one year about two-fifths are stated to have worked during term time to earn their expenses, in addition to attending college for an average of forty-four hours a week. Every member of a class of forty-eight men just up for their final examination was written to by Dr. Waugh last year requesting information respecting their own earnings during that that they had studied about eighteen hours a week, and given forty-two to some kind of independent productive work. More than half complained of strain; some took coffee and other stimulants, a few alcohol, and a smaller number were addicted to drugs. The man who is obliged to earn his living while attending the modern medical school must calculate his chances of success with great circumspection, and order his life as far as possible so as to preserve his physical and mental powers in the best condition.

Yellow Fever in British West Africa.

Though the specific germ of yellow fever has not yet been discovered there is some reason to suppose that it is due to an ultramicroscopic virus which is capable of transmission by the Stegomyia fasciata. The Yellow Fever Commission (West Africa), appointed some time ago to investigate the prevalence of yellow fever in British West Africa, has recently issued its first and second reports.

At Lagos an interesting research has been in progress upon the relationship of the so-called “Seедин bodies” to the virus of yellow fever, and it is hoped that a further report upon this investigation will be published at a later date. Among the conclusions already arrived at by the Commission, it is asserted that there is no evidence to show that the infection in each outbreak of fever has been introduced from outside Africa. The mild character of the attack in some cases of yellow fever adds greatly to the difficulty of the identification of the disease, and this clinical feature is met with, of course, in many other acute infections. It is hoped that workers upon the subject will endeavour to concentrate their attention upon the possibility of discovering some clinical test for the presence of yellow fever that would give as useful results as, say, the Wassermann test. The Commission is further of the opinion that the only hope of eradicating the disease is by boldly facing the facts and not by attempting to conceal its presence in a local duty. Meanwhile the West African Medical Staff and of those members of the expedition from the Liverpool School of Tropical Medicine to British territory in the continent of West Africa may be commended to those who have the physical welfare of our colonies at heart.
Science the Iconoclast.

The world goes round and we progress. This is an age of progress—we are always told so and we must believe it, or our life would be made unbearable. We can seek refuge ourselves and satisfaction for such consciences as remain to us in the fact, that progress in its ubiquitous sense has never been defined. It probably means going away from a point in order that we may triumphantly return to it at a later date. Anyway, we have a change. We shatter brazen idols and uncover their clayey feet, and then try and amalgamate the brass and silica into a less characteristic image of a handsomer shape. The taboos of to-day are the declamation of the day after to-morrow. We used to avoid colts by wonderful respirators and the superimposition of many wraps. Now we indulge in such fresh air as the inspector of nuisances allows us, and wear the minimum of clothes permitted by the police. This, too, to avoid rheums and fluxes. Calomel used to stir up the liver to further efforts and promote the flow of bile.

Today's physiologists tell us that, whatever it is, it is not a cholagogue. We shudder and nauseate ourselves by reading about the mixtures of oil and excreta contained in early prescriptions, and we inject very similar substances into our defenceless patients to-day as the very latest treatment. The fashion changes even faster. We have heard many a time and oft that water with meals was anathema—it diluted the digestive juices and was a general hindrance. This seed fell upon good ground, till now many men claim that the internal use of the fluid should be prohibited unless on medical prescription. Now we hear that it is harmless or actually beneficial. Instead of an inert demulcent water is a gastric stimulant, and may be drunk almost with impunity. The ways of science are very wonderful. Discovery succeeds discovery, and we go round and round till we are dizzy for the sake of progress. When will it stop?

The Debt of Science to Edison.

The news of the destruction by fire of Mr. Thos. Edison's famous works at West Orange, New Jersey, will be received with grief and dismay by the world of industry and invention. Fortunately the inventor's private laboratory was saved, but the total damage is estimated at one million pounds. With cheery optimism Mr. Edison has declared his intention of rebuilding the works immediately. In these days of universal electric light and telephones it is difficult sometimes to realise that these adaptations of science to everybody's life owe their existence to one man, the inventions of whose fertile brain would occupy many columns of this journal. Edison's work in connection with electrical, photographic, and acoustic apparatus, besides having benefited countless thousands of the human race, has proved a priceless boon to the medical profession. Of the value of his electric submarine torpedo boat there is now abundant evidence. The phonograph and the cinematograph have proved themselves to be of real service in the teaching of practical medicine. It may not be generally known that tetrethyl ammonium hydrosulphate, once in vogue as a solvent for uric acid, was introduced into therapeutics as the result of a chemical experiment by the great inventor. The huge laboratory at Orange was a veritable hive of scientific industry and organisation. Able to command sleep at will, and to work for long periods without any pause or sustenance, Mr. Edison is a marvel of energy and a living test-
THE SYPHILITIC MOTHER.

Some of the old-established and accepted views regarding the presence or absence of maternal syphilis have to be reconsidered in the light of recent evidence afforded by Wassermann's reaction, and we must admit that there is at present a good deal of difference of opinion. It used to be considered that if the father was suffering from syphilis, the mother might not herself be infected, although she might give birth to syphilitic children, and that, according to Colles' Law, such a mother could suckle her own infant without being infected by it, although any other non-syphilitic woman who suckled the child would be likely to become infected. The more modern view is that without maternal syphilis there is no foetal syphilis; in other words, that every mother who gives birth to a syphilitic child is herself infected. A woman may live for years with a syphilitic man without showing any signs of syphilis until she becomes pregnant. If a woman is impregnated by a man who has had syphilis, but who has no local infective lesions when impregnation takes place, she may show no signs of syphilis herself, but may produce a syphilitic infant and may herself give a positive Wassermann reaction. This last fact may be taken as proof that she is suffering from latent syphilis, but Whitridge Williams suggests that the positive reaction may be due to the transmission of antibodies through the placenta, and not necessarily to the presence of living spirochetes in the mother. "Conceputal syphilis" and "choc de retour" are terms used to imply that a woman who has shown no signs of primary syphilis has become infected by the fetus in utero. McDonagh discovered an acidophilic parasitic spore which may account for the occurrence of what is called "conceptional syphilis." The spirochete itself is too large to be carried in a spermatozoon, although it might be carried in the seminal fluid, but it is possible that some of these spores might be so carried and infect the ovum without infecting the mother. It is at present impossible to say whether our ideas about Colles' Law must undergo modification or not. Knüppelmacher and Lehndorff (quoted by Dr. Beckwith Whitehouse) have found that 90 per cent of mothers of syphilitic children give a positive Wassermann reaction a few months after parturition. However, C. F. Marshall holds that transmission of syphilis from the father to the child is possible without the mother suffering from the disease, and lays stress on the absence of secondary symptoms in the mother of a syphilitic child. He argues that a woman may bear a syphilitic child to a syphilitic father, and that her later children born to a second, non-syphilitic husband are not syphilitic, and that after a series of syphilitic children a healthy child may be born when the father alone has had treatment by mercury. In our, what is known as alternating transmission, i.e., the birth of healthy children preceded and followed by syphilitic children of the same parentage has long been recognised. It has been said that if a woman is infected during the later months of pregnancy the child will escape, but the late Sir Jonathan Hutchinson recorded cases in which the mother was infected during the last few weeks and yet the child also was infected. If the mother has latent syphilis she may bear healthy and syphilitic children alternately; of twins one may be infected while the other escapes. It is important to remember that the fact that a child born of syphilitic parents does not show signs of syphilis during the first few years of life cannot be taken as proof that it has not been infected, for such children sometimes break down at puberty or even later with general paralysis or some other form of syphilitic lesion.

Local manifestations may be more severe in a pregnant than in a non-pregnant woman because of the high spasm of the genitals and the surrounding tissues. The constitutional disease is often, if not usually, mild, and secondary lesions may not be much marked except on the vulva, vagina, pubes, and inner side of the thighs. In these situations there may be large elevated areas which occasionally undergo ulceration, and there may be abscess formation and extensive sloughing.

It has been considered that if infection and conception occur at approximately the same time abortion usually results, but recently acquired evidence throws doubt on this.

If treatment be begun early enough, and with sufficient energy, in a syphilitic woman who is pregnant it is probable that the child may escape infection. It seems that if the pregnant woman is treated by salvarsan followed by mercury, there is more likelihood of the child escaping the infection than if the woman is treated by mercury alone. McDonagh says that if salvarsan be given before secondary symptoms appear in a woman infected during pregnancy, the child escapes infection. Salvarsan injected into a mother who has just produced a syphilitic child does not seem to have any permanent beneficial effect on the child through the medium of the milk. One case was reported, by Taeg, in which it was believed that the administration of salvarsan to a nursing mother had been successful in curing the child. Asheim reports a case in which administration of salvarsan to the mother, who gave a positive Wassermann reaction, was quickly followed by a disappearance of the skin lesions in the child. As in Taeg's case, there was no arsenic in the mother's milk, and the benefit was attributed to the transmission of antitoxins. About six weeks afterwards, however, the skin lesions reappeared as badly as ever and the child's health became
seriously impaired. Ascheim records this case as a warning against the possibility of being deceived by the temporary improvement in the state of the child.

Occurrence of repeated miscarriages or the birth of stillborn children without other obvious cause should always arouse suspicion that syphilis is present. Without Wassermann's reaction it is extremely difficult to get proof that syphilis was the cause of miscarriages or still-births. Most women, at any rate among the poorer classes, say that they have had a bad sore throat and an intermittent fever before they lose a great deal of their hair, and in the absence of a history of a secondary eruption the information received in answer to questions is, as a rule, valueless. Both husband and wife, if Wassermann's reaction is positive, must be given a thorough course of treatment, of salvarsan and mercury, or of mercury alone. Formerly it was sometimes the custom to treat the father only, as the mother showed no sign of syphilis, but there is no doubt, whatever the treatment administered, whether either cause was true or not, whether the mother may be infected by the fcetus through the placenta, or the fcetus infected by the mother through the placenta. It is essential to give antisyphilitic treatment to every woman who has given birth to a syphilitic child. To be on the safe side it is well to give the wife mercury during her next pregnancy. Personally, I should give her mercury in a subsequent pregnancy even if the first child born after the thorough course of treatment proved to be healthy. Some authorities advise iron and chlorate of potash rather than mercury if she becomes pregnant after an efficient course of anti-syphilitic treatment, but personally I prefer to give iron and mercury, reserving chlorate of potash for cases of unexplained death of the fcetus in utero. Pinard insists on the importance of "retreatment" during a subsequent pregnancy of a woman who has been thoroughly treated before. He quotes a case of a syphilitic woman treated for eight years, who bore six healthy children and yet produced a seventh child presenting all the lesions of syphilis and dying two months after birth. The theory that the virus of syphilis wears out gradually must go—we must do our best to leave no spirocheta lurking in a hidden lair. Pinard's advice is that both husband and wife should be "retreated" before they are advised to allow another pregnancy to occur, and the wife must be treated throughout every pregnancy.

It is possible that some cases of chronic metritis, with fibrosis and periarteritis and endarteritis, resulting among healthy syphilitic organes, are due to syphilis, as has been suggested recently by Dr. Louise McLlroy and Dr. Beekwith Whitehouse. The latter found that six out of fifteen cases of chronic metritis or fibrosis uteri in patients with no definite history of syphilis gave a positive Wassermann reaction. It cannot at present be taken as proved that these changes in the uterine wall are due to syphilis—if they are they may be the cause of some of the abortions which are so common in syphilitic women.

Some results of routine examination by Wasserman's reaction are rather startling. Miss Louise McLlroy took 100 out-patients suffering from various gynaecological troubles, obvious cases of syphilis being excluded, and found that no less than 55 out of the 100 showed a positive Wassermann reaction.

I am indebted to a lecture on Ante-natal Hygiene, by Dr. Amand Ronth, published in the British Medical Journal, February 14th, 1914, for some of the information which I have quoted above.

The Syphilitic Fcetus.

If the mother is infected with syphilis at the time that conception occurs—i.e., if infection and conception occur at the same time, abortion usually results. At least, this view has been held generally. Abortion is common at three months, and also in later months. If it occurs at five months or later the fcetus is often macerated, with the skin peeling off. If syphilis affects the fcetus it almost invariably cause death, for it is extremely rare for an infant to be born alive showing signs of syphilis at birth. The fact that a stillborn fcetus is peeling is not of itself proof of syphilis, for maceration and peeling may occur in a fcetus which has died in utero from any cause and has been retained for several days or longer before being expelled. However, Tissier found evidence of the presence of syphilis in 99 out of 155 macerated fceti, and Boissard and Tissier found that 95 per cent. of all macerated fceti were syphilitic. There is no evidence as to any difference in the effect of syphilis on the fcetus or infant whether infection is due to syphilis in the father, in the mother before conception, or acquired by the mother after conception, though it is said that virulent congenital syphilis showing itself in the early weeks of life is more often due to maternal than to paternal syphilis. At whatever period of pregnancy a woman acquires syphilis, if only time be allowed for the development of the disease, there is a great probability that it will pass from her to the fcetus. In some cases when a succession of children suffers the youngest may suffer as severely as the eldest, but in the majority of cases the danger of the infection of the fcetus diminishes with the progress of years. What is known as "intermittent transmission" may occur—i.e., there may be one or more children, scattered throughout a family, who remain healthy, having escaped infection. In some families though other members show evidence of congenital syphilis, early or late. As a rule, if the parents are suffering from tertiary syphilis there is no transmission, but sometimes the mother may transmit syphilis to her offspring when she is suffering only from tertiary syphilis. It is said that the child may be infected during birth. Nearly 50 per cent. of syphilitic fceti are stillborn. Of syphilitic children born alive 75 per cent. die within the first year, most of them during the first few weeks of life, an appalling waste of human life due to a preventable cause. The child may very rarely if ever be born alive showing well-marked syphilitic lesions, puny, ill-nourished, with a shrivelled appearance, blue extremities, and a hoarse feeble cry, but it is much more common for the fcetus which is not stillborn to continue healthy during intrauterine life, and to be born with a clear skin and apparently in perfect health. If born apparently healthy, it will probably show signs of congenital syphilis between the first and twelfth weeks of life. Peeling patches on the palms and soles may be seen during very early
infancy, and occasionally syphilitic pemphigus may come on within a day or two of birth. If the eruption is severe the child will probably die. The changes that take place within the first few weeks of life in a syphilitic child, who appeared to be healthy at birth, are that it withers, the skin becomes thin and translucent, becomes on a dull, earthy colour, and there is marked anaemia. The face assumes a care-worn, weary expression, so that the child is described as looking like a "little old man." It sometimes has very much the appearance of a dispirited monkey. Pemphigus, smittles, cracks at the angles of the mouth which may be of sufficient severity to prevent the infant sucking, condylomata round the anus, a copper-coloured rash on the buttocks and back, and jaundice may be noticed. The general health suffers much more than is usual in acquired syphilis, and death not uncommonly results. It is a noteworthy fact, if it be true that infection occurs during birth from rubbing of the child's skin against the mother's passages, that primary lesions are very rare in cases of congenital syphilis.

Finger collected in all six cases in which the mothers showed at the time of confinement eruptions and condylomata on the genital organs, and the children developed, after the usual interval, primary lesions with enlargement of glands, and later on secondary rashes, Haslund reported a case in which an infant who had been delivered by forceps showed at the age of five weeks seven indurated ulcers on the face, with hard swelling in the neighbouring lymphatic glands. Spirochætes were found in the secretion from the ulcers. The child showed at that time no other symptoms of syphilis except that there was some coriza. Later there was a bilateral suppurative otitis and a slight rash on the back. The mother had a syphilitic rash and a mucous plaque on one labium. Before her confinement she had had no signs of syphilis except headache and loss of hair, the skin lesions appearing after the confinement. Haslund suggests that in this case the skin of the face was damaged by the blades of the forceps, affording a raw surface suitable for infection.

A "law" of which not much is heard now was the "law of Profecta," which held that syphilitic parents communicate to their children who are apparently healthy, an immunity which renders them for some time at least inaccessible to infection by syphilis. Is not this another way of saying that cases of congenital syphilis are not always virulent and well marked by symptoms in early life, but may be latent for some years?

One is tempted to adopt the belief that if a fetus is affected by syphilis during intrauterine life it is born dead, and that cases of "congenital syphilis" are really cases of infection at birth. An argument against this theory, as I said before, is the fact that primary lesions are so rarely found in infants unless they are due to quite unusual methods of infection after birth, but it must be remembered that there are a very great many syphilitic women in whom no primary lesions must be suspected.

The modern treatment of congenital syphilis is by injection of salvarsan followed by administration of mercury for two years. Some writers advise that salvarsan should not be used in the treatment of infants because its effect may mask symptoms to such an extent that there is a danger that mercurial treatment may be more or less neglected, with disastrous results later on.

The lesions that may be found in stillborn syphilitic foetuses are to be looked for in the thymus, which may be much enlarged and contain abscesses; in the lungs, where the condition known as white hepatisation may be seen; in the liver, pancreas, and spleen, where great enlargement may occur, due to interstitial deposit of cellular or fibrous tissue and gummata in the form of granules or small patches. Pylephlebitis also may occur. At the ends of the long bones there is a broad zone of ossification between the diaphyses and epiphyses with very irregular proliferations. Among the bony tissue are islets of cartilage, and in the cartilage are islets of bone. The spirochætes may be found in the organs mentioned above, and in the adrenals. Weber found spirochæte in 84 per cent. of macerated foetuses born in the later months of pregnancy.

I will not enter any more fully into these and other changes in the syphilitic infant or the treatment of congenital syphilis as these matters are being dealt with by Dr. Robert Hutchinson.

The Syphilitic Placenta.

Almost every departure from the normal that can occur in the placenta has been attributed to syphilis, but recently Wassermann's reaction and the discovery of the spirochæte pallida have made our knowledge about syphilitic changes in the placenta more certain and more accurate. Hydramnios, the pathology of which is obscure, has been said to be caused by syphilis, but I am not aware of any evidence on which this statement is based.

Microscopic Appearance.—The syphilitic placenta is larger and heavier than normal, solid to the feel, with over-growth of the cotyledons and deep grooves between them. It is pale, often oedematous, dull and greasy in appearance if the fetus is dead, frable and with a sort of sausage-meat appearance on section. Edema cannot be looked upon as being characteristic of syphilis alone. Its weight, instead of being about one-sixth of the weight, or a quarter or even more than a quarter of the weight of the fetus. With a large healthy child there is a correspondingly large placenta, and increase in the weight of the placenta is not by itself evidence of syphilis, but relative increase of weight, not due to edema or to the presence of cysts or other tumours of the placenta, is to be looked on as being suggestive of syphilis; so much so that in Pinard's wards if the placenta is relatively heavy the child is allowed to be suckled only by its own mother. In abortions or premature births the weight of the placenta may be equal to or even greater than the weight of the fetus.

Microscopically, there are no lesions, except perhaps the presence of gummata, that are specifically caused by syphilis alone. White infarcts are of no special importance, as they may often be found in non-syphilitic placenta. There are vascular changes, changes in the stroma of the villi, in the villous epithelium, and in the maternal part of the placenta. There is a decrease in the number of vessels, due partly to the presence of endarteritis obliterans which is always found in the ripe placenta, and partly to periarteritis, and partly to increase in the number of the stroma cells of the villi. In the interior of the villi are found numbers of round and spindle cells which
compress and partly obliterate the vessels. The whole villus becomes swollen by this increase of the number of stroma cells, and there is also a proliferation of the villous epithelium itself. In the decidual part of the placenta is seen what is called gummatous endometritis, forming microscopic gummata, nodules of connective tissue. The statement made by Praenkel that the lesions in the placenta vary in position, according as the syphilis is due to the father or to the mother is not borne out by other observers.

The umbilical cord is thick, and there is a marked hypertrophy of the connective tissue in the thickened walls of the vein.

Spirochete may be found in the placenta when the uterus exhibits definite syphilitic lesions, but it is difficult to find them in the placenta in cases where they cannot be found in the fetal organs. They are found in the intervillous spaces, in the intercellular villi, and sometimes in the villous epithelium.

NOTE.—A Clinical Lecture by a well-known teacher appears in each number of this Journal. The lecture for next week will be by Sir G. H. Savage, M.D., F.R.C.P. Lond., Consulting Physician to Guy's Hospital: Examiner in Mental Pathology, University of London. Subject: "Insanity as a Cause and as a Symptom of Insanity."

ORIGINAL PAPERS.

THE CURE OF SQUINT. (a)

By N. BISHOP HARMAN, M.B.CANTAB., F.R.C.S.Eng.

Senior Ophthalmic Surgeon to the West London Hospital; Ophthalmic Surgeon to the Belgrave Hospital for Children.

SQUINT was the loss of the finest function of the human eyes—binocular vision. Confining his attention to fixed squints in children, he said that in a school of 1,000 children no less than 18 were squinters, and that girls were nearly twice as much affected as boys. In 1,900 children seen at a children's clinic on account of poor vision 199 were squinters; the incidence in these cases was from 100% in the years 4 and 5, to 5 in the 14th year. Of these 199 cases 166 were fixed convergent squints, 16 alternating convergent, 8 divergent, the rest were associated with disease of the eyes.

After quoting from ancient authors to show that squint was held to have an evil moral significance, he proceeded to trace the evolution of the binocular vision, and the profound effect it had on the form and function of the eye; that the upright position and "his fair large front" were directly associated with the evolution of vision. The effect on the brain was similar, for the area of visual cortex was incomparably greater in the hunting animals than in the hunted, and greater of all, in man. The control of the eyes he likened to that of the driver of a four-in-hand.

A good driver would master a poor team, but the best team was defective without a driver. So the balance of the eyes was maintained by the fusion faculty of the brain; if that were poor, then squint would ensue even though the eyes were good. Defects of the eyes were adjudged factors. In not a few cases there was a strongly hereditary tendency to squint. Treatment could be put into three grades:—(1) Balancing the vision of the eyes: First there must be correction of any error of refraction by retinoscopy; next exercise of the vision of the squinting eye. (2) The awakening of the fusion faculty; this had been first attempted by Erasmus Darwin in 1778, and the modern practice was to ascertain the power of the brain to resume control under favourable conditions. (3) Operation. The rationale of this step lay in the fact that squint of any duration was associated with changes in the tendons, and that these acted as insuperable obstacles to the resumption of brain control. In convergent squint the internus tendon was shortened and thickened the externus thinned and lengthened. If a true cure was to be effected—i.e., the restoration of binocular vision; then, if stages 1 and 2 of the treatment failed to effect a speedy cure, operation should be done before time had stereotyped the vicious effects of the squint. If that time had passed, then we were no more than beauty doctors intent on removing an ugly cast. The advocate of early and regular operation must be prepared to present an operative procedure which was both expeditious and reliable. And in this connection Mr. Harman showed photographs of the steps of his combined operation for lengthening the contractured tendon and shortening the stretched tendon. He maintained that effects could only be secure when both the affected tendons were adjusted; indeed, it was the only method whereby the full mobility of the eye could be secured without subsequent deformity.

His operation for shortening a tendon "Subconjunctival Reeling and Advancement" is performed as follows: The tendon is not cut or exposed to view. The upper and lower edges are cleared by two buttonholes cut through the conjunctiva and capsule. The tendon is freshened by a rasp. Special forceps of simple design are then passed into the buttonholes to secure the tendon. The movement of the forceps folds the tendon. The reef is sewn up or advanced as the case indicates, and then the antagonist is lengthened by a graduated partial tenotomy.

The steps of the reefing advancement are as follows: (1) The eye is secured with an anchor stitch placed at the limbus in the axis of the tendon to be shortened; (2) the position of the tendon is noted, it is pointed out that there are well-defined surface markings and colour differences; (3) the buttonholes are cut above and below the tendon close to the canthus; (4) the tendon is litted and both surfaces rasped with the instrument provided; (5) reefing forceps are applied, adjusted to the extent of the shortening required, and rotated; (6) the reef is sewn up by a double over and over stitch; and (7) the reef is advanced by lishing the stitches into the limbus.

Then the antagonist was lengthened by the "jigsaw" operation. The tendon is exposed, secured in "director-forceps" which checked bleeding and gave a guide to the incisions. Three cuts were made athwart the tendon, the middle extending two-thirds from one edge, the lateral each one-half across from the other edge. The tendon thereon extends lengthwise without loosing its attachments or alignment. The author showed how the cuts can be varied to secure vertical deviation also.

Results: Of the first 100 serial cases, including

(a) Abstract of paper read before the West London Medico-Chirurgical Society, Friday, December 4th, 1914
the early experimental operations, the results obtained after the average interval of nine months were: Binocular vision, 4; straight, 36; error less than 3 degrees 22, less than 5 degrees 23 (these make 85 per cent. successes); error 10 degrees (since corrected) 9; over that 4; relapsed six months after operation during severe keratitis 1, and over-correction found six months after operation 1. He had now almost completed the second hundred cases, and the percentages of success were still higher.

One of the advantages of this combined operation was the power for nice regulation of effects. This was of the utmost importance when operation had to be done early to save the binocular vision, for at an early age a general anaesthetic was commonly needed, and the operator was entirely dependent on his own judgment and technique.

**TWO CASES OF HYSTERECTOMY FOR ANTE-PARTUM HæMORRHAGE.** (a)

By THOS. GEO. STEVENS, M.D.Lond., F.R.C.G.Eng.

Obstetric Surgeon to St. Mary's Hospital, Gynaecologist to the Hospital for Women, Solo, Physician to In-Patients, Queen Charlotte's Lying-in Hospital, London.

The first case was one of central placenta praevia in a patient, aged 37, 28 weeks advanced in her twelfth pregnancy. She was admitted to Queen Charlotte's Hospital at 1 a.m., having had a severe blood loss the evening before. The os uteri was found to admit two fingers, and the whole lower uterine section was covered by placenta as far as the finger could reach. A Champerier de Riba's bag was introduced above the placenta, considerable haemorrhage occurring during the procedure. Subcutaneous saline and morphia 1 gr. were given owing to the patient showing signs of collapse. Seven hours later the bag was expelled, the uterus was in a state of tonic contraction, and the cervix had closed up after allowing the bag to pass. No further haemorrhage occurred. At this point, Mr. Stevens saw the patient, and after debating the question as to the best method of delivering her, so as to avoid further blood loss, came to the conclusion that hystereotomy without operation would offer the best solution of the difficulty. As the child was already dead, this operation was performed under morphia-atropine open ether anaesthesia, with infiltration of the abdominal wall by urea-quinine hydrochloride. Four pints of saline solution were infused under the breasts during the operation. The operation proved to be a very easy one, and under the method of anaesthesia chosen was practically shockless. The patient made an uninterrupted recovery.

The second case was one of external and concealed accidental haemorrhage in a patient, aged 33, about 30 weeks advanced in her ninth pregnancy. She was admitted to Queen Charlotte's Hospital at 4 a.m. with the history of a big haemorrhage at 10 p.m. the previous night. There was no haemorrhage on admission, the pulse was 112-120, the patient looked very anemic, and no placenta could be felt in the lower uterine segment. The patient was kept quiet in bed, and twelve hours after admission bleeding recommenced. An attempt to introduce a de Riba's bag failed owing to the rigidly closed internal os. Pituitary extract, &c., and a little later morphia, $ gr., and 4 pints of saline were given subcutaneously, after which the external bleeding ceased. The patient, however, had a pulse of 150, and an examination of the uterus resulted in a provisional diagnosis of concealed haemorrhage. Seeing that the child was dead, the internal os uteri closed, and the patient in a very serious condition, Mr. Stevens decided that hystereotomy without opening the uterus offered the best chance of saving the patient's life. This was done under morphia-atropine-open ether anaesthesia, with novocaine infiltration of the abdominal wall. Again the operation was very easy, and proved to be shockless—the pulse falling from 150 to 134 at the end of the operation. The patient made a good recovery.

The reason for the choice of hystereotomy rather than Casarean section in these two desperate cases was the impossibility of any guarantee that the latter operation could be done without further considerable blood loss. Both these patients had lost so much that a further loss of a pint would have almost certainly proved fatal. Further, at the time that Mr. Stevens saw the patients there was no possibility of delivery per vias naturales without a considerable loss. The actual amount of blood lost during the operation in each case did not amount to three ounces, and under the method of anaesthesia chosen the operation was shockless.

**SOME OF THE ABSURDITIES OF THE BRITISH PHARMACOPEIA, 1914.**

By J. C. McWALTER, M.A., M.D.,

Governor of the Apothecaries Hall of Ireland.

The major absurdities of the new Pharmacopoeia have been already alluded to—the wicked and dangerous stupidity whereby strophanthus is made four times as strong, nux vomica half-strength, the tincture of opium stronger, and that of digitalis weaker. A few more of the more obvious absurdities may also be noted, thus:—

**Actinom Stocke** is suddenly doubled in strength.

Recent researches have shown that squill is a potent cardiac poison, which should not suddenly be increased in strength.

**Dilute Acids**—sulphuric, nitric, hydrochloric—were formerly diluted so as to be of equal strength. Now they must be made 10 per cent. by weight, which means that each one is of different strength, and it would take a mathematical genius to calculate how much sulphuric is equivalent to an equal bulk of nitric or hydrochloric acid.

**Collodium Vesicans** is naturally of two olive green colour, but the compilers of the new "B.P." seem to think it is to be used as a face paint instead of a blister, and accordingly they colour it with cochineal.

**Emplastrum Belladonna.**—The present plaster is really potent. The new is cut down to half-strength.

**Extractum Hyoscyanii.**—This is suddenly increased 300 per cent. in strength.

**Ferri Carbonas Suctharatus.**—Glucose is now added to this preparation—a fact which must be borne in mind when testing urine.

**Injunctio Morphiæ Hypodermica.**—is now reduced to half-strength—for some incomprehensible reason. This means you cannot give half-a-grain of morphine unless you fill your 10 minims hypo-
dermic syringe twice. Likewise, cocaine injection is half-strength—merely to make confusion more confounded.

Liquor Potassae is reduced about 20 per cent. in strength. This is annoying for those who are in the habit of using a certain quantity in copaiba mixtures.

Spiritus Etheris Nitrosi.—Hundreds of pharmacists having been prosecuted for selling spirit of nitro with only 1.52 per cent. of ethyl nitrite; the "B.P." now declares such to be the official standard.

Spiritus Juniperi.—All good kidney patients are cranks, and bitterly resent any alteration in their favourite mixture. To accomplish the maximum annoyance to them, the "B.P." now ordains that spirit of juniper shall be twice as strong as heretofore.

Syrius Ferri Iodidi.—The favourite fad of the compilers of the 1914 "B.P." is to stick glucose into every iron preparation, thinking it will prevent oxidation. Thus it is added to this syrup, which is also reduced 30 per cent. in strength.

Tabella Trinitrina.—Everybody knows that if you want effects you must give 1-50th instead of 1-100th grain of glycerine in a tablet. Hence to put them far beyond the possibility of usefulness the new "B.P." reduces the strength to 1-130th grain.

Tinctura Aconiti.—In our earlier days we used to regard aconite with that dread, mixed with awe, which we are told is the proper attitude towards the Decalogue. Lately we have been horridly trained, on high pharmacological authority, that much of the tincture of aconite of commerce is inert. Anyhow, it is suddenly made double strength in the new "B.P."

Tinctura Colchici.—Practitioners will wonder why their colchicinum prescription can no longer relieve gout. The explanation is that the strength of the tincture is furtively pulled down by 50 per cent. Hence the former doses will be useless.

Trochiscus Acidici Carbolici.—It having been demonstrated that 1 grain of carbolic acid in a lozenge is too weak to be of much service, the "B.P." 1914 orders that only 1/2 grain be used for the future.

Trochiscus Acidici Tannici.—In order to bring about the maximum discomfort and annoyance amongst those who prescribe or use medicated lozenges, tannin lozenges, ordered to be made with tolu basis in the "B.P." 1867, and changed in the "B.P." 1898 to fruit basis, are now to be jugged back to tolu basis; whilst catechu lozenge is juggled from simple to fruit basis, and ipecacuanha to simple from fruit basis.

Unguentum Hydargyri Ammoniaci.—The last thing on earth you want, when your order white precipitate ointment, is to have it absorbed. You use it for a local gericidal action. Lard being, therefore, the most unsuitable possible basis on account of its absorbable qualities, the "B.P." 1914 orders it to be used instead of the present far more suitable paraffin.

Unguentum Iodoformi.—In like manner, you use iodoform for its local action. Nothing is more objectionable than to have it absorbed, hence the compilers of the "B.P." direct it to be made with highly absorbable lard, instead of paraffin, and vaseline.

Tinctura Iodi Mitis.—Never was there such a vogue for tincture of iodine as nowadays, and, of course, the editors of the "Pharmacopoeia" could not resist the temptation to give the practitioner something amiss. Every annoyance only the better.

If you want to prescribe common, ordinary tincture of iodine, the pundits of the "Pharmacopoeia" insist that you must describe it as "tinctura iodii miliis.

THE

USE AND ABUSE OF THE TONSILS. (a)

BY JULIUS H. COMROE, A.M., M.D.

Physician to the York Hospital, York, Pa.

It is with no small degree of tremulous fear and daring courage that I stand before so critical and representative an audience in an attempt to defend a helpless organ, whose guilt has been so uniformly acknowledged—an organ which has been accused of being an accessory to the fact in causing so many and varied pathologic conditions, of more or less serious nature, and which has, through professional and lay expressions, and even through the public press, been condemned without a full and impartial hearing. A sparkling hope that the innocent may be prevented from suffering with or for the guilty, that in the future, many tonsils may be rescued from unnecessary and undeserved slaughter, makes me feel privileged to present these relevant facts, which, alone, make true science. This hope is augmented by the successful escape from a somewhat similar series of indiscriminate massacres of the ovary, the appendix, the inferior turbinate, etc.

There is not a fraction of a doubt that the removal of the tonsils is oft times indicated, and that innumerable good and commendable results have been accomplished by such surgical treatment. It is not, therefore, my object to attempt either to condemn or to revolutionise modern tonsil surgery in general, or to ridicule the professional attitude toward such procedure, but rather to endeavour to crystallise the views of both radical and conservative internists into such a form as will aid each of us in solving this complex problem. Probably no other instance exists in which so many human lives are involved by such a solution. In 1912, there were in Philadelphia 37,000 recommendations to parents made by medical inspectors that these organs receive immediate attention, constituting about 26 per cent. of the recommendations for all defects in that period. In New York City, during the same year, medical inspectors had supervision of 825,000 school children, and reported that approximately 30 per cent. of the children examined had hypertrophied tonsils. As it was the desire of the department to fix a certain standard as to when operation should be recommended, a letter was sent to a number of eminent specialists in nose and throat diseases asking them what, in their opinions, were the exact indications for the operative treatment of enlarged tonsils, and it is a very significant fact that no two of these specialists agreed as to the exact details. The question therefore involves the disposition of the tonsils in millions of children throughout the United States, and should be

(a) Read before the Section on Diseases of Children at the Sixty-Fifth Annual Session of the American Medical Association, Atlantic City, N.J., June, 1914, and published in the Journal of the American Medical Association, October 17th, 1914.
sufficiently vital to demand most exacting con-
sideration. 

PROTECTIVE FUNCTIONS.

It is a universally accepted scientific fact that
every organ is of essential value and service to
the organism which contains it, and the organ
under discussion has not yet been proved to be
valueless. The faucial tonsil is a natural organ;
some questions pertaining to its physiology
have been definitely settled; judgment on others
is so uniform as almost to force conviction, and
some remain yet to be solved. From their im-
portant position, the ensemble of adenoid bodies—most commonly known as the
Waldeyer ring—situated at the very entrance
of the respiratory and digestive passages, would
be looked on as constituting the first line of
defence against microbial invasion, and of this
group, the tonsils stand out most prominently.
Primarily, it is the function of all lymphatic
glands to act as a sort of filter for lymph. Thus,
should the lymph contain any foreign substances
or toxic material, these tend to be halted within
the gland, not because of the anatomic peculiarities of the structure, but also on account
of the cellular hyperplasia resulting from
irritation. This so-called barrier action is a most
important one and the tonsils are arranged like
sentinels to guard the most vital orifices of the
human organism—a function that has been most
clearly demonstrated by Bizzozero, Ruffer, Rib-
bert and others. Particles of dust, cells from
malignant tumours, dead or disintegrating cells,
red blood-corpuscles, bacteria, etc., which, in
any manner, get into the lymph-vessels, are
harassingly carried along until a lymph-node is
reached, where they are, in part at least, deposited
among the trabeculae of the sinuses, or are
taken up by the phagocytic cells, while the
filtered lymph passes on and out of the efferent
vessels.

This most important physiological function has
been attributed to the tonsils by Delafeld,
Fruden and many others. Stöhr has demon-
strated that the tonsils are actually traversed by
an enormous number of leucocytes, which exercise a kind of migration toward the oral
cavity; actually demonstrating the passage of
leucocytes through the tonsillar epithelium into
the buccal cavity, which is a medium for various
micro-organisms. This continual and normal
condition is often termed Stöhr's phenomenon.
Likewise, Metchnikoff found that when he removed
a particle of mucus from the surface of the
tonsils of a person in good health, he always
could demonstrate that it contained numerous
leucocytes, especially small phagocytes, filled
with micro-organisms, of all kinds. Golland,
Kimmel and Lindt have also demonstrated the
presence of these leucocytes. Philip Stöhr
states that the leucocytes that wander through
the epithelium of the tonsils are so numerous
that they may be regarded as the most fertile
source of the salivary corpuscles. Von Chiari
agrees in this opinion and thinks that the tonsils
serve for the purpose of the formation of leuco-
cytes. Adamit and Nicholls, as a result of careful
investigations, concluded that while the tonsils
are themselves, to a limited degree, phagocytes;
through their lymphoid cells, polymorphonuclear
leucocytes in considerable numbers make their
way from the blood-vessels to the surface of the
tonsils, through their epithelial lining. These
leucocytes are strongly phagocytic and their marked activity suggests that the tonsils form
one of the most powerful barriers of the body against
invasion by infectious micro-organisms.

Brieger has proved that the lymphocytes in
the tonsils, though devoid of amoeboid move-
ment, enter the epithelium of their own accord,
and he has demonstrated their presence in lesser
or greater degree in the epithelium of the tonsils.
We have to assume a vehicle which carries the
lymphocytes from the adenoid tissues; this vehicle
is the lymphatic juice which fills all the crevices
between the tissue, and which reaches the surface
through the finest capillaries. The most certain
movement of the lymphatic current, according to
Brieger and Goerce, is to be found in a differ-
ce of pressure in the afferent lymph-vessels and
the free surface. Increase of blood-pressure
increases the force of the lymphatic current and
carries along a larger amount of lymphocytes to
the surface of the tonsils. In addition to the
specific effect attributed to these lymphocytes,
the current, per se, militates against the entrance
of germs, as the mechanical effect of the current,
assisted by the lymphocytes, washes away the
infections micro-organisms.

Harrison Allen, Kayser, Phuder, Schoenemann,
George B. Wood, Ashby and others state that
the tonsils undoubtedly form lymphocytes in
the germinating follicles. Retterer also proved the
existence of clear germinating centres in the
follicles of the tonsils, and demonstrated the
presence of lymphatic vessels occupying the
entire follicular mass of organs, forming a system
of closed lymphatic canals which do not open into
the connective tissue but by stomata or by their extremities. Fiersol found that the
epithelium covering the folds and the depressions
of the tonsillar surfaces is completely infiltrated
with lymphoid cells, and that great numbers of
the cells escape into the oral cavity to become
the salivary corpuscles, of which the tonsils are
a most important source.

J. Gordon Wilson states that plasma-cells are
derived from these lymphocytes, and are engaged in
removing and utilising cell material which has
become dissolved into the general circulation,
the organ of inducing disease, proves that the tonsils are
physiologically active. D. J. Davis concurs in
this view of the origin of plasma-cells, although
Umna thought that they were derived from the
connective tissue.

Hugh T. Ashby, in an analysis of three thousand
cases of enlarged tonsils (and adenoids) concluded
that they enlarge in order physiologically to
augment the lymphoid tissues of the body. In
every fetus, after the age of six months, it was
possible to detect some adenoid tissue, but in
infancy and early childhood, the lymphatic
structures were at their maximum—exactly at
a time when enlarged tonsils (and adenoids) are
very common. I have presented sufficient
evidence, therefore, that the tonsils are generators
of lymphocytes and leucocytes, which are un-
doubtedly present in large numbers, where they
may even be stored up for ready action, when
called on, and that in addition to their specific
bactericidal action, a constant stream of lymph
from the depth to the surface exits, which alone
would protect by counteracting an invasion of
micro-organisms and by clearing the surface of

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these undesirable settlers. This may be termed the protective function of the tonsils.

DEFENCE AGAINST ABSORPTION.

In addition to actually opposing the systemic invasion with infectious micro-organisms by this protective action of the cellular layer, it has been conclusively proved that the tonsils, per se, actually antagonise the entrance to their interior of infectious germs. Hodenphyl conducted a careful series of experiments dealing with the phenomena of absorption at the level of the tonsils and found that the epithelium prevented absorption, which latter became possibly only when the epithelium was destroyed, or when the substances employed were introduced under the epithelial bed, and that even under these conditions, it was extremely slow. He employed fatty substances, powders and coloured solutions as recommended by Labbé and Sirugue. He found that the epithelium had the same protective rôle at the level of the tonsils as at the level of the buccal mucosa, and that the crypts augmented its extent.

Even in the normal state, the epithelium is more or less irritated, and above all, at the bottom of the crypts, where Labbé and Sirugue have observed the incessant phenomena of cellular renewal. It is due to the presence of dust, or small foreign bodies which penetrate into the crypts; it is due above all to the existence at the surface of the tonsil of pathogenic microbes, which are found incessantly in the normal state. These micro-organisms, although in the crypts, are nevertheless on the exterior of the tonsil, and it is the defensive reaction of the epithelium which prevents their penetration. It is only when the epithelium is destroyed that they penetrate, and even in such instances, they rarely pass beyond the epithelial bed.

The leucocytes have not solely a phagocytic rôle in regard to microbes, but they destroy also their toxins by producing anticlastos, nucleins and oxydases, which have positive chemotoxic properties in regard to white corpuscles, and exalt their vitality.

The phenomena of absorption at the level of the tonsils have been further studied experimentally in the laboratory of Landony, at the Lœnneec Hospital, by Marcel Labbé and C. Levi-Sirugue. They found that the epithelium prevents absorption, and their findings were in full accord with those of Hodenphyl.

Jonathan Wright, in a personal communication (to Wendell C. Phillips) writes:—

"My experiments seem to furnish conclusive evidence that under normal conditions, bacteria do not penetrate the epithelial layer of the tonsil in sufficient numbers at least to set up disease. Yet, we know from clinical experience that nerve shock from fractures, hemorrhage, nasal operations, urethral, sudden cold, etc., produces systemic changes whereby infection is more easy and more dangerous. I believe that the mechanism causing surface infection is a chemico-physical change set up by impulses carried along the sympathetic nerves. This produces an alteration in the surface tension existing normally between the bacterial denizen of the tonsillar crypt and the epithelium which lines it. By virtue of this change, the living pathogenic agent enters the system.

Wright contends that the selective action of the tonsilar epithelium on dust and bacteria, whereby the latter at times are prevented from passing, and at other times are allowed to pass freely into the lymph-channels, is not fully explainable by the laws of immunity, but rather that we are dealing with living matter which obeys the laws of heredity and evolution, and that adaptation by natural selection is the only tenable explanation as to why the protoplasm of the epithelial cells of the tonsillar crypts acts in such a manner.

Clinically, we know that infectious germs, especially streptococci, are commonly found in the tonsillar crypts of healthy individuals, and that auto-infection is probably essential to induce follicular tonsillitis. Wright also adds the significant comment that it is a highly interesting sequence of events which takes place between the time the micro-organism floats on food or in the air into the tonsillar crypts and the time it reaches the deep lymphatics which drain the tonsil—which he regards as a biological process of a physico-chemical nature, affecting the surface tension of the colloids, of which the cells and bacteria are composed.

The defence of the tonsil against absorption, which has been so conclusively demonstrated experimentally, has been exhibited clinically by most observers, notably Jacob, Fränkel, Goerke and others, who attributed the general mildness and low mortality-rate of tonsillar, as compared with other diptherias, before the days of antitoxin, to this specific defence. It is simply remarkable how many and varied pathologic conditions are found by pathologists to exist, strictly confined to the tonsil, that are not found elsewhere by the internist—again adding clinical evidence of the defensive action of these organs.

OTHER FUNCTIONS OF THE TONSILS.

Internal Secretion.—Escat believes that the faucial tonsils have not for their only functions those above enumerated, but that they also possess a physiological and biological function, due to an internal secretion. With Allen, he agrees that the tonsils secrete a principle, the exact nature of which it has been difficult to determine, but which may be useful in the development and to the growth of the individual, and probably to the growth of the skeleton. Masini believes also that the tonsils are the seat of an internal secretion, somewhat similar to that of the suprarenal gland, and he succeeded in producing an increase in the arterial pressure by injecting many animals with an extract of tonsils. E. L. Shurley subscribes to the presence of this internal secretion. Leto discovered fuchsinophil cells in the human tonsils, similar to those which Schiride found in the thymus gland. He states that their origin is not known, but they may develop from the perivascular tissue, and in his opinion, they have a secretory function.

Lubricant.—Frank E. Miller emphasizes the importance of the value of the tonsils as a lubricant. The frequency with which atrophic pharyngitis follows tonsillectomy adds clinical evidence relative to the necessity of this function, and John H. Johnson further endorses this point of view.

Voice.—That the tonsils possess important mechanical, acoustic and phonetic functions very few will deny. Their consistence, shape, size
and presence or absence give structural variation to the resonance cavities, and create as well as determine differences in individual timbres of the voice. They play an important role in tone formation, and the excellent work of Faulkner along these lines is invaluable. T. Price Brown, and many others have reported a large number of cases in which the singing voice had been practically destroyed by tonsillectomy.

Immunity.—Digby asserts that by a process of continual autovaccination, the tonsils (in common with the solitary follicles of the intestine, Peyer's patches and the veriform appendix) protect the body against chance infection. By chemotaxis, all bacteria in the vicinity are attracted through the overlying epithelium into the lymph-nodule. This bacterial attack, invited into the region most favourable to the defensive mechanisms of the body, is nearly always pulsed; lymphocytosis takes place and a great excess of specific bacteriolyisins and antitoxins are also produced, which enter the general system and combat the attack at a more vulnerable point. Thus, immunity against disease is acquired without the individual having apparently had the disease. The same theory is advanced by Packard, who holds that the micro-organisms of acute inflammatory rheumatism are streptococci weakened through this action of the tonsils, and that in various ways we would observe septic diseases oftener. Mackenzie also endorses the existence of this function.

REMOVAL OF THE TONSILS.

It is not within the province of this paper, nor will the time allotted permit me to enter into a discussion of the tonsils in their relationship to other diseases. The quartet comprising tonsillitis, rheumatic fever, endocarditis and chorea is almost classic. In addition, competent observers have considered the tonsils as a focus from which many be disseminated tuberculosis, diphtheria, empyema of the nasal sinuses, septic joints, gall-bladder disease, appendicitis, gastric ulcer, urethritis, etc. But we also agree that the uterus, breast and stomach constitute the organs which become the seat of the vast majority of malignant growths which produce metastases, and yet no one has had the courage to suggest wholesale removal of any of them as a prophylactic measure. Furthermore, we must not lose sight of the fact that the removal of the tonsils is not so simple a matter as is commonly supposed. Although a large number of deaths, complications and sequelae never reach the medical press, very recent literature from the pens of skilled and experienced specialists gives evidence of many deaths and complications resulting from serious haemorrhages, local traumatic disturbances, gangrene, diphtheria from auto-infection, infection of the middle ear, surgical shock, asphyxia, hyperpyrexia, general septicemia, surgical empysema, pulmonary infarct, septic infection of the lungs and its serous membranes and also of the cervical glands, latent tuberculosis in the lungs and adjacent glands, status lymphaticus, serious disturbances of the nervous system, amygdalotomy rash, etc.

With these various well-confirmed expressions before us, who can conscientiously refuse to enter a moral and energetic protest against the defeat of temperance, and to place himself on record as considering the indiscriminate removal of the normal tonsil an absolutely inadmissible proceeding? We cannot and must not be guided by any rule of thumb, but must carefully study and consider each case as an individual entity. Very few will dispute the propriety of tonsillectomy: (1) when these organs greatly interfere with respiration and thus lead to insufficient oxygenation of the blood; (2) when they are actually diseased beyond repair, or (3) when there is no reasonable doubt as to their being, directly or indirectly, an atiologic factor in the production of disease. But the size of the tonsil is by no means a pathologic symptom; a small tonsil may prove more harmful than a large one, and yet size is frequently considered one of the chief indications, if not the chief indication for removal. The Bureau of Child Hygiene and the New York Infant and Child Welfare Societies, in the following very practical standard as a guide to its medical inspectors, namely, that no case was to be considered a true hypertrophy of the tonsils, unless the hypertrophy was such as to interfere with the nutrition of the child, or to cause secondary disturbances, interfering with its health, and incidentally with its school progress.

In conclusion, it is my firm belief that the tonsils were put into the throat of man for good, and not evil intent or serve a physiological rather than a pathologic purpose, and that the normal tonsils have physiological, chemical and phonetic functions which should not be indiscriminately eradicated.

TRANSACTIONS OF SOCIETIES.

MEDICAL SOCIETY OF LONDON.

MEETING HELD MONDAY, DECEMBER 7th, 1914.

The President, Sir John Bland-Sutton, F.R.C.S., in the Chair.

DISCUSSION ON TETANUS, WITH SPECIAL REFERENCE TO (a) PROPHYLAXIS, (b) THE SERUM TREATMENT OF ESTABLISHED TETANUS, DOSAGE, AND METHOD OF ADMINISTRATION.

(Specially Reported for this Journal.)

Major Denis Embleton, in opening the discussion, said he had had the opportunity of observing series of cases of the disease at the Third London General Hospital and at Netley. Two facts must be carefully remembered; the part played by the spore, and the fact that the bacillus tetanus was a strict anaerobe—it would only develop when oxygen was excluded. The spore was very difficult to kill; it could stand almost a dull red heat and 15 hours in 20 carbolic. The disease was produced by inoculation of the spore, which subsequently developed into the bacillus. It was questionable whether this absence of oxygen was a condition necessary to the development of the bacillus inside the body. If a piece of sterile tissue, such as a piece of guinea-pig's kidney, were placed in an ordinary broth culture, the bacillus tetans would develop, even if no further precautions were taken to exclude oxygen. Damaged tissues underwent autolysis, and this latter, rather than the exclusion of oxygen, seemed to be the favouring element in development. It was said that the bacillus remained practically at the site of inoculation and in the nearest lymph glands; but if it were so, it differed from all other bacteria. It should be possible to demonstrate the bacilli in the bone marrow, spleen and urine of the patient. Recently it was said that if a wound were swabbed out with pure carbolic, tetanus and sepsis...
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... would practically be abolished and the wound would heal by first intention. But Cantack used 1 in 20 carbolic to isolate and cultivate the bacillus tetanus. Pure carbolic swabbed on to a wound artifactually produced in a guinea-pig and infected with spores bearing three-fourths of carbolic produced a case, but there were no signs of the animal, even when the carbolic was applied two minutes after the infection had been produced. The same would bear infection having, in this short time, gone beyond the range of the antiseptic. The blood of the animal was then infected with spores and it was quite free to them. Therefore, in cleaning a wound no substance which was likely to damage the tissues. Hot baths and Bier's method should be among the means employed tetanobacillistic. The prophylactic axis had been definitely established, both from experiments on animals and statistics in man. Probably all the wounds received by the troops in France and Belgium were infected with tetanus spores, yet only relatively few of the wounded developed the disease. As all wounds could not be treated prophylactically, shell or shrapnel wounds should be chosen. He had seen tetanus in a man wounded only with a rifle bullet. It was impossible and lymphatic channels, for it was what was called a prophylactic case. In every case, Hypnotics were given to relieve symptoms, not with any idea of curing the disease. As the central nervous system was being severely poisoned by the disease... Tetanus... was felt to be absolutely necessary. He used chloral and bromide; and where rapidity of action was desired, he employed paraldehyde and ether suspended in normal saline, given intravenously. If the dose of serum was not very large, the result was one of the best. Some said that if the cranial nerve nuclei, other than the fifth, were involved, the case would die, whether serum was given or not. To this, however, he did not subscribe, and agreed in the absence of further proof. The intrathecal route for the injection of the antitoxin had been advocated, on the assumption that by this means it got into rapid and intimate contact with the infected nerve cells. But this was based on erroneous concepts... There was no evidence that a non-diffusible substance could penetrate into the nervous tissue to any depth when injected; but there was experimental evidence that it could not do so. Substances inoculated in this way rapidly passed into the venous sinus and lymphatic channels, for it was only another way of giving it intravenously. Satisfying results had been reported after injecting antitoxin into the frontal lobes. In tetanus, the treatment with cerebro-spinal fluid was very much increased, and it was impossible to relieve the tension following the pouring out of the fluid might have caused beneficial results, as in meningitis. The intravenous route for the injection of serum was the easiest and safest, and ameliorated the anaphylactic symptoms and death. The safest route was the subcutaneous, but the absorption was slower. On the appearance of the first symptoms, 10,000 units should be inoculated at once, and subsequently 5,000 units every two hours until there was an abatement in the symptoms. Prof. F. W. ANDREWS said he had seen only three cases of tetanus since the war broke out; but he had read of several other cases. He said there was no evidence that this bacillus inhabited the natural soil as such, but only cultivated and manured soil. The real source was the animal excreta with which cultivated soil was mixed. The bacillus was very rare in human cases, occurring only in 5 per cent. of samples; but in the dung of horses and cattle injection of the bacillus was found in 90 per cent. of samples. For some investigations on the disease at St. Bartholomew's, he tested some samples of soil from his own garden, which had been a good deal manured, and found it containing 0.1 per cent. of the bacillus inoculated with the soil developed tetanus. The risk of the disease arose when there was deep implanta- tion; surface infection seemed to be of no moment. He had himself inoculated himself when gardening, but he did not fear contracting tetanus. One could often estimate the risk of tetanus in a given wound by a rough-and-ready bacteriological examination—the recognition in the wound of the tetanus bacillus was very rare. If there were common focal anaerobes, such as the bacillus aerogenes capsulatus and the bacillus Welchii. The fact that the disease did not develop from superficial abrasions, even though infected with the bacillus, provided a case for the open treatment of wounds suspected of contamina- tion by anaerobes. This he regarded as of greater importance than flooding the wounds with oxygenat- ing antiseptics, such as hydrogen peroxide; these latter had been extensively employed with their oxygen, for the treatment of wounds. This could be of temporary. Five hundred United States units seemed sufficient to protect the horse, the most susceptible animal known. Twice that should be administered. The serum was... tetanus... was high—over 90 per cent. of those attacked, according to one authority. With regard to treatment of the declared disease, three lines must be considered—(1) the question of the excision of the wound or amputation, (2) specific serum treatment, (3) general drug treatment. It was common hospital experience that in acute tetanobacillary disease, exclusion of the wound did little or no good to the sufferer; usually it was undertaken too late. Experimental treatment (tars) seemed to show that excision did not serve to preserve life. Still, he believed it good practice to excise wounds where practicable, for the main fount of the toxins was the surviving bacillus, and very little could be achieved by specific serum treatment in the more acute tetanobacillary cases; it could not be expected to undo the damage already caused to the central nervous system, though in a certain proportion of cases the exudation, through which the organism might be developed, might be reduced by an energetic serum treatment might turn the balance. The best method of injection of antitoxin he considered to be by the intrathecal and subcutaneous routes combined. The former alone seemed to slow when the disease had already developed, but to have little effect to a shrinking from the use of the intercerebral route; he had seen it followed by haemorrhage into the sub- stance of the hemispheres as large as a walnut. It should be employed only as a last resort. In a series of 252 cases published the following results ensued— In 142 treated without serum the mortality was 77 per cent.; in 71 cases treated with slight doses, it was 70.4 per cent.; and in 41 treated with large doses of serum, the figure was 50 per cent. It was often seen... was often by respiratory difficulties, sedatives might be... a source of danger. He had not had experience of carbolic acid treatment.

Dr. John Eyre agreed with Professor Andrews that there were usually high and positive organisms found in persons liable to develop tetanus, but there were cases of tetanus in which these were not found. The cases chosen for prophylactic serum treatment should be those with badly lacerated or contused wounds and which had been running the risk of soil contamination. It was probably true that carbolic acid did not affect the spores, but the latter developed into the bacilli, and these were the chief factors in the production of toxics, symptoms, and deaths of cases which were susceptible to carbolic acid. With regard to dosage, a number of different sera were on the market, differing much in potency. The unit which had met with general approval here was the United States unit. The dosage was increased as very little serum was required in proportion to the time which had elapsed since infection. The serum inoculated remained at its maximum for about a week, and then rapidly declined, so that in order to continue a prophylactic effect the serum injection should be repeated every seven or eight days. The treat- ment of a case of established tetanus presented quite a different problem, for there was a rapid elaboration of toxin, which had done harm already. Unfortunately, the clinical experience was limited. Those which showed that the disease was already far advanced and the nerve tissue had been very severely injured. On theoretical grounds it seemed sound practice to get rid of the local factory, especially as
in experimental work the disease seemed to largely remain localised to the site of inoculation. If tissue cells were saturated with antitoxin and then thoroughly washed so as to get rid of the excess, which washed cells did not cause infection of a second animal. Intracerebral inoculation of serum seemed to him a drastic proceeding, and should only be used as a last resort. Hoffman recorded 13 cases treated by subcutaneous inoculation with a mortality of 25 per cent., 10 cases inoculated intrathecally with a fatalitv of 12.5 per cent. Most of the cases he had which received subcutaneous inoculations had died, while those treated intrathecally had recovered, using both of these, though as the subcutaneous injection acted slowly, an efficient mass effect was produced.

Lieut. BLAIR, M.B., R.A.M.C., said that at the Herbert Hospital, Woolwich, there had been 17 cases of tetanus, of which six had died, nine recovered, and two were still under treatment. Ten of the cases were acute. Most of the wounds from which infection came were gunshot wounds; only four or five were from sharp implements. All the wound tracts appeared dirty and lacerated, at both itching edges. Unless cases of the disease received prophylactic doses within two days of the infliction of the wound, 4,000 units should be given intramuscularly, for that seemed to ensure rapid effects. The dosage given at the Herbert Hospital was 4,000 U.S.A. units daily, injected into the spinal canal. Light chloroform anaesthesia was used. He did not measure the amount of cerebro-spinal fluid withdrawn, but the serum was introduced slowly. It was very important to relieve the patient from the exhaustion following the spasms, and for that purpose 1/2 gr. of morphia was given four-hourly. Sixty grains each of chloral and bromide had been their sheet-anchor as a hypnotic. Chloroform was used in three cases, but on several occasions it was difficult to retain it. It was seldom necessary to amputate a limb during the treatment of tetanus; it was better to persist with iodine and oxygen gas only. The incubation period of the disease was considerably varied. Five cases had an incubation period of a week, and that of others varied from ten to thirteen days.

Dr. KARL BROWNING said it had been absolutely proved that with the lapse of time since the infliction of the wound the amount of tetanospasmin increased enormously. It was most important to watch for any earliest symptoms of tetanus. He commented the article by Dr. Macnamochie, in which the premonitory symptoms were set out. If the serum should he run into the spinal canal very slowly, and if a fall of pressure occurred in the blood pressure, it was a sign that the limit of the dose had been reached, according to Sophia. The doses of serum given in Britain were very much smaller than those in American practice.

Major EVANS, replying on the points raised, Adair had shown the existence of the lesion in a case of tetanus generally meant death. He did not attach so much importance to a second dose of serum in a week as to getting as rapid and efficient an action as possible. In cases of the disease, even when there were only slight spasms he had never failed to find diacetic acid in the urine, and he thought that indicated that death in this disease was due to acidosi.

ROYAL SOCIETY OF MEDICINE.

SECTION OF OBSTETRICS AND GYNECOLOGY.

MEETING HELD THURSDAY, DECEMBER 3RD, 1914.

DR. W. S. A. GRIFFITH IN THE CHAIR.

SPECIMENS.

Mr. CRIFORD WHITE showed (1) an ovarian tumour which had been infected with tubercle; (2) a case of interstitial tuberculous salpingitis, in which tubercle bacilli were found in a small intra-mural abscess.

Remarks by the President, Dr. STEVENS, and Dr. TATE.

Dr. MACNAUGHTON JONES showed a MULTIPLE MYOMA, removed from a patient, aged 47. The tumour weighed 1 lb. 1 oz. The nuclei varied in size from that of a small egg to a pea. There were three larger intra-uterine growths, two in the fundal cavity, and a third projection from the cervix. Altogether, in this comparatively small sized tumour, there were from thirty to forty growths, subserous, in the cavity and in the wall. The uterine surface was studded over with them, and its wall was a mass of nodules. He urged advice rather for other symptoms than pelvic ones. Only for the past year had she suffered from menorrhagia. Multiple tumours were very common, but he had never seen one just like this. They had been seen on the serosa, many years back he had removed from a patient approaching her 60th year. In this there were some hundred small growths, and, curiously enough, he removed some years afterwards a multiple myoma, which was this, one mass of nuclei.

Dr. MACNAUGHTON JONES demonstrated a myomatous uterus containing large numbers of intra-mural and subserous growths.

Dr. TREVOR B. DAVIES recorded two cases—(1) sarcoma of the cervix uteri; (2) sarcoma of the broad ligament.

Sarcoma of the Cervix: The patient was under the care of Dr. T. G. Stevens. She was a single woman, aged 29. In the spring of the year 1912 she was attacked with a bleeding tumour growing from the anterior lip of the vagina. The menstrual periods were quite regular every 28 days, lasting four to seven days. Examination per vaginam revealed a soft, smooth, rounded, bleeding tumour growing from the anterior lip of the cervix to the upper part of the vagina. The uterine body was normal in size and position. A hysterectomy was performed, the vagina being divided well below the growth. The pathological report stated that the tumour was a sarcoma, the lower abdomen covered by a smooth necrotic surface, and in the recent state it measured two inches in diameter. Microscopically the appearances were those of a spindle-celled sarcoma. The stoma was scanty and the blood-vessels were very thin.

Sarcoma of the Broad Ligament: The patient was under the care of Mr. Drew. She was aged 51, married, two children, Menopause 14 years ago. Complaint: Pain in the right lower abdomen, bleeding to the back. In March, 1910, Mr. Drew removed an inflamed appendix vermiformis. Examination showed the appendix-scar to be tender, and the right kidney freely mobile. Per vaginam: To the left of the cervix a hard, fixed mass the size of a large walnut, which bulged down into the vaginal roof. The uterus was normal in size and position and quite separate from the mass.

Operation.—A hard swelling the size of a duck's egg was found between the layers of the right broad ligament. It was shelled out with the finger and the broad ligament closed. In less than three weeks another fixed mass was felt in the same position.

Pathological Report.—The tumour was about the size of a Tangerine orange, with a small mass the size of a large cherry projecting from its upper part. The tumour was pale in colour and fairly firm in consistency. Its surface was smooth with nodules of various sizes. In the section the surface was pale; there were no hemorhages and no vessels were seen. Microscopically, the growth was a typical spindle-celled sarcoma composed of large spindle-cells arranged in bundles without any fibrous stroma, but with numerous thin-walled blood-vessels.

Remarks by Mr. Drew, Dr. Stevens, Dr. Eden, and Dr. Spencer.

Dr. HERBERT ROBERTS showed a case of pyometra associated with the cervix. The specimen was removed from a patient, aged 62, who had had seven children and two abortions. Menopause 17 years ago. History of severe hemorrage three months before admission, and also gushes of blood accompanied by severe colicky pains. The cervix revealed no ulceration nor new growth. The uterine body was
enlarged, soft and mobile. During the operation of hysterectomy the vagina ruptured and foul material escaped into the pelvis. The lower part of the abdominal wound became infected, but the patient subsequently did well. The specimen showed a tubular solid growth, large at one end; the growth extended from the portio vaginalis to the os internun, and was densely hard. The cavity of the uterus was distended with purulent débris. The growth was a squamous-celled epithelioma. An illustration accompanied the communication.

Remarks by the President, Dr. TATE, Dr. ROATH, Dr. BLACKER, Dr. EDEN, and Dr. STEVENS.

Dr. Cuthbert Lockyer showed a case of double ureter which simulated a parovarian cyst of the right broad ligament. The specimen was obtained from a patient operated on by Dr. Routh and was a dilated and tender right kidney for two years previously. Pyonephrosis had been suspected. There was colic bacularia, for which many injections of antiseptic vaccine had been given without improvement. There was a hard, tender, solid lump to be felt in the left posterior quadrant of the pelvis. In March, 1914, the patient began to lose blood from the uterus. As the menopause occurred 20 years previously at the age of 43 years, growth of a malignant character in possibly, and malignancy starting in the body of the uterus. At the operation the hard body to the left of the uterus was to be noted an enlarged calcareous myoma adherent to the rectum and to the back of the left broad ligament, which latter definitely had a pedunculated attachment to the uterus. Above this independent growth, but quite separate and distinct, lay a solid tumour of the ovary, which proved to be malignant. The tumours above mentioned were removed. The right broad ligament contained a cystic swelling of the size of an orange. This proved to be a dilated ureter twisted upon itself. In size it corresponded to a distended colic of one intensitive. This hydr-o-ureter was removed; the corresponding kidney was left in situ. The contents of the ureter were found after operation to be two calculi (blocking the lower twisted portion) and four stagnant urine. Six weeks later a pyonephritic abscess was opened, since when the kidney has given no trouble. The cause of the uterine hemorrhage was two myomatous polypi and endometrial hyperplasia.

The uterus was not malignant.

Remarks by Dr. ROATH and Dr. EDEN.

Dr. Herbert Spencer read a short communication on a Case of Extensive Cancer of the Cervix with Pyosalpinx, Well Seven Years after Wertheim's Operation.

The patient was aged 38. She had been examined by an obstetric physician in a general hospital in London, who advised her to go into the cancer ward of the institution, as no operation could be done. The cervix was occupied by a large ulcerated growth as big as a small apple, which distended the vagina. The uterus was fixed by thickening in the left broad ligament, and the left sacro-uterine ligament; the thickening was not due to any disease. An examination was performed at University College Hospital on February 16th, 1907. The cervical growth was first cutured and cultured, and several protruding masses were cut off with the cautery and solved in 10 per cent. per cent. A large amount of pus was then applied. The operation was rendered difficult owing to the presence of bilateral paratubes, which were adherent to the pelvis and rectum. The separation of the left ureter was difficult. No gland was removed. A small abdominal drain was used. Urine escaped by the abdominal drainage tube for a few days, and afterwards by the vagina. The patient recovered and left for Canada where a series of letters was written. An examination of the vagina was performed by Dr. Matlow, of Toronto. Dr. Spencer examined the patient every year for four years after operation and found no recurrence. In a letter from Canada dated March 24th, 1914, the patient reported herself as being well and cured. A further examination showed the growth accompanied the paper.

Remarks by the President and Mr. Drew.

Dr. Herbert Spencer, in reply, did not think Wertheim's operation was as good as vaginal hysterectomy with the currenry for early cases of squamous carcinoma of the portio; but for extensive growths and for adenoma-carcinoma it was much better.

Dr. Thomas Stevens read a short paper on "Ante-Partum Haemorrhage," which will be found on page 400.

Clinical section.

Meeting held Friday, December 11th, 1914.

The President, Sir Frederic Eve, in the Chair.

Exhibition of Clinical Cases.

Dr. Alexander Morrison showed a case of precordial thoracostomy for heart disease. The patient, a boy, aged sixteen, was stated to have been in good health and capable of athletic exercise until Christmas, 1913. He had played football weekly from October till late in December. He then became breathless and had severe palpitation. No history of rheumatism or scarlet fever was obtained. He was admitted to hospital in February, 1914, with tachycardia, irregular action of the heart, breathlessness, and a mitral systolic bruit. The area of cardiac dulness was much increased; powerful heaving of the left ribs and cartilages from the fourth to the sixth and movement of the sternum were noticed. He was rendered comfortable by rest and tincture of digitalis, but with no diminution of thoracic movement, and was discharged in April feeling comfortable. He was told to return if again distressed, for precordial thoracostomy. He did so, in April, and was again admitted. The operation was performed by Mr. Mower White in June, when 4 1/4 in. and 2 3/4 in. of the fifth and sixth ribs and cartilages respectively were removed. "Costo-pericardial adhesions were found. Since then he had been comfortable, but still required tincture of digitalis. The object of the operation was to relieve the enlarged heart of the labour of raising the chest wall as well as driving blood.

Dr. Arthur F. Hertz showed a case of cardia chalasia (so-called cardio-spasms). The woman, aged 36, had complained for ten years of pain under the lower part of the sternum and a choking sensation under the upper part whenever she ate. She had always had an impression that food had difficulty in getting into her stomach. About two years ago she fell from a ladder and hit her chest; since then she had constantly vomited small of the food after every meal; it came up quite undigested, issuing in mucous saliva. During the night she frequently woke owing to regurgitation of her evening meal through her nose; the food was now sour, especially if several hours had elapsed since the meal, in contrast to the food brought up during meals, which was never sour. The condition became steadily worse until nine weeks ago, when she ceased to be able to keep down any solid food at all. During the three days before she was seen, six weeks ago, no food had been taken; but she had been able to drink milk. An x-ray showed that the whole œsophagus was dilated, the obstruction being at the cardiac orifice of the stomach. There was violent peristalsis in the œsophagus, but the food only trickled with extreme difficulty into the stomach. The condition was diagnosed as cardiac chalasia, and a mercury tube was passed. This met with no obstruction at the cardia, and the patient had since been able to retain her food, unless it was insufficiently masticated, by passing the tube immediately before each meal.

The term "chalasia" (δολος, to relax) was coined for him (Dr. Hertz) by Sir Cooper Perry to replace the term "spasm," which was incorrect for the following reasons:—(1) Hypertrophy of the cardiac sphincter had never been observed after death, even with the obstruction lasted for twenty or more years, although long-continued spasm would necessarily lead to hypertrophy. (2) The mercury tube passes without...
any sense of obstruction through the cardia, which would be impossible if a spasm were present. (3) The mercury tube can be withdrawn without any difficulty, whereas it would be grasped by the sphincter were cardio-spasm really present. To the author's mind that was the absence of the normal relaxation of the cardia, which should occur when each peristaltic wave reached it. Similarly, many cases of so-called pylorospasm were due to pyloric achalasia, and where achalasia was the most frequent cause of ileal stasis.

Dr. Arthur F. Herbert and Mr. C. H. Fagge contributed the notes of a case of spontaneous gastro-enterostomy with subsequent perforation and death, after operation. The patient was a woman, aged 48, who for six years had suffered from indigestion, the pain occurring from one hour to an hour and a half after food. Vomiting and haematemesis had been present. In 1913 she had been treated for gastric ulcer. In 1914 she developed sudden violent pain in the epigastrium, and the diagnosis of perforated gastric ulcer was made. At the operation Mr. Fagge found an opening between the stomach and jejunum—i.e., a gastro-jejunoanostomy had taken place. Secondary perforation had followed. The parts were left in situ, and protected by suturing the jejunum to the stomach and omentum. She had since left the hospital, perfectly well. X-ray showed that it had emptied after 20 minutes and the opening had gone gastro-jejunoanostomy opening, very little bismuth passing through the pylorus.

ROYAL ACADEMY OF MEDICINE IN IRELAND.

SECTION OF MEDICINE.

MEETING HELD FRIDAY, NOVEMBER 20TH, 1914.

The President of the Academy, Dr. Walter Smith, in the Chair.

THE THRESHOLD OF DISEASE.

The President of the Section, Dr. J. A. Lindsay, read an address on this subject. Dealing with the problem of early diagnosis, he chose four subjects for special consideration. These were endocarditis, gastric cancer, disseminated sclerosis, and pulmonary tuberculosis.

In acute rheumatism, endocarditis was extremely common in adults and almost non-existent in children. Murmur was heard at the apex, slight increases in cardiac dulness, and arrhythmia were suspicious signs. Prolonged rest in these cases was most important.

In a patient of fifty who had previously had a good digestion, and who was not suffering from renal or hepatic disease, cancer might be suspected if he took a dislike to flesh meats, exhibited some loss of flesh and debility, and occasionally vomiting. The absence of free HCl was the rule. Haematemesis was rarely an early symptom.

Taken as a whole, the following symptoms were highly suggestive of early disseminated sclerosis—transient disturbance of vision, impairment of bladder control, parasthesia of one or more limbs, diminution of abdominal reflex, loss of tone of sphincter iridis, giddiness, and emotional instability.

No laboratory tests other than finding tubercle bacilli in the sputum were convincing in making a diagnosis of incipient phthisis. Calmette's test, von Pirquet's, and Aroneth's, and the opsonic index method had a very limited value. Early and very suggestive symptoms were loss of flesh, slight rattle in the sputum cough and acceleration of the pulse. The first physical signs in the chest were auscultatory, and consisted of hardness or weakness of the breath sounds. Crepitations came later. Slight haemoptysis and night sweats were of some value, but the interpretation of the skiragram was very difficult. Quite early cases were for the most part amenable to treatment.

Dr. O'Carroll tendered to the new President the thanks of the Section for his address, which, from both the literary and medical aspects, was a treat to listen to. As to pulmonary tuberculosis, he rather thought the debate as to the value of percussion and auscultation was a debate as to individual experience; one was generally impressed by the thought that the history carried the most information. He referred to a statement made by a Continental writer that the specific diagnostic sign of phthisis was the râle, which evidently indicated that no amount of percussion change would settle the question. He thought that when the slightest type of tubercle was heard, the cracking was heard. He did not think one should wait until physical signs in the lungs were found before suspecting phthisis and treating the case as such. He thought that the then perfectly definite physical signs were discovered, and bacilli were present in the sputum, the life value of the patient was very low.

Dr. Druery agreed as to the supreme value of early diagnosis. He thought if the matter was reasoned out it would be seen that percussion would yield a very late sign as compared with auscultation. He had always believed that long before anything like cracking was discovered the roughening of the expiratory sound was the earliest departure from health. He suggested that in children with rheumatism the diagnosis of the condition of the heart was not the greatest difficulty, but rather to diagnose the rheumatism.

Mr. Moorhead said that a distinction should be drawn between the early diagnosis of phthisis on which one would start treatment and the early diagnosis from which statistics might be compiled with fairness. He thought that the therapeutic signs were quite different. Dr. Parsons said that the finding of no physical signs in the lungs though bacilli were present in the sputum was not a very unusual experience. He thought the auscultatory signs were the earliest. With regard to gastric cancer he would mention cases where there was progressive gain in weight by the patients. The autopsy in one such patient who died of a ruptured heart showed quite extensive cancer of the stomach.

Dr. Lindsay, in reply, said that when emphasising the importance of an early diagnosis he did not think of it only from a therapeutic aspect, as numerous instances could be conceived where a reasonable forecast might be of the greatest assistance to the patient and his friends. For all statistical work in connection with phthisis the line ought to be drawn between cases in which bacilli were found in the sputum and those in which they were not. Pulmonary tuberculosis until the other there was positive proof. He had seen a slight temporary increase in weight in cases of cancer of the stomach, but he had never experienced anything like progressive improvement.

LIVERPOOL MEDICAL INSTITUTION.

The President, Major E. W. Hope, in the Chair.

ATTENTION was drawn by the President to THE BELGIAN DOCTORS' RELIEF FUND, and a Committee was formed to work with that of the Royal College of Physicians of London.

Mr. G. P. Newbolt read a short paper on APPENDICITIS IN THE ELDERLY.

He reported three cases and emphasised the fact that appendicitis did occur in those over 60, more commonly on the left, was generally ushered in by fever, and also that perforation not infrequently took place without causing any serious initial symptoms.

The paper was discussed by the President, Mr. W. T. Thomas and Mr. G. Larkin.

Mr. A. A. Bunclere read a short paper on BILATERAL OPTIC SENSITIS due to sphenoideal sinuses in which the left sixth nerve was involved, the vision of the left eye somewhat impaired with severe occipital pain, spontaneous discharge of pus from sphenoideal sinuses was followed by gradual improvement. Total absence of any trouble in the nose pointed to sinus infection.
Capt. C. Thurstax Holland read a paper on the X-RAY TREATMENT OF THE WOUNDED at Fazakerley Hospital, fully illustrated by lantern slides. He carefully described his methods for arriving at the locality of a foreign body in the tissues illustrated. There were numerous lantern slides showing the destruction of bone and the character of the injuries produced by bullets and pieces of shell. The paper was well received by the audience.

Dr. Barclay described the instrument which he has devised to facilitate rapid estimation of the depth of foreign bodies, and deplored indiscriminate removals of wounds.

Dr. Oram described another method based on the series of curves.

Capt. Arthur Evans referred to his experiences in the Boer War, and compared them with his present work at Fazakerley Base Hospital. He is strongly in favour when removing the bullet from the fleshy parts of making a free incision in order to save the muscles as much as possible. The muscles should be separated rather than cut across. The bullet of to-day makes a much more serious wound than the bullet of the Boer War.

Capt. Holland, in his reply, advocated conservative surgery when dealing with comminuted fractures.

ULSTER MEDICAL SOCIETY.

MEETING HELD THURSDAY, DECEMBER 10th, 1914.

The President, Dr. St. George, in the Chair.

A LETTER from Dr. Cox, Medical Secretary, re communication in British Medical Journal, November 28th, pp. 934, 935, entitled 'The Belgian Doctors and Pharmacists' Relief Fund', was read and approved of.

The CHAIRMAN gave an address on 'Medical Work in the Early Seventies in a County Infirmary.' The speaker gave a most interesting account of the condition of things which obtained when first he became connected with the work of his colleague, Dr. Rentoul, when seconding the vote of thanks proposed by Dr. Wm. Calwell to the Chairman.

Dr. J. E. McILWaine read a paper on 'The Clinical Estimation of the Heart Muscle,' illustrated by electrocardiograms.

Dr. T. Hennessy, Irish Medical Secretary, Dublin, attended the meeting and gave the latest information as regards the position of the Irish medical profession under the National Insurance Act.

OPERATING THEATRES.

ROYAL FREE HOSPITAL.

GALACTOCOELE.—Mr. H. Woodward operated on a woman, about 47, who complained of a swelling in the left breast. She had been married twelve years and had had four children, all of whom she had suckled. During the third lactation she had had inflammation of both breasts, which terminated in an abscess. This had healed completely after incision. Early in the fourth lactation she had noticed that the breast was a little irregular in shape, and after this, her last lactation, had come to an end, although the breast returned to its normal size, a swelling persisted in the inner part. At no time did it cause her any pain, and though it had now lasted some fifteen months her main reason for coming for advice was the fear that the swelling might become cancerous in nature. On examination, the swelling was seen on the inner part of the left breast; it projected somewhat above the surface, and in size it resembled a large walnut. On palpation a mass was felt in the site of the swelling, and it evidently formed a part of the breast; though firm, it was not hard, and some obscure fluctuation could be felt on it. It was not tender, and the skin over it was unaltered and not adherent to the swelling, which was also unattached to the pectoralia muscle. No enlarged glands could be felt in the axilla. A diagnosis of galactoceole was made, and an operation was advised.

After the patient had been anaesthetised, an incision radiating from the nipple and some two inches in length was made over the swelling. The incision was deepened up to the wall of the cyst when seen. An attempt was made to dissect out the cyst whole, but the wall, which was thin, soon tore, and white, cheesy matter exuded; about an ounce escaped, and then, the cyst having become flaccid, it was possible to dissect it out. Two deep sutures were inserted, so as to obliterate the cavity left by the removal of the cyst, the skin wound was closed with Michel's clips, and a simple aseptic dressing applied.

Mr. E. said that the diagnosis of a galactoceole is generally not difficult when the circumstances are typical; when a swelling, apparently cystic, develops during lactation and persists after lactation has come to an end, which increases with great rapidity, if at all, and causes pain or distress, a diagnosis of galactoceole is almost certain to be right. Galactoceole can only arise in connection with lactation, for the contents are primarily milk, but as time goes on the more liquid part of the milk is absorbed, and what is left resembles a grey leathery cyst. The mode of production of a galactoceole is simple. In one way or another a galactophorous duct must have become blocked, so that when during lactation milk is secreted by the corresponding alveoli it cannot escape, but is pent up and distends the ducts and secretory structures so as to form a cyst. Sometimes the cause of the blocking of the duct is obvious; an incision in the breast made for the removal of an adenoma has cut through a duct, and when the wound is removed the electrical tissue blocks the duct; that is why in all incisions into the breast the incision should be made in a line radiating from the nipple, for an incision so made is much less likely to wound a lactiferous duct than one which is made transversely. In the case he had just operated upon an abscess had existed in the breast, and when this abscess healed much new fibrous tissue had certainly been formed. It was unlikely that the incision made for the purpose of evacuating the contents of the abscess had anything to do with the formation of the galactoceole. Galactoceoles are decidedly rare.

The wound healed rapidly. The Michel clips were removed on the fifth day and the deep stitches two days later, and the patient left the hospital ten days after the operation with the wound fully healed.

SPECIAL REPORTS.

BELGIAN MEDICAL MEN AND PHARMACISTS' RELIEF FUND.

£ s. d.

Additional list, per London Office—

<table>
<thead>
<tr>
<th>Name</th>
<th>Amount</th>
<th>Total</th>
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<tr>
<td>Ian Macdonald, Esq. (Huelva, Spain)</td>
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Per Dr. H. Macnaghton-Jones (further list—

"An Old Pupil" 3 3 0
F. Bettens 2 0 0
Miss Frances Harrington 2 0 0
The Junior pupils of Harrogate College 0 1 0
Per Miss Giovanna 3 1 0
Mrs. Thay 0 8 0
Mrs. Presswell 0 2 6

Correction.—In our list of December 9th Mrs.
BELGIAN MEDICAL RELIEF FUND (IRELAND).

FIRST LIST OF SUBSCRIBERS.

Total to date, £765 5s.

J. G. Allen ... £ 4 10
S. H. B. Allison ... 1 10
Brown, B. Allison ... 1 10
Anson ... 1 10
F. G. Atkins ... 3 3
A. G. Aitken ... 1 2
C. A. Ball ... 2 2
Sir G. S. Ball ... 2 2
C. Preston Ball ... 2 2
A. P. Barry ... 1 1
J. George Barry ... 2 2
John M. Barry ... 1 10
Joseph Beaty ... 2 2
William Beaty ... 3 3
C. M. Benson ... 5 5
Sir Humphreys Benson ... 5 5
N. W. Besser ... 1 10
J. J. B. Bickerstaff ... 2 2
Wm. Bickley ... 1 10
The Clinical Club ... 10 10
John Coffey ... 1 10
T. J. Considine ... 2 2
M. O. Connellan ... 2 2
Sir O. Cooper ... 1 10
Sir J. E. Cooper ... 2 2
J. C. Corbett ... 5 5
W. J. Corry ... 2 2
H. G. Cowan ... 2 2
Sir John Lenthones ... 1 10
John Lindsay (Bel- longin) ... 5 5
James Little ... 2 2
M. E. Lynch ... 2 2
Thomas Lydon ... 1 10
Anthony Macbeath ... 1 10
P. B. Macdonald ... 1 10
James MacCook ... 1 10
Joseph Macfadyen ... 1 10
Murray-G. M'Elligott (of Listowel) ... 3 3
Denevan ... 1 10
Thomas M. McCaffrey ... 2 2
A. A. McCornack ... 2 2
E. P. McCollum ... 10 10
John McColl ... 1 10
J. T. Macnamara ... 1 10
P. M. Macnamara ... 1 10
R. McClelland ... 1 10
John M'Cullagh ... 2 2
E. J. M'Connell ... 2 2
W. M. M'Donald ... 2 2
John A. Maguire ... 2 2
R. B. Mahon ... 1 10
M. J. Malone ... 1 10
Rev. M. J. Malone ... 1 10
Mrs. F. Manning ... 1 10
P. F. Manning ... 1 10
Edward M. Maxwell ... 3 3
W. E. Maxwell ... 1 10
G. Parry Meldon ... 2 2
M. S. M. M'Glasgow ... 1 10
William M'Knight ... 1 10
A. Nixon Mont- gomery ... 10 10
H. C. Mooney ... 2 2
Edward E. Moore ... 1 10
Sir John W. Moore ... 5 5
T. G. Moonhead ... 1 10
Sir John M'Namara ... 1 10
J. P. Moran ... 1 10
John M'Underwood ... 1 10
William A. Morton ... 2 2
Edward Murphy ... 2 2
P. F. Murphy ... 1 10
H. Murray ... 1 10
George Myers ... 1 10
James Neil ... 1 10
George MacBride ... 2 2
J. A. Oakshott ... 2 2
C. M. O'Brien ... 5 5
Daniel O'Brien ... 1 10
Kennedy J. O'Brien ... 1 10
Joseph O'Donnell ... 10 10
Peter H. O'Connell ... 1 10
Daniel M. O'Connor ... 1 10
W. C. Oliver ... 1 10
William O'Donnell ... 1 10
John O'Donoghue ... 1 10
The Oblates of the Church of Ireland ... 2 2
John O'Farrell ... 2 2
William O'Malley ... 1 10
Francis J. O'Reilly ... 1 10
Sir Lambert O'Nanthy ... 2 2
Owen O'Sullivan ... 1 10
t o m ... 2 2
John O'Sulliven ... 2 2
George F. Palmer ... 1 10
Joseph Pettit ... 1 10
Edward Phillips ... 2 2
Alister C. Powell ... 1 10
J. E. Pringle ... 1 10
S. F. Pringle ... 2 2
Miss Purdy ... 2 2
James Purdy ... 2 2
F. C. Purcell ... 5 5
P. C. Purcell ... 5 5
J. J. Purser ... 2 2
James Purser ... 1 10
Sir Joseph Redmond ... 5 5
M. Redington ... 1 10
Rt. Hon. Charles ... 1 10
Lt.-Col. E. E. Roe ... 1 10
J. R. Ross ... 1 10
W. R. Ross ... 1 10
R. J. Rowlette ... 2 2
R. J. Rowlette ... 1 10
A. R. Rutherford ... 1 10
Henry M. Scott ... 1 10
John Scott ... 2 2
J. H. Scott ... 2 2
E. J. Scott ... 2 2
Reginald W. Scully ... 5 5
Edward Scully ... 1 10
Thomas Scullion ... 5 5
Alfred Smith ... 5 5
T. W. Smith ... 2 2
Joseph Smyth ... 1 10
Robert Smyth ... 2 2
J. B. Smith ... 1 10
Alex. B. Stephenson ... 1 10
Mary S. C. Strange man ... 1 10
Henry Stokes ... 2 2
H. E. Strachan ... 3 3
Johnson Symington ... 2 2
Robert J. Todd ... 1 10
Thomas J. Tait ... 1 10
James T. Tait ... 1 10
Sir William J. ... 3 3
Henry Tempey ... 2 2
John T. Tempey ... 1 10
David Turner and a Friend ... 3 3
Joseph Wallace ... 1 10
John Walker ... 1 10
Hugh T. Warneck ... 2 2
Joseph S. Waters ... 1 10
W. E. Waters ... 1 10
Louis Werner ... 3 3
James W. Wetherall ... 2 2
Gevrege Wigeder ... 1 10
J. Henry W. White ... 1 10
Harry W. Winter ... 1 10
W. A. Western ... 3 3
Sir William Woodhouse ... 10 10
John P. Woodruff ... 1 10
Sir John W. Woodruff ... 1 10
Albert E. Wyne ... 2 2

CORRESPONDENCE.

SCOTLAND.

Scottish Medical Service Emergency Committee.

A meeting of the Committee was held in the Hall of the Royal College of Physicians of Edinburgh on Saturday, December 5th. Present: The President of the Royal College of Physicians of Edinburgh, the President of the Royal College of Surgeons, the President of the Royal Faculty of Physicians and Surgeons of Glasgow, the Deans of the Faculties of Medicine of Glasgow and Edinburgh Universities, and Dr. Ailsa Mackintosh, Dean of Medicine of Aberdeen University, Drs. J. C. McVail, J. R. Carrie, J. Stevens, and Norman Walker (Convenor). Apologies for absence were read from Drs. J. Playfair, J. K. Hamilton, J. Gordon and J. Johnson. The Committee reported that there had been numerous applications to the Committee for assistance in procuring locums, and many offers of service from practitioners retired or temporarily unemployed. Though they had not been able to provide direct supply in all cases, the influence of the Committee had been of considerable value in promoting arrangements for the carrying on of the work of the men on service, while the recommendations of the Committee should be the maximum fee charged to men serving with the colours had apparently been loyally accepted. From several communications he had received it was evident that the financial arrangements made with the members named and their neighbours who were doing their work were not always satisfactory; and, indeed, in many cases no arrangements at all had been made. It was remitted to a sub-committee to consider whether it would be advisable to issue a statement of principles applicable to different varieties of practice which might help in averting difficulties which might arise and to advise on any cases of immediate difficulty brought under the notice of the Committee.

It being evident that more men would before long be called out, the Committee decided to make a fresh appeal for assistance to medical men and women who
were in a position to help. A suggestion that the Convener should address a meeting or meetings on the work of the Committee was approved.

SCOTTISH HOSPITAL UNIT FOR SERBIA.

Since the outbreak of the war the energies of the National Union of Suffrage Societies have been devoted to the amelioration of the sufferings of the wounded in the East by the establishment of a fund. This fund, the National War Hospitals in Scotland organised the Scottish Women's Hospital for Foreign Service, and in this scheme the English section has zealously joined. Already one unit and a detachment have gone to France, and on Sunday, Dec. 11th the Scottish members of the Serbian unit left Edinburgh. In the Serbian Hospital Unit, which is destined for Uskaf, the personnel consists of 32 members of whom 22 are Scottish. The medical and surgical staff consist of Dr. Reid (Glasgow), Dr. MacPhail (Glasgow), and Dr. Wakefield (Kendal). The Matron is Miss M. A. Macdonald (Esbank, Midlothian). Of the rest of the staff, consisting of nurses, dressers, a radiographer, and servants, all are women except the director and orderly.

ABERDEEN UNIVERSITY.

A gift of £4,000 has been intimated to the University from Mr. George Sterling Yuill, to constitute a fund which shall be devoted to the practical application of the science and art of chemistry to the manufactures and industries of Great Britain.

A GENERAL HOSPITAL IN THE FIELD.

In writing home, Dr. J. C. Pyper, who was assistant to Dr. Roxburgh, Troon, Ayrshire, gives the following account of what a general hospital in the field is like. It is of canvas, he says, and, when erected, it occupies a very large field. It is complete in itself, with X-rays apparatus and operating theatre, and it comprises a medical and a surgical division. It contains from 500 to 500 beds, and the working and feeding arrangements are really the material of a large town. The heating of the whole is calculated to an ounce, and there is no wastage. All the cooking is done in field kitchens, which contain ovens, stoves and boilers. The sanitary arrangements are also very complete. The staff consists of a Lieut.-Colonel, one Major, 18 Lieutenants, and a Quartermaster. There are also a matron and 30 nurses, and a good number of R.A.M.C.'s who act as nursing ordnance, wardmasters, and sanitary officers. The capacity of the hospital is in batches of 100 or so. The great majority of the wounds are slight, chiefly from shell and shrapnel.

NEW GLASGOW HOSPITAL.

The North British Locomotive Company have provided premises to be used as a hospital in the administrative building of their works in Springburn, and have made a substantial gift towards the cost of the building. The Scottish branch of the Red Cross Society has supplied the equipment. There is accommodation for 153 patients. At the end of one of the three wards of which the hospital consists is a screened-off portion for serious cases, and near it is a large strong room which has been converted into an X-ray room. At the opening inspection of the hospital, Sir Hector Cameron, Dr. Hugh Reid, Dr. J. Maxtone Thom, and Dr. Rowan addressed the assembled guests.

PROHIBITION IN AMERICA.

Mr. W. J. Reid, president at the annual meeting last week of the Glasgow Branch of the Medical Temperance Association held in the Faculty Hall. He gave an address regarding prohibition in America, showing that the English punishment of prohibition in towns had added to their amenity, increased the comfort of their inhabitants, and had resulted in parents being anxious to have their sons educated at their universities. It had come under his knowledge that it was only under the threat of prohibition that homes could be obtained surreptitiously. In Kansas, a state containing 105 counties, which had enjoyed prohibition for 12 years, the law against alcohol was being enforced as strictly as any other. As to the effect of prohibition, Dr. Reid had never heard it said, during his travels in the United States, that it had done any harm, and he had heard testimonies from both abstainers and non-abstainers in favour of it. For the ensuing year Dr. Reid was elected President; Dr. Murdoch Cameron, Mr. Donald MacPhail, and T. K. Monro Vice-Presidents; Dr. Thomas Holmes, Hon. Treasurer; and Dr. John H. Martin, Secretary.

MEDICAL CASES FROM THE FRONT.

Of the 100 British disabled soldiers constituting the latest arrival at Stobhill Hospital, Glasgow, from the seat of war, nearly 100 are suffering from some form of trench fever. The majority of the others are cases of frost-bite. This state of matters shows the hardships which the troops are enduring in the trenches. Most of these 100 men belong to English regiments.

GOURMANDS OR NON-COMBATANTS?

On a point which was mooted in this column some time ago medical students have now received some guidance. Sir Donald Macalister, in his recent presidential address to the General Medical Council, expressed the opinion that the need for efficient physicians and surgeons in the field and at home was not less urgent than the need for efficient soldiers and sailors, and that he had felt it his duty to press this consideration on senior students who, though they had nearly completed their curriculum, were ready to forego the prospect of early qualification to enrol themselves straightway in the combatant forces. Sir Donald has since received a letter from Surgeon-General Sir Alfred Keogh, who says that he agrees that the senior student is best fulfilling his duty by getting his degree and remaining at home. But he adds that the need for young qualified men will become great, and he should regret if the supply were diminished.

LETTERS TO THE EDITOR.

[We do not hold ourselves responsible for the opinions expressed by our Correspondents.]

THE DUTY OF SENIOR MEDICAL STUDENTS IN THE WAR.

To the Editor of THE MEDICAL PRESS and CIRCULAR.

Sir,—In my Presidential Address to the General Medical Council on November 24th I expressed the opinion that “the need for efficient physicians and surgeons, in the field and at home, is not less urgent than the need for efficient soldiers and sailors.” I added that I had felt it my duty to press this consideration on senior students who, though they have nearly completed their curriculum, are ready to forego the prospect of early qualification to enrol themselves straightway in the combatant forces.”

Today I have received a letter from Surgeon-General Sir Alfred Keogh, which contains the following passage:—“I think with you that the senior student is best fulfilling his duty by getting his degree, and then joining the Army. The need for young qualified men will become great, and I should regret that the supply should be diminished.”

As daily receive letters from senior students and their parents, who desire guidance in their choice of apparently conflicting duties, I shall be grateful if you will make known the opinion held at the War Office on the subject.

I am, Sir, yours truly,

DONALD MACALISTER,
President of the General Medical Council.
Medical Council Office,
290 Oxford Street, London,
December 10th, 1914.

ARTERIAL HYPEREMIA.

To the Editor of THE MEDICAL PRESS and CIRCULAR.

Sir,—I am long acquainted with the many excellent papers that have appeared in your valuable journal recently especially appeal to me. The first by Dr. Heys, October 21st, 1914, on “Arterial Hyperemia,” is, in my opinion, a good and important clinical record. I agree with him, there is a very distinct difference between the hyperemia produced by constriction and vacuum cups, etc., and that procured by heat. In the
CORRESPONDENCE.

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nerve the these is part; mechanisms in injury, counter-irritation have

inflammation, much as in splendid working order, need to answer promptly and vigorously to the stimulus provided by the hot air. He admits that some of his cases do not respond well to hot air treat-

ment. It is positively harmful to apply heat to diseased areas in some feebile people such as advanced and debilitated cases of arthritis deformans, since these people are saturated with toxins and all their mechanisms are feeble, therefore if hyperaemia is pro-

duced there is a rush of toxins to the part that may seriously deteriorate the already degenerate tissues.

Some people do not know that I have advocated the employment of long continued counter-irritation pushed to the extent of causing a raw surface such as is produced by means of a blister or the actual canthery, and multiple acupuncture followed by a condition which causes an eruption of pustules. There is no danger in treating feeble, degenerate people by these means if a reasonable amount of care is exercised since an outlet is provided, and the toxins are extruded and prevented from damaging the tissues.

The other paper is that by Dr. Horne Wilson on "The Rapid Arrest of Inflammation," December 6th, 1814. It seems to me there is much in this that throws light on the phenomena of counter-irritation and re-

action.

I am, Sir, yours truly,

W. J. MIDDLETON.

12 Charminster Road, Bournemouth, December 10th, 1814.

OPERATIONS FOR APPENDICITIS.

To the Editor of The Medical Press and Circular.

Sir,—"Physician's" letter is a little astonishing. If there is any fact in the practice of surgery that is demonstrated it is this fact that a physician is absolutely useless in cases of acute appendicitis, and of very little use in the chronic phases of that malady. Some few months ago you conferred upon me the privilege of reviewing the recently published book on "Appendicitis," by Mr. Edmund Owen. I would commend this work to the study of a "Physician," and would beg him after its perusal to inform your readers whether he continues to hold his prisoner to the facts or whether his diagnosis of appendicitis are comparatively very few; in some of these it is better to operate than to wait developments; whilst the fatal results of delay in cases where the nature of the trouble is clear are indisputable. In the young the operation for appendicitis, when performed at the proper time—i.e., when the inflammation is not virulently acute, can hardly be deemed dangerous. The danger of delay increases with the age of the patient.

I am, Sir, yours truly,

December 10th, 1814.

REVIEWER.

IRISH CHEMISTS.

To the Editor of The Medical Press and Circular.

Sir,—With your permission, I would draw attention to the very important part played by Irish chemists in the latter decades of the eighteenth century and the opening ones of the nineteenth. Their work has a direct bearing on the history of constitution and synthetic products, but I am sorry to say that their names are almost forgotten and their writings almost unknown. As an Irishman, I deeply regret this, and all the more so as I find German chemists are credited with the initiative in this great and fascinating branch of organic chemistry.

We may, I think, date the solutions of the problems which had exercised the ingenuity of Berzelius, Dumas, Laurent, Regnault, Malaguti, and other chemists of the early years of the nineteenth, on the analysis of white precipitate powder by Dr. Robert Kane, Lecturer on Chemistry to the Apothecaries' Hall of Medicine about the year 1814. Guesses at the truth were from time to time made, and Dupuytren formally in his empirical "Pathology" had hinted that Grenel had adopted Laurent's theory of chemical constitution. I need not enter into the details of the many theories advocated in the beginning of the last century, of which the copulated ammonias, as they were called, received the support of Liebig. Kane's work was slow in producing fruit, but gradually, very slowly, it came to be recognised as the proper solution of the problem; and Gerhardt's theory came to be considered the only empirical "Pathology." We rediscovered benzene these researches in organic chemistry had been made. When, however, the aniline dyes were produced England was engaged too largely in the iron, cotton and woollen industries to give a thought to synthetic medicinal or colouring chemicals; and some years after the discovery of benzene no German that medical men came to believe that to Germans we were indebted for the introduction of synthetic medicines. Kane, on assuming the position of Lecturer to the Apothecaries' Hall, had the good fortune to be placed in the highest position of the school. He was immediately preceded by Donovan, whose "Annals of Pharmacy" shows him to have been both as a practical and theoretical chemist in advance of his day. He succeeded Davy, whose many and valuable papers in the "Philosophical Transactions" show that his F.R.S. was the reward of merit. He was the successor to William Higgins, of European repute. Immediately on receiving their charter in 1741, the Governors of the Apothecaries' Hall invited the latter whose was then with Dr. Beddoes in Birmingham, to accept the position of Chemist and Lecturer on Chemistry to their School and Hall. Two years earlier appeared his great work, "A Comparative View of the Phlogistic and Antiphlogistic Theories," in which he clearly annunciated the law of multiple proportions, thus anticipating Dalton's "Experiments and Observations" of 1802. He retired from the Lectureship in 1796 to become Chemist and Librarian to the Royal Dublin Society.

On June 12th, 1806, he was elected F.R.S., but he never presented himself for admission. Some eight years later he brought under the notice of his friend, Dr. Labatt, the antiseptic properties of chlorinated lime, and recommended its use in midwifery cases in the Rotunda Hospital (of which Labatt was then the Master) should be required to wash their hands before attending the patient. And the stamping out of the epidemic of scarlet fever in the hospitals in the second half of 1820 may be ascribed to Higgins. Unfortunately, the nurses did not accurately follow instructions, and chlorinated lime was discredited until its value was rediscovered by Semmelweis in May, 1847.

I am, Sir, yours truly,

George Boy.

Dublin, December 11th, 1814.

THE STUDENT'S TRAINING.

To the Editor of The Medical Press and Circular.

Sir,—If "Tom A. Hawke, M.D.," had read my last letter with any care before hastening to reply, he would have seen that I do not advocate the banish-
PHYSIOLOGICAL PRINCIPLES IN TREATMENT.

We are not surprised to find that a third edition of this attractive little work has been called for. It presents current physiological views in unofficial garb and gives their bearings on the treatment of disease in an eminently assimilable literary form. Incidently some therapeutic dogmas undergo the process of conversion into "exploded ideas," and some very startling innovations are introduced to our notice—witness the scathing indictment of ergot and other psychotherapeutic nostrums in the treatment of haemoptysis, and the indications for the exactly opposite treatment—viz., by means of vaso-dilators.

To begin with, the reader is familiarised with the trend of organo-therapy; he is told what it has already achieved and what it may reasonably be hoped to achieve, and the mechanism by which it acts. Light is shed upon the extraordinary delicacy and intricacy of the digestive secretory apparatus, the investigation of which by physiologists suggests blacksmiths taking watches to pieces with pincers.

There is nothing systematic about the book; the author saunters along, picking up a subject here and criticism there, now discussing the mechanical factors in investigation, now the results of his own experiments. But whatever topic he touches he illuminates, and no practitioner can peruse the book without adding materially to his value as a therapist.

Just a word of criticism. The author's English is a trifle sloppy; slipshod for a text when he refers to "Plombieres' douche" (page 283); the "this is contrary," etc. (page 202, line 9); the "bowels should be opened in between" : "an excess of carbohydrates are bad," etc., (147), and so on. Then, too, he speaks of "cafein" instead of caffeine, and of minimus of blood-pressure (290), and on page 342 he refers to a faintness "that any patient is subject to"—truly an extraordinary example of slipshod English. He refers to grammes and grains in consecutive lines, as on page 200, where we are told that 250 grains of urea...would represent an intake of about 50 grammes of protein," etc. Then, too, he speaks of purin ingestion in grains per pound and of purin excretion in fractions of grammes (page 155 et seq).

SIR JOHN FRENCH. (6)

Until the other day, strange to say, there was no biographical sketch of Marshal Sir John French on the market. It was almost impossible, indeed, to obtain any information as to past career or the brilliant qualities of the British Commander in the field. Now, however, Mr. Cecil Chisholm has supplied the deficiency with a little book, "Sir John French: An Authentic Biography" (Herbert Jenkins, 18s. net). In terse and vivid language he tells the story of Sir John French's life, from his early days in the Navy, how many people know that he was once a midshipman? to his most recent exploits. There are interesting chapters devoted to Sir John's reforms at Aldershot in recent years and to his theory of cavalry. Quite obviously the writer has been assisted by near friends of the Field Marshal and by military experts of the highest rank. Field-Marshal Sir Evelyn Wood writes a breezy preface; and the book's frontispiece is a typical pen portrait of Sir John from the pencil of Mr. J. R. L. French. This little book is an opportunity; it is admirably written, and should command a large sale throughout the British Empire.

DR. F. B. COLLINGS, of Barnsley, is to be congratulated upon his plucky rescue of a woman and her boy who had fallen into the canal in the Smithies district. Without divesting himself of his clothes, Dr. Collings jumped into the water and succeeded in bringing both victims to the bank.

(6) "Physiological Principles in Treatment," by W. Langdon Brown, M.A., M.D., F.R.C.P., Assistant Physician to St. Bartholomew's Hospital, etc. London: Ballière, Tindall and Cox. Price 8s. 6d.

**EDINBURGH AND BELGIAN MEDICAL RELIEF.**

A most successful and enthusiastic meeting was held in the Obstetrical Society's Rooms at Edinburgh on the evening of last Thursday, under the Presidency of Sir J. Halliday Crichton-Stuart.

Preceding the meeting a dinner was given by the President, Prof. Jacobs, of Brussels, being the guest of the evening.

At the meeting Sir Halliday Crichton introduced Prof. Jacobs, who gave a most striking address, illustrated by lantern slides, to a greatly interested audience. Quite distinct from all ordinary subscriptions the meeting itself subscribed spontaneously one hundred and fifty pounds, which were presented to an appeal by Prof. Jacobs by the President. A cordial vote of thanks to Prof. Jacobs was most felicitously proposed by Sir Alexander Simpson, and seconded by Sir James Anlук.

The money subscribed at the meeting is quite independent of the fund promoted by the Royal Colleges of Physicians and Surgeons of Edinburgh, which will be raised by the profession. It was a purely spontaneous gift to be administered as Prof. Jacobs considers best at the present time.

**THE ROYAL SURGICAL AID SOCIETY.**

The annual meeting of the Royal Surgical Aid Society was held last week at the Mansion House under the Presidency of the Lord Mayor. It was reported that during the fifty years of the Society's work no fewer than 80,606 appliances had been distributed. The Chief Rabbi said that the poor soldier who had lost a limb and had become crippled for life in the interests of his country had a right to demand not charity but justice in the same way that poor crippled children had a right to demand help whether in the form of an artificial limb or surgical aid, which would enable their pathway through life to be less hard, less grievous, and less bitter. A sum of £3,38 was collected at the meeting. A vote of thanks was given to Sir Frederick Treves upon relinquishing the post of hon. consulting surgeon after ten years' service.

**THE NATIONAL INSURANCE ACT.**

It is announced that on and after January 1st next certain new arrangements in respect of the certificates for medical benefit under the Insurance Act will come into operation.

The scheme has been framed by the National Insurance Commissioners after consultation with members of the medical profession and representatives of approved societies of all types. It imposes for the first time a uniform procedure on all panel practitioners.

The form of certificate for "declaring on" the fund will be obtainable thereafter not from the approved society, but from the panel doctor, to whom application should be made on the first day the insured patient becomes incapable of work. Afterwards an intermediate certificate will be issued by the medical attendant weekly. A final certificate will be issued the day before the patient is ready to go to work.

**BONUS DOCTOR SENTENCED.**

The trial took place last week at the Central Criminal Court, before the Recorder, of John Cubbin, who pleaded "Guilty" to indictments charging him with giving false death certificates and with committing perjury at three inquests.

For the prosecution it was stated that the death certificates were signed by the prisoner in the name of Harrison, describing himself as "M.R.C.S., and L.R.C.P." In 1899 the prisoner was convicted of giving a false medical certificate, and he was on subsequent dates sentenced to various terms of imprisonment, including five years' penal servitude for bigamy in 1903 and five years for a similar offence in 1908. In the name of "Dr. Munro," Cubbin, who had had some medical training, became assistant to a doctor in London, but he left that employment, and in January last walked into the dispensary of Dr. Allen, in Bethnal Green, stating that he was Surgeon-Major Harrison and that he was engaged at the War Office in examining recruits. The prisoner offered his services as assistant to Dr. Allen, who believed that the prisoner was a registered medical practitioner, and engaged him as assistant. The prisoner later pretended that he had inherited a baronetcy and had vending cards, bearing the names of Sir, Surgeon-Major, and D.S.O. It was only later to the prisoner to say that he treated the patients with skill.

In defence the prisoner expressed his sorrow, and observed, "I hope you will realise the little plant of virtue that was in my breast." He had had medical training at Montreal and Vienna and he had a reputation for skill and kindness among the poor in Bethnal Green, which would continue to live after his body had crumpled away. There was some good in him which was ready to burst into flame if he was given another chance.

Dr. Allen, in reply to the Recorder, said the patients spoke well of the prisoner and there were no complaints about him. In his opinion, the prisoner perverted the cause of verity. The prisoner came to the surgery in the evenings.

In sentencing the prisoner to three years' penal servitude, the Recorder observed that he was a very dangerous man.

**ROYAL COLLEGE OF SURGEONS IN ENGLAND—BRADSHAW LECTURE.**

The Bradshaw Lecture will be delivered in the Theatre of the College by Sir Frederic Eve, F.R.C.S., on Tuesday, December 15th, at 5 p.m. precisely. The subject of the lecture will be "Acute Haemorhagic Pancreatitis, with remarks on the Etiology of Chronic Pancreatitis." Fellows and Members of the College are invited to attend. Students and others who are not Fellows or Members of the College, will be admitted on presentation of their private visiting cards.

**UNIVERSITY OF LONDON.**

The Paul Philip Reitlinger Prize, offered this year for an essay embodying the result of research work on a medical subject, has been awarded to Alfred Hope Gose, M.A., M.B. (Cumb.), M.R.C.P., London Hospital Medical College, for an essay on "The Heart in Acute Rheumatism, with special reference to Graphic Methods of Investigation." The prize, this year of the value of £100, was founded with funds given to the University by Mr. Albert Reitlinger, in memory of his son, a student of St. George's Hospital Medical School, who died on December 3rd, 1914. Next year the prize will be offered for the best essay on "The Economic Condition of the People of England in 1815, in comparison with the present day."

**UNIVERSITY OF OXFORD.**

In a Congregation held on December 12th, the following degrees were conferred:—B.M.—F. W. Browne, Wadham; W. Brown, Christ Church, H. G. Morris, University; G. A. Malin and G. S. Robinson, Exeter; B. E. Walls, Lincoln; V. T. Ellwood, Pembroke; G. C. H. Carty, University; H. John's; L. R. Broster, Trinity; F. C. Gladstone, Pembroke; H. M. Pope, Lincoln (in absence).

**UNIVERSITY OF CAMBRIDGE.**

At a Congregation held on December 11th the following degrees were conferred:—M.B.—H. H. Hindridge, King's; C. R. A. Thacker, Downing.

**THE UNIVERSITY OF SHEFFIELD.**

The Connex, at its meeting last week, made the following appointments:—William MacAdam, M.A., M.D., B.Sc. Glas., D.P.H. Cam., to the post of Demonstrator in Public Health; T. Chetwood, M.B. Lond., D.P.H. Oxon., M.R.C.S., L.R.C.P., to the post of Lecturer on Hygiene in the Training Department;
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H. B. Leighton, A.R.I.B.A., to the post of Junior Lecturer and Demonstrator in the Department of Architecture.

Dublin University.

The following candidates have passed the Preliminary Scientific Examinations in the School of Phy sic (Trinity College):—Botany and Zoology—Mary C. Sheppard, William A. C. Dowse, John H. B. Murphy, Henry Maxwell, Johannes T. Mynhart, George Malone, Jessie Gillan.


Final Dental (B. Dent Sc.).—Herbert Wight. *Equal.

Royal College of Surgeons of England.

At a meeting of the Council of the Royal College of Surgeons last week, with Sir Watson Cheyne, President, in the chair, the following members, having passed acquired examinations and the by-laws, were admitted Fellows of the College:—J. H. Barclay, M.B., L.R.C.P., London Hospital; G. W. Beresford, L.R.C.P., London Hospital; R. M. de Mowbray, L.R.C.P., St. Thomas's; P. G. Doyle, B.A. Oxon, M.R.C.S., London Hospital and St. Thomas's; R. N. Geach, L.R.C.P., St. Bartholomew's; B. R. Howell, M.B., L.R.C.P., St. Bartholomew's; D. W. Ilume, M.B., L.R.C.P., St. Bartholomew's; W. T. Noon, L.R.C.P., St. Bartholomew's. The following successful candidate, not being a member, was also admitted a Fellow:—D. Green, M.B., Sheffield University and St. Bartholomew's.

The following ladies were admitted members:—Misses M. K. Bevan, E. J. Johnson, and M. Woods, of the London School of Medicine for Women and the Royal Free Hospital.


The resolution passed at the recent meeting of Fellows and Members "affirming the desirability of admitting Members to direct representation on the Council" was considered. The Council expressed the opinion that as the matter referred to was considered by them in March last they could see no advantage in reopening the discussion at the present time.

Royal College of Surgeons in Ireland.

The following candidates have passed the undermentioned Examinations, November, 1914:—Primary Fellowship Examination.—Alice B. Chauce, Edward P. Leavy.

Final Fellowship Examination.—Arthur Chance.


Army Medical Service.

R.A.M.C.—To be temporary Lieut.-Colons:—Major A. E. J. Barker, F.R.C.S., 3rd London General Hospital, T.F. (November 14th); Sir Thomas Mylès, M.D., F.R.C.S.I. (November 21st); Sir Charles B. Ball, Bt., M.D., F.R.C.S.I., Chair, Sir W. A. Lane, Bt., M.D., F.R.C.S.I., and Surgeon, Sir W. L. Southern (November 22nd); Major Sir Frederick S. Eve, Knt., F.R.C.S., and London General Hospital, T.F., Major J. Swain, M.D., F.R.C.S., and Southern General Hospital, T.F. (December 18th); Major W. A. Turner, M.D., 4th London General Hospital, T.F. (November 3rd).


Mr. Alexander Miles, F.R.C.S., Lecturer on Clinical Surgery in the University of Edinburgh and surgeon at the Royal Infirmary of Edinburgh, and Mr. Thomas Rankine, having volunteered for the Edinburgh and Border Hospitals, here, the latter taking with him his X-ray apparatus.

The wounded soldiers and sailors in our hospitals are in need of new laid eggs, and to meet the demand, which amounts to over 100,000 per week, a national egg collection has been instituted, with the approval and support of the War Office. All promises of eggs or money should be sent to the hon. secretary, Mr. R. J. Durandall, 134, Fleet Street, London, E.C.
NOTICES TO CORRESPONDENTS.

Correspondents requiring a reply in this column are particularly requested to make use of a Distinctive Signature or Initial, and to avoid the practice of signing themselves "Reader," "Subscriber," "Old Subscriber," etc. Much confusion will be spared and attention directed to this rule.

SUBSCRIPTION.

Subscriptions may commence at any date, but the two volumes each year begin on January 1st and July 1st respectively. Applications for single numbers; post free at home or abroad, 1s. 6d. Foreign subscriptions must be paid in advance. For India, Mexico, China, Japan, South Africa, and our other countries, appointments of agents. Indian subscriptions are Rs. 15. Messrs. Dawson and Sons are our special agents for Canada. For South Africa and other parts of the Union, Messrs. Geo. Robertson and Co., of Sydney and Melbourne, are our special agents for Australia.

Correspondence is only requested to send their communications, if resident in England or the Colonies, to the Editor at the London office, 6, Henrietta Street, Strand; if resident in Ireland to the Dublin office, in order to save time in forwarding from office to office. When sending subscriptions the same rule applies as to office; these should be addressed to the Publisher.

REPRINTS—Reprints of articles appearing in this Journal may be had at a reduced rate, providing authors give notice to the publisher or printer before the type has been distributed. This should be done when returning proofs.

M. LLOYD. (Salford).—According to the last medical directory, there is an increase of 322 names in the number of registered practitioners over 1913 in New York, New Jersey and Connecticut.

CALENDARS FOR 1915.

A new and attractive calendar for 1915 has been issued by Messrs. F. L. Comber & Co., 67, Ludgate Circus, E.C. A few copies are available for the benefit of the medical profession. Each copy will attract attention, and no one should be without it.

CORRESPONDENTS.

NOTICES TO CORRESPONDENTS.

WEDNESDAY, DECEMBER 16TH.

ROYAL SOCIETY OF MEDICINE (SECTION OF THE HISTORY OF MEDICINE) (Wimpole Street, W., 2)—3 p.m.: Papers by Mr. George Pemberton; "A Seventeenth Century Medical Superintendence;" Mr. C. J. S. Thompson; "The Apothecary in England from the Fifteenth to the Eighteenth Century.

ROYAL MICROSCOPICAL SOCIETY (26 Honson Square, W.), 2 p.m.: Paper—Mr. J. E. Bernard: "X Rays in Relation to Microscopy."

THURSDAY, DECEMBER 17TH.

ROYAL SOCIETY OF MEDICINE (SECTION OF THE HISTORY OF MEDICINE) (Wimpole Street, W.)—3 p.m.: Papers by Dr. George Pemberton; "A Seventeenth Century Medical Superintendence;" Mr. C. J. S. Thompson; "The Apothecary in England from the Fifteenth to the Eighteenth Century.

ROYAL MICROSCOPICAL SOCIETY (26 Honson Square, W.), 2 p.m.: Paper—Mr. J. E. Bernard: "X Rays in Relation to Microscopy."

FRIDAY, DECEMBER 18TH.

SOCIETY OF TROPICAL MEDICINE AND HYGIENE (11 Chandos Street, Cavendish Square, W.),—3.30 p.m.: Paper—Dr. A. Ballance: "Tropical Problems in the New World" (illustrated by slides).

Vacancies.

Children's Hospital, Dublin,—Assistant Surgeon. Immediate application to the Hon. Secretary. (See adv.)

Certification.—The British Association of Certifiers of Factories announces the following vacant appointments:—Craw (Lincoln), Dr. John Fell; Cooper (Grimsby), Dr. A. Ditchford; Lambeth General and Fever Hospital.—House Surgeon. Salary £155 per annum, with board, washing, and attendance. Applications to the Hon. Secretary. (See adv.)

City of Westminster Union.—Second Assistant Medical Officer. Salary £100 per annum, with board, residence, and attendance. Applications to the Hon. Secretary. (See adv.)

City of Westminster Union.—Third Assistant Medical Officer. Salary £100 per annum, with board, residence, and washing. Applications to the Medical Superintendent.

City of Birmingham.—Assistant Resident Medical Officer. Salary £120 per annum, with board and residence. Applications to the Medical Officer, Council House, Hill Street, Birmingham.

Durenh Industrial Colony for the Feble-Minded, Driffield, Kent.—Third Assistant Medical Officer. Salary £250 per annum, with board, lodging, and washing. Applications to the Clerk to the Metropolitan Asylums Board, Embankment, Westminster, London W.C. 2.

West Sussex County Mental Hospital, Chichester.—Second Assistant Medical Officer. Salary £150 per annum, with board, washing, and attendance. Applications, stating qualifications, to the Medical Superintendent.

National Maternity Hospital.—Assistant Master. Salary £25 per annum. Applications to the Secretary. (See adv.)

Appointments.

Dillon, FREDERICK, M.B., Ch.B.Edin., Clinical Assistant at the West End Hospital for Diseases of the Nervous System, Field, On Medical Staff, Curative Society under the Factory and Workshops Acts for the Battersea District of the Westminster Division of the Metropolitan Asylums Board, to succeed Mr. H. H. H. Gordon, who retires January 1st, 1915.

GILLIAND, HANS, M.B.Edin., Medical Superintendent of the Whitnash Sanatorium, Biggleswade, Beds.

MACKAY, CHARLES, M.B., Ch.B., D.P.H., Lecturer in Tropical Medicine, University of Liverpool, to succeed Mr. D. N. Gurr, who retires January 1st, 1915.

WALKER, EDWARD, M.B., Ch.B., C.Med., Resident Medical Officer to the District Hospital, Ulverston.

Srithees.

SHEPPARD.—On December 21st, at 60 Manchester Square, W., the wife of A. E. Betsy, F.R.C.S., of a son.

BOWEN.—On Saturday, December 5th, at Viewfield, Stretton, near Burton-on-Trent, the wife of H. B. Brown, M.D., of a daughter.

BIBBY.—On December 3rd, at Little Kimble, the wife of L. T. Bibby, of a son.

CAMPBELL.—On December 1st, at 8 Rutland Square, Edinburgh, the wife of Rev. John Patrick Campbell, M.D., of a daughter.

DILLON.—On December 6th, at Amritsar, Punjab, wife of Rev. G. Brockschild Dillon, M.D., of a daughter.

ETO.—On December 7th, at 22 Church Street, Kidderminster, the wife of Provost E. W. Pendergrove, M.D., of a daughter.

NAVIER.—On December 9th, at Jhansi, Central Provinces, India, the wife of Captain A. Harper Naviar, I.M.—of a son.

Marriages.

COLBATCH CLARKE.—DUMB—On December 10th, at St. Lawrence's Church, Avoca, Co. Carlow, C. O. Colbath Clarke, M.R.C.S., L.R.C.P., of Wellington, Hereford, and younger son of John Colbath Clarke, of Brighton, to Florence Wrinfield, eldest daughter of the late Frederick Walter Dudding and Mrs. Dudding, of Dayehouse, Ipswich.

COOPER.—FINN.—On December 10th, by licence, at the Congregational Church, Purley, Evelyn Ashley Cooper, daughter of the late Henry Cooper, of Shildon, to John Edward Finn, of a daughter of Thomas Angel of Bladone, Croydon.

MARKWICK.—CLARKE.—On December 9th, at Christ Church, Dalkeith, Colombo, Dr. Philip Walter Markwick, eldest son of Mr. Walter W. Markwick, of Cad Mont le Grand, Exeter, to Miss Mary Markwick, daughter of Mrs. Grant Cook, of Arica, Deihibalu, Colombo.

SIMPSON.—BROWN.—On December 12th, very quietly, at St. George's Church, Sheerness, Alexander Simpson, Surgeon, Royal Navy, eldest son of Alexander Simpson, Surgeon, Royal Navy, secretary, second son of Mr. and Mrs. Henry Polge, of Shadwell, Croydon.

SUTCLIFFE.—FITZGERALD.—On December 21st, very quietly, at St. Mary's Church, Sheerness, Alexander Sutcliffe, Surgeon, Royal Navy, eldest son of Alexander Sutcliffe, Surgeon, Royal Navy, secretary, second son of Mr. and Mrs. Henry Polge, of Shadwell, Croydon.

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DEATHS.

BAY—On December 8th, at Shrewsbury, Capt. Henry Michael Bay, R.A.M.C., of Bodmin, Cornwall, eldest son of Mr. and Mrs. Henry Michael Bay, of Bodmin, Cornwall.

HARRIS.—On December 11th, at Shakin, Deputy Surgeon-General William Henry Harris, late I.M.S., of Madras, in the 51st year of his age.

HILLIARD.—On December 6th, in his 71st year, Henry Charles Hilliard, M.D., of White Hill, Blechingley, Surrey, eldest son of Mr. and Mrs. Henry Charles Hilliard, of White Hill, Blechingley, Surrey.

MORRISON.—On December 5th, at Earlscote, Tavistock, James Earl Morrison, F.R.C.S., aged 53 years.


The Medical Press and Circular

"SALUS POPULI SUPREMA LEX"


Notes and Comments.

The German warship raid last week

Heroic German

on Hartlepool, Scarborough and

Bombardment! Whiby has brought home to us the

realities of war. The attack on these towns was made with

warning, and has resulted in a loss so far of 122

killed and 549 injured. It constitutes another of

the gross violations of the law of civilised warfare

formulated by the Hague Convention. Of the 122

killed only six were combatants, a fact that in

itself constitutes an enduring disgrace to the

methods adopted by the Germans in the present

war. The injuries inflicted in this bombardment

were due either to shells or indirectly to débris

from falling houses and explosions. Many

persons were killed in their houses, some of them

sitting at breakfast. It sounds like the account of

some terrible attack of bloodthirsty savages when

we hear of a young woman walking along the

esplanade of an English seaside resort being sud-

denly struck with a shell, and dying of hemor-

rhage before she could be assisted to the house of a

medical man. With scathing irony the Daily Sketch

has pictured the Kaiser in the centre of a number

of the babies and children killed by his warships,

and has appended the name and age of each

victim. A document of that kind would more than

vindicate the action of the Allies in opposing

blind and brutal aggressive force amongst the

nations of Europe. Even in the face of so gross

an outrage, it is difficult to imagine the British

troops treating German non-combatants in a

similar fashion. At the same time, it will not

soften the rigours of settlement that will be

enforced upon Germany in the day of reckoning.

The recent deaths from amylose

Bethlem Royal

hydrate at Bethlem Royal Hospital,

have naturally drawn attention to the

constitution and management of that

body. At one of the inquests

held upon the six persons who died as the result

of misadventure the jury commented strongly on

the fact that there was no qualified dispenser

attacked to the Institution, so that the dispensing

fell on members of the medical staff. Reference

shows that in 1911 there were 473 patients, some

of whom paid two guineas a week. The receipts

for the same year amounted to £31,000, so that

the lack of a dispenser is, presumably, not due to

motive of enforced economy. The Bethlem

Royal Hospital was founded in 1246, and was

granted a charter by Henry VIII. This ancient

charity is administered by the Corporation of

London, and it would be of interest to know on

what authority charges are made to patients, and

as to the precise number of paying patients

admitted yearly. In Fry's "Guide to the London

Charities" the avowed objects of the Institution

are set forth as follows:—"For the care of per-

sons of unsound mind likely to be cured within one

year, and who are not fit objects for a county

lunatic asylum. Preference given to patients of

the educated classes." The charity is clearly the

birthright of the citizens of London, and it would

be interesting to learn on what grounds and to

what extent the terms of the original foundation

and the original charter have been modified. Per-

haps the London County Council might take steps

to investigate the relation of this ancient and

famous hospital to the insane of London. The

man in the street will naturally ask why a hospital

founded for the poor should be used by the well-

do. The Charity Commissioners might, perhaps,

be induced to inquire into the administrative

methods of this hospital, which in any case would

do well to publish a full statement in order to

restore public confidence in its efficiency. Possibly,

however, the original foundation and the charter

provide for the admission of well-to-do and paying

patients, in which case the Corporation will dou-

ble less give the necessary explanation.

The General

Medical Council's Medical Council is drawn calling attention to

and the

Shortage of

Students.

Our correspondence columns contain

an important letter from the General

Medical Council. It is urged calling attention to

the serious shortage of medical

students. From official returns

obtained from the various medical

schools of the United Kingdom, it

appears that the aggregate number of medical

students now in active pursuance of their studies is

about 1,000 less than in the year 1913. This means,

of course, that within the next few years there will

be a considerable reduction in the number of quali-

fied medical men available for the medical service

of the community. The diminution now officially

announced is equivalent to a reduction of 25 per

cent, of the average number of qualified medical

practitioners annually added to the Register. This

deduction has arrived at from the added statement

that the average number removed every year from the

Register by death or otherwise has for some years

past been about 800. Although the war is respon-

sible for the greater part of the diminution of

students at the schools, it should be borne in mind

that the number of students has been falling for a

long time past, and it is just possible that this wave

of reduction may register a reaction against a

previously overcrowded profession, as well as

some feeling that the general conditions of the

medical world are in need of well-regulated reform

in order to bring them into line with those of other

learned professions. As to the immediate shortage,
LEADING ARTICLES.

GERMAN COMMERCIAL WARFARE AND SCIENCE.

A marked characteristic of most of our great British scientists is a happy blend of practical good sense with the more technical part of their work. That quality was conspicuously shown in a recent address given by Sir William Ramsay, F.R.S., to the Institute of Industry and Commerce. He pointed out that Germany had looked upon commerce as a war, to be pursued by brutal and unscrupulous methods rather than as an arrangement for mutual benefit. The war in which we are now engaged was, in fact, a war for the liberation of nations from unscrupulous and illegitimate commercial methods on the part of Germany—as well as for deliverance from the brutality of militarism and “Kultur.” “It is necessary to go further,” said Sir William, “just as the German State has shown itself to be no respecter of treaties, just as the leaders of the German Army have revealed themselves as breakers of every humane law; treacherous and deceitful, so long as they can gain their ends: so it is foolish not to be warned that the German nation, as a whole, is unworthy of trust; that commercial agreements are regarded by members of that nation as binding only so long as some advantage is to be gained by keeping to them, and that dishonesty is excusable if only it appears to lead to German prosperity.” This vigorous exposure comes with especial force from Sir William Ramsay, who, as Chairman of the Educational and Research Committee of the Institute, has already formed a Central Outside Committee, with a view of forming a curriculum for industrial scientific education. For this purpose a number of leading scientific and educational authorities have been called together. The main immediate points in view of the Institute are the standardisation of education, and the drafting of a curriculum of the above-mentioned kind. The movement is significant. It shows that the British mind is beginning to appreciate more accurately the value of science and of scientific training as an educational method. Germany has long since grasped the lesson that commercial progress is largely commensurate with national scientific standards. She has accordingly, as a State, spent large sums in the endowment of scientific research. Nor have the domineering selfishness of the German nation and the unscrupulous brutality of their commercial methods prevented them from reaping an extensive harvest in real science. In other words, she knows how to forge and to use sound weapons, as well as those that are unsound and treacherous. The tendency of the patient German mind is to acquire an ever-increasing mass of details, with the inevitable result of a tendency to invest isolated observations with the dignity of established generalisations. In the present war many of their preconceived notions as to military strategy have crumbled to dust when put to the test of actual practice. In a word, there appears to be some vital defect in the application of the vast range and brilliance of Germany’s organised scientific activities. Not long ago the nature of this defect was hinted at in a leading article in our columns, dealing with the attempted Germanisation of the London University. The keynote of our comments lay in the protest advanced against the too rigid adoption of German educational methods to the exclusion of the practical handling that has always been characteristic of our British practice, especially as regards the practical application and the practical direction of scientific work. A correspondent, well known in the London medical world, furnished us recently with a good illustration of German enterprise in the world-competition. It appears that a Japanese student applied to him with a view of coming under his tuition in certain advanced research work. A moderate fee was named and the matter remained in abeyance for some time. Then a letter came from the student saying he had made up his mind to
wait until the war was over, and then to go to Germany, where he could get all he wanted, free, gratis and for nothing. The letter, with its quaint phrasing, may be interesting to our readers if reproduced verbatim:—"Sir," it ran, "since I have seen you, I considered over again, and I came to the conclusion, that I can not pay so much money for my research, because I was intended to research in Germany, where we had nothing to pay for our studying. It would be better, therefore, to go back for Japan to spare my money for researching in Germany after the war or in Japan. And it is not because I want not, but because I am compelled. To inform this I am very sorry and I repeat my thanks.—Yours . . affectionate Dr. X. Y. Z." Germany is a nation that does nothing without an object, and a useful lesson might be learnt by considering carefully the policy that provides free scientific facilities not only for her own students, but for those of other nations.

**CURRENT TOPICS.**

**The Health of the Navy for 1913.**

The statistical report of the health of the Navy for 1913 has just been issued by the Admiralty. Many of the remarks, and also the whole of the appendix, which formerly contained original articles by the medical officers, have been omitted owing to the intended publication of a quarterly Naval Medical Journal, and also on account of the general mobilisation of the Navy on August 1st, 1914, at which date they were in course of compilation. It is satisfactory to note that the returns for the Total Force for the year 1913 show a continuous improvement in the general health of the Fleet as compared with the preceding five years. The case ratio and the average loss of service per man are lower than the corresponding ratios for the previous five years. The total number of cases of disease and injury entered in the sick list was 77,438, the average number of men sick daily being 5,018.17, both being a decrease upon the average for the previous quinquennium. The Mediterranean station shows the lowest sick rate, and the East Indies the highest. In connection with the latter it is interesting to note that eight cases of beri-beri were reported on board the *Perseus*, seven of which were in Europeans. The Medical Officer, Surgeon J. H. McDowell, states with regard to this outbreak that a few rats were found on the vessel. These were cleared out, the woodwork scrubbed, and a mongoose was purchased, but this animal became afflicted with paralysis a month after its arrival on board. It is suggested that beri-beri may possibly be a rat-transmitted disease. Tuberculosis and venereal diseases both show a decrease in case ratio and invaliding as compared with the average for the previous five years, the latter being highest in the China Station, and lowest among the Home Fleet. Local injuries are still responsible for the greater number of casualties, and diseases of the digestive system come next, of which tonsillitis forms the largest proportion. Typhoid fever claimed 59 victims among the Home Fleet, with 17 deaths, whilst the East Indies Station returned the highest number. We miss the interesting original papers at the end of the report, but no doubt these will appear in a subsequent issue.

**The Treatment of Hyperthyroidism.**

Goitre has always been an interesting condition, first to the patient who possesses it and also to the physician or surgeon who tries to cure it. Nobody likes to suffer from an ailment with so obvious an incidence, and the ways of treatment have been many and varied—so many and so varied that we may safely say that none has been entirely satisfactory. In the older days of medicine the cures often showed a touch of unsavoury mystery and odoriferous romance. A dead snake, or in milder cases, a sloughed snake's skin, wrapped round the neck was often used. The touch of a rope with which a man had been hanged, or of a piece of a badly treated criminal sometimes did the trick. The powdered mummy have often worked wonders. In the last twenty years we have more or less concentrated our attention on the thyroid gland. A surgeon used fresh thyroid gland and reported good results. When carefully analysing his cases afterwards he found that, owing to an error on the part of a butcher, he had been all the time administering thymus. He got his results all the same. Then parathyroid, epinephrin, and other glandular extracts, had some success and serums made from thyroidectomised animals. Recently it has been found that various nose and throat operations brought great relief of symptoms to many goitrous persons. In most of the cases hypertrophied turbinals were found and cauterised with entire success, but the removal of nasal polypi, and even of tonsils and adenoids, had a like favourable action. The truth seems to be that in many of these cases suggestion is the important factor. As long as the patient is convinced that he is going to be cured, improvement is likely to take place after the induction of the trusted treatment. The moral of all this is that we must investigate with increased care all procedures for the treatment of this condition. The accomplishment of sensational cures while a remedy is fashionable is not enough. We must employ the test of time as well, and this applies to surgical as well as to medical methods. And we must not forget that in many cases rest alone is followed by recovery.

**Doctors and Scoffers.**

Nearly everyone laughs at the doctor some time or other. The exasperations of cachexia usually recede, when the mocker is by the employment of perfect health and subside like a rippled Zepplin on the appearance of any of the thousand ills that we are proverbially supposed to inherit. Still, all the best people have done it from Molière to Bernhardi Shaw. And the profession survives. "Though sick and stones may break my bones, wounds will never hurt," or we should have perished from the first day of the religious war. And many of the scoffers are poor folk. The loudest laughers are the first to run to the consulting-room when a bodily twinge wipes the grin from their face, and, though they may subsequently boast that they neither follow the advice nor take the medicine, that does the doctor no harm. He has the laugh for once, provided that his ice has been paid. Molière disliked medicine, but loved doctors. "It is not them I blame," says he, "but their art." He would send for them when sick, and let them choose whether his broth was made with leeks or lettuce, or whether his drink was white wine or claret; and, in fact, tyrannise over him on any details that he considered unimportant. He claimed preference for the simple-woman over the apothecary, as he
deemed that her concoctions, at any rate, were harmless. Many of the scoffers suffer from a type of mind. They are the real anti-holies. If there is a society for something, some one is good and useful you will find them in the members' list. They object to wine, vaccination, tobacco, vivisection, street noises, and everything that conduces to the gaiety of nations. They love quacks. The impossible appeals to them as the only safe way. They like to think that they are in a minority, but to them the idea is comforting to be one of the elect. So they fatten the pill-makers and advertising agents. They would agree with Tertullian—if they had ever heard of him—when he said "Credo quia impossible."

The Subcutaneous Injection of Oxygen.

The resuscitating effects of oxygen gas when inhaled in conditions of respiratory embarrassment and cardiac failure are well known. The inhalation of pure oxygen appears to have no effect upon metabolism, for it merely reduces the rate of the heart and raises the blood-pressure. In the case of athletes and mountainers the gas abolishes shallow, hurried respiration, and prevents in a large measure the feeling of fatigue. It is two years ago since we published in our columns an investigation by Dr. Henry O. Howitt on the subcutaneous injection of oxygen, which was to be preferred in some cases to the older method of inhalation. In our present issue appears another article by Dr. Henry O. Howitt, of Guelph, Ontario, who records his results of the subcutaneous use of oxygen in the American Journal of Medical Sciences. He conducts the gas from the ordinary high-pressure cylinder, to which is attached the usual wheel and valve, by means of rubber tubing to a needle, which is pushed beneath the skin until an appreciable swelling appears. The distension is said never to cause pain, even though it may be somewhat uncomfortable. In thirty-three cases in which oxygen was so administered a noticeable degree of respiratory comfort was observed, especially in cardiac and renal dyspnea. The results obtained in pneumonia, contrary to expectation, were disappointing. Dr. McCrae is of the opinion that the subcutaneous method is both eulogous, from a sanitary and economical, and may be given in many different parts of the body in quick succession, if so desired.

The Dublin Castle Hospital.

It will be remembered that some weeks ago His Majesty offered the use of his Castle of Dublin as a temporary hospital for wounded soldiers. It was inspected by a committee of medical and engineering experts, including the President of the Royal College of Physicians and Surgeons, Surgeon-General Anderson, head of the Army Medical Service in Ireland; Sir Charles Cameron, Medical Officer of Health of Dublin; and Sir George Stevenson, of the Board of Works. This committee reported that the premises were eminently suited for the purposes of a hospital, and that comparatively little structural alteration would be required. A public meeting was held, a subscription list was opened, and arrangements hurried forward. His Majesty showed his further interest in the scheme by sending a subscription of £100, and Queen Alexandra graciously sent a like amount. Money came in fast, and it was hoped that four hundred and fifty beds would be ready for occupation in a short time. The scheme, however, met with some opposition from more or less responsible letter-writers in the Press—most of them prominently associated with a branch of the Red Cross Society other than that responsible for the Castle scheme. Various titled persons cast doubts on the military necessity of the Castle, and some of them even knew people who had suffered from some throat while resident there. The opposition attracted little attention until one of the most active in it announced last week that the War Office had decided to withhold its approval. The statement appears to have been untrue, but the War Office is considering the matter with some care, as it seems an unnecessary amount of deliberation. Last Saturday three gentlemen were sent by the War Office to visit the Castle and report as to its suitability. We understand that they made a careful and minute examination of the premises. Pending the appearance of their report and the decision of the War Office we refrain from any comment at present.

Egg Poisoning and Asthma in Children.

The occurrence of certain toxic symptoms, such as urticaria and asthma, after eating eggs, has frequently been observed in childhood. The effect of the introduction into the blood of a foreign protein may "sensitize" the tissues in such a manner that a subsequent dose may cause symptoms of anaphylactic shock or intolerance, unless immunity has been previously established. Dr. Jean Talbot, of the Harvard Medical School, has studied eleven cases of egg anaphylaxis, and he describes six in which the evidence appears to be pretty clear that asthma in children is a manifestation of anaphylaxis and that the urticaria which so often comes on after certain articles of diet may conceivably affect the mucous membrane of the bronchial tubes, thereby producing symptoms of asthma. In a certain number of children asthma is definitely due to egg poisoning, and there is frequently a family history of idiosyncrasy to eggs, of hay fever, or of asthma. The experiments of Oscar Schloss, made two years ago, are quoted in support of the view that it is possible to immunise children who show signs of intolerance of eggs by giving them minute doses of egg-white in capsules daily. The theory of graded immunisation has gained support. Dr. Talbot has repeated these clinical tests as well as the skin-inoculation test with egg-white—a sort of von Pirquet reaction in which ovomucoid is employed in place of tuberculin. A local urticular reaction at the point of inoculation indicates that the individual is sensitive to egg-albumen. The report is only a preliminary one, and in a further communication it is hoped that the number of patients may be able to determine what other proteins are capable of producing asthma.

Arrows in Warfare.

It is a far cry from the pre-historic flint arrow-head to the weapon of sport employed in modern archery. Not until the Saxons began to subdue our ancestors in this country with their bow and shaft, "which weapon byenge strange . . . was wonderful terrible unto them," was the art of shooting with the bow deemed worthy of cultivating by the British. The use of this weapon was, of course, extensively practised by many ancient peoples, including the Parthians, the Egyptians, and the Cretans, not to mention the Romans and the Greeks. With the introduction of fire-arms in the seventeenth century, the bow and the shaft gradually fell into disuse as implements of war.

(a) Boston Medical and Surgical Journal, Nov. 5th, 1911.
It is somewhat strange, therefore, to learn from a German army surgeon that several cases have occurred during the present war of punctured wounds from arrows shot from an aeroplane, the nationality of which is not stated. The modernised shaft appears to consist of four parallel bars or rods of pressed steel, 10 by 15 cm. long and 8 mm. thick, welded together, and forming a star-shaped figure on cross-section. The up-to-date sagittatus has succeeded in projecting his darts so as to effect an easy penetration into the bodies of his victims, for it is reported that in some cases they had to be cut out of the wounds. The use of poisoned arrows, indulged in by certain South American tribes, is contrary to the conventions of modern warfare, but under favourable conditions, and in the hands of a skilled marksman, there would seem to be nothing against the legitimate use of this missile in modern warfare, in spite of its obvious drawbacks.

Bacelli's Treatment of Tetanus.

The development of lockjaw as a result of wound infection is one of the complications which military surgeons most dread to see. Whatever be the remedy employed, anti-tetanic serum or injections of carbolic acid sulphate, the mortality from tetanus is very great. It is interesting, therefore, to note that the method of treating the disease with car- bolic acid, advocated by Bacelli, employed con- currently with large doses of chloral hydrate, succeeded in curing six out of twenty-two cases occurring in wounded soldiers in a temporary hospital at Cher- burch, the details of which have been reported by Dr. Paul Sainton in the Academy of Medicine (a). Twice a day each patient received a hypodermic injection of from 40 to 50 c.c. of a two per cent. carbolic acid solution, the dose varying between 1 gr. 60 and 2 grammes a day. The injec- tions were made in the neighbourhood of the wound or else beneath the skin of the abdomen. In two cases, who received the injections for nearly a month, the amounts of carbolic acid introduced were 48 and 88 grammes respectively. No pain was experienced as a result of the injections and no toxic symptoms were observed. Simultaneously with this treatment the patients were removed to a quiet and semi-darkened room, and each received twice a day an enema containing 6 to 8 grammes of chloral, the night before one or two eggs and 250 grammes of milk. The fact was noted that the carbolic acid appeared to be retained in the system for a long period, for it was not found in the urine immediately after the injection. In one case, it was still discoverable in the urine thirteen days after the last injection. It has been shown in vitro that carbolic acid has no effect upon tetanus toxin, so that it would appear that it acts in the body more as a direct germicide. Treatment upon the appearance of the earliest premonitory symptoms of tetanus is urged by M. Sainton, as thereby lies the only chance of success.

The Luminosity of Annual Medical Reports.

The average annual report of the Medical Officer of Health of a district consists of tables of mortality from the various infectious diseases, cancer, tuberculosis, etc., together with sundry tabulated lists of sanitary reforms effected during the year, accounts of school medical inspection and of the sampling of food and drugs, together with other matters affecting the physical welfare of the community set forth in a more or less cut-and-dried manner. As a mere record of sanitary progress and of work done columns of statistics are, no doubt, sufficient. It requires something more than these, however, to make an annual report interest- ing as well as instructive to the lay reader who may be supposed to take an intelligent interest in the public health of his town or village. As an example of a report replete with explanatory information imparted in a luminous and popular style may be mentioned that by Dr. Alfred E. Harris, the well-known Medical Officer of Health of the Metropolitan Borough of Islington. Within a substantially bound and attractive volume of some 350 pages may be found instructive articles on such subjects as the symptoms and causes of anterior poliomyelitis, a succinct account of the origin and spread of venereal diseases, the progress of cancer research, and an historical survey of the adultera- tion of food. An excellent photograph of a map of the whole borough, marked with black and white-headed pins is inserted to illustrate the case- incidence of pulmonary and other forms of tuber- culosis, respectively. It may be noted that an attack-rate of 5.07 per 1,000 of tuberculous was notified during 1913, as compared with 6.56 in London. The total death-rate in Islington was 15.15 per 1,000. Dr. Harris may be congratulated upon the sale is recording of the borough, and also upon the production of a most illuminating report.

PERSONAL.

T.M. THE KING and QUEEN paid a visit the other day to the wounded officers and men who have returned from the Front at the 1st London Territorial General Hospital, C ornor t Road, Camberwell.

DR. FRANCIS JOHN ALLAN, M.D., D.P.H., M.O.H., of Westminster, was installed the other day W.M. of the Thistle Mark Lodge.

DR. SYDNEY MURRAY, M.B., B.S. Durham, has been appointed Assistant School Medical Officer to the Sunderland Town Council.

DR. A. DOVE CORMAC, M.B., M.S. Madras, has been appointed Medical Superintendent of the Cheshire County Asylum at Parkside, Macclesfield.

DR. WILLIAM LEES, of Chester, has received the honour of being elected by the Council as an Honorary Life Member of the British Red Cross Society.

DR. ROBERT W. MACPHERSON, M.D., B.S., D.P.H., Assistant Medical Officer of Health for Chester, has been appointed Assistant School Medical Officer for Cheshire.

DR. FREDERICK W. PRICE, M.D., Edin., M.R.C.P. Lond., has been appointed Honorary Assistant to the National Hospital for Diseases of the Heart.

MISS ELEANOR DAVIES-COLLEY, M.D., B.S. Lond., F.R.C.S. Eng., has been appointed Surgical Registrar to the Royal Free Hospital (London School of Medicine for Women).

DR. DOUGLAS MARTIN, M.B., Ch.B. Edin., D.T.M. and H., of East Calder, has been appointed School Medical Officer and Assistant Medical Officer of Health to the Borough of South Shields.

We regret to learn that Dr. E. F. Bashford has been obliged to resign his post of General Superintendent of the Imperial Cancer Research Fund, which he has held for the last eight years, owing to continued ill-health.

(a) Bull. de l'Académ. de Méd., No. 38, 1914.
A LECTURE
ON
THE MARTYRDOM OF MEDICINE.


I have ventured to select as the topic for this lecture, "The Martyrdom of Medicine." I hope that that alliterative title is not too ambitious for the subject of a brief address. No one can dispute the fascination of such a subject, even though one can do little more than give a notion of such the theme. In fact, the thrilling human interest it excites, the interesting speculations it opens up, and the lessons it should bring home to all thinking men, demand the pencil of a St. Jerome or of some inductafiable John Foxe to do anything like justice to so exalted a theme. I shall only attempt to put together some fragmentary contributions towards a worthier handling of this subject.

The term, "Martyr," has gathered around it associations which formed no part of its original etymological signification. The prime content of the name was that of bearing witness to what was believed to be true. The antipathy on the part of many to receive the evidence thus vouchsafed was not slow to lead to opposition, rejection, persecution, and even destruction of the bearers of such unwelcome tidings. By a process of transference and desynonymisation, the term "martyr" was differentiated from its original equivalent of witness and came to connote suffering or death for any cause or faith. Moreover, the voluntary nature of the sacrifice ceased to be essential, and those who suffered loss or death in pursuit of any object to which they were devoted, even though such deprivation came about fortuitously, often received the designation of martyr and were accorded the crown of martyrdom. The involuntary victims of any cause, pursuit, faith or science were thus included within the ranks and went to swell the records of martyrlogy.

A glance at the history of medicine will readily call to mind examples of all these various types; not only of medical men or women, but of others who were pioneers in sanitary reforms or zealots in pursuit of the kindred sciences. Some martyrs of medicine have sacrificed themselves voluntarily, others involuntarily in the field of research, others again have suffered persecution or death at the hands of secular or spiritual authority, and yet others, alas! have been ostracised, goaded into insanity, or subjected to neglect, or ridicule scarcely less grievous than death itself, at the hands of those of their own calling and profession.

Does it not seem like an extravagant paradox to link together medicine and martyrdom? Medicine as a science the ally of all liberal learning, devoted to search for truth alone, and illumined by the light of reason, ought she not, at any rate within her own borders, to be able to claim that her history contains no martyrlogy? Medicine as an art, inspired by pity, given to the relief and prevention, and not to the infliction, of pain, to save and not to kill, can it be true that persecution, ostracism, heresy-hunting, have been committed in her name?

We might indeed anticipate that, inasmuch as medicine was one of the earliest of the applied sciences to claim the earnest study of thinking men, in the early days of ignorance and barbarism, the observations of fact and the ratiocinations of the mind might not inreconciliably conflict with the dogmas of authority and the crude conceptions of self-satisfied pundits.

Unfortunately, it is only too true that the history of our honourable profession is rich in instances of those who have been martyred by Church or State or both combined, as well as those who, by reason of what was deemed heretical at the time, have been denounced, traduced, hated and cursed by men sometimes of their own profession, imbued with that spirit of intolerance which is much the same in science and medicine as it is in theology.

Call me o'er earth's chosen heroes, they were men that stood alone. While the men they agonised for, hurled the contumelious stone.

Stood alone and down the ages saw the golden beam incline,

To the side of perfect justice mastered by their faith divine.

I will pursue no chronological order, but will plunge at once in medias res, and ask your attention to the life and work of Ignaz Philipp Semmelweis.

The story of Semmelweis is a melancholy one for any one to read, and especially for a medical man to tell. Sir Wm. Sinclair's work, published in 1849, has provided English readers with an appreciative biography and a just estimate of his work. Ninety-four years ago, in the fair capital of Hungary, where past and present, east and west, feudalism and democracy meet by the swift waters of the Danube, our hero first saw the light of day. He studied medicine in Vienna at the old Allgemeine Krankenhaus, and became master in midwifery in 1844, and devoted himself to the Maternity Clinic. Alike in the dead house, in the library, and at the bedside, he investigated the problem of that fatal fever which leyth so heavy a toll on the lying-in women of the hospital. Craveullier had suggested an analogy between the puerpera and a wounded person; Boër, who had studied in England, and Oliver Wendell Holmes in America, had hasted at contagion as a factor in the case, but the authoritative doctrine on the Continent of Europe, at that time, favoured "the epidemic constitution of the atmosphere," of which Sydenham was so enamoured, as an all-sufficient explanation. To doubt its adequacy was heresy, to practise cleanliness superfluous, and, indeed, revolting. But, as a result of his observations, a post-mortem puncture suggested nothing to minds indurated by authority and fortified against original inquiry. But Semmelweis combined this hit of evidence with a remarkable piece of differential experience in the first and second clinics respectively. Why in 1846 were there 460 deaths from puerperal fever in the first clinic and 105 only in the second? Had the great Dr. Klein's practice, in the former, of demonstrations to his students on the cadaver, followed by unsanctified ministrations in the wards, nothing to do with the statistical diversity which had riveted Semmelweis's attention? He used and advocated chlorine water for cleansing the hands of the accoucheur prior to his attendance in the maternity wards. This practice was followed in 1847 by a considerable reduction in puerperal mortality. He promulgated a theory based on these recorded experiences. He assailed filthy practice in high places, and the fury of the Scribes and Pharisees was let loose. Authority in the person of the great Dr. Klein was offended. He continued extensively to demonstrate on the cadaver; he was the apostle of the unwashed hands. He scoffed at the "fad" of poor Semmelweis. Though Klein's mortality might be 7.8 per cent, against the more cleanly Boër's 3.3, if figures disputed authority, why, so much the worse for the figures! The general
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herd of orthodoxy sided with Klein, yet a few of the broader and more philosophical-minded men were in agreement with Semmelweis's doctrine. Hebra (who reformed Dermatology) published the results in the Zeitschrift: Routh introduced them into England. The great Skoda proclaimed them as comprising one of the most important discourses in the domain of medicine. William Sinclair observes, "Much of what Skoda said might stand in a modern text-book; all that is wanting is the bacteriology, then unknown, and about the value of bacteriological details (beyond what was known from the first to Liége and to St. Louis) and disinfection method," there is room for much difference of opinion."

Haller, too, then Senior Physician at Vienna, testified to "the importance of this experience for lying-in hospitals, and for hospitals generally speaking, especially for children's wards," and "immeasurable." He urged "all men of Science" and the high authorities of the State to give due recognition to the doctrines of his junior colleague. Meanwhile, Semmelweis experienced the fate of the prophet in his own country. A request for the extension of his office for another couple of years, as was customary, was promptly refused, thanks to Klein's influence. The University authorities turned against him. He abruptly left Vienna, returning despondent and repressed to Budapest, and attacked himself to St. Rochus Hospital, and became Professor of Midwifery there. Five years later, in 1857, he married the young and charming Marie Weidenhöfer, who proved a loyal helpmate during the brief remaining years of his life. He indulged in his "Die Etologie" an account of his discovery—that puerperal fever is produced by the resorption of decomposed animal organic matter and can be prevented by due regard to cleanliness. It was mooted abroad as a "miracle at first misunderstood, but now accepted," his thesis so much in accord with his own predilections. Virchow attacked him in a way unworthy of one who, in later years, became the Grand Old Man of Liberalism in Germany. As his biographer states, "by the employment of antiseptics he was on the path to the introduction into operative gynecology of those measures against infection with which we are so familiar and which we associate with the name of Lister."

"Before the work of Pasteur was known and before Lister introduced his methods of preventing wound-fever, and long before anyone elsewhere thought of routine antiseptics in midwifery, the systematic use of antiseptics in midwifery, gynecology, and surgery had been regularly practised at Buda-Pesth, and were made the subject of violent protest by Semmelweis that it was he who introduced antiseptics as a prophylactic measure, both in obstetrics and gynecology."

In 1863 he performed the first ovariotomy operation in Buda-Pesth. He, despite the most malevolent persecution by the bigoted pontiffs of the profession, was rising into eminence. But the iron of persecution had entered deeply into his soul. By nature tender and trustful, the accumulated enmity and venom which he had encountered had left its indelible mark on him. So much so that the first signs of that unhinging which brought him to an untimely end, Skoda, who had himself been pilloried as a materialist, stood bravely by his idealistic friend. He urged him to experiment on animals and thus demonstrate to the sceptical the truth of his doctrine. He tried this line of research, but without enthusiasm, and later when urged to prosecute it by the Society for the Advancement of Science (who voted him money for this purpose), he declined. There is ground on the ground that clinical evidence was insufficient to establish the truth of his doctrine, and Sinclair maintains, "he was right." There are, however, those who assert that Semmelweis failed where Lister and Pasteur succeeded. Thus Osler stated, "It is highly probable that the essential extension of the demonstrations upon which the later observers relied. The deliberate conclusion, however, of his sympathetic biographer is "that the great revolution of modern times in obstetrics as well as in surgery is the result of the idea that, complete and clear, first arose in the mind of Semmelweis and was embodied in the practice of which he was the pioneer."

As for Semmelweis in the flesh he was of striking and dignified presence, rather bald and inclined to obesity in middle age, with dark abundant hair and rather florid. His portraits recall the bust of Shakespeare at Stratford-on-Avon. We are told, "Every word and action expressed unbounded kindness of heart. Towards the poor and suffering he treated always kindly and helpful. He was strict and exacting towards himself and others in professional matters; and he was inexorable in his demands for exactitude in carrying out his prescriptions with regard to disinfection. He was readily excited and easily given to outbursts of temper. He was, however, a "man of courage," and always ready to try a new plan in the service of humanity."

Nevertheless, all the vituperative vocabulary which forms the regular stock-in-trade of shallow orthodoxy was hurled against this man. He was a "crank," a "faddist," a "visionary," he was devoid of all becoming respect for authority—the customary charge against a man of the deep slumber of decided opinion. His dialectic methods, which in his "Open Letters" betrayed powers of repartee and irony for which some of his assailants were no match, were accounted ill-bred and violent, and quite unsuited to the smug complacency of conventional medical literature.

Carl Brown denounced the doctrine of Semmelweis as "humbug," while he wisely and cautiously proceeded to adopt his practice.

Virchow found sufficient explanation of child-bed fever in certain states of the weather combined with the presence of one or other of the exanthemata. Denham, the Master of the Rotunda, demurred to any teaching which placed the "Sin and Disgrace" of convulsing puerperal fever on the uncleaned hand of the acumen. "The teaching of Robert Barne the 50's was adverse to the Semmelweis thesis as it was then being propagated in this country by Simpson and my dear old master, Matthew Duncan. In the debate at the Obstetrical Society of London so late as in 1875 Spencer Wells and others were obsessed with the notion that puerperal fever was a modified form of one or other of the acute exanthemata affecting a lying-in woman. The rejected heresy of Semmelweis is the accepted gospel of 100-year science, and they have written the history of their own folly. The sin of Noah, the British Medical Journal of March 25th, 1911, happily puts it, in the teaching of a well-known pathologist that cleanliness, fresh air, and physical exercise are dreadful superstitions? The journal innocently suggested that Benedict Joseph Labre who devoted his body to be a pasture and breeding-ground for lice might be appropriately set up as the patron-saint of the devotees of this renewed gospel of filth."

It seems now incredible that the simple teaching of Semmelweis should have fallen upon deaf ears, and that instead of seeing the fruit of his labours ripening during his lifetime he was bullied and brow-beaten until his mind gave way and early death, accelerated indeed by that very blood poisoning upon which he weighed his case in expression, well set up. I will not here pass to morale on this strange eventful tragedy of Ignaz Semmelweis, but will ask you to turn with me to an earlier page of history and to direct your attention to the life, work, and death of Michael Sinclair, the man of whom the late Sir William Osler said, "the story of his career is not often heard from my late friend, Sir W. R. Richardson, the praise of the erudite Dr. Willis, of Mortlake, who died in 1878, and with whom Richardson was for a
while in partnership. He was a well read Scot, a friend of George Combe, the author of "The Constitution of Man"—widely travelled, blessed with a capacious memory, a good classical and mediæval knowledge, an eye for picturesque scenes, a capacity for collecting, a great deal of practical and theoretical knowledge, and a man to whom the medical world would do well to look forward. He wrote the best essay on typhus fever ever written, and was a great authority on the subject. He was also a poet, and his poetry was highly appreciated.

He was a man of great ability, and his work was highly spoken of by all who knew him. He was a man of great moderation, and his opinions were never extreme. He was a man of great integrity, and his work was always done with the best of intentions.

He was a man of great kindness, and his work was always done with the best of intentions. He was a man of great patience, and his work was always done with the best of intentions. He was a man of great industry, and his work was always done with the best of intentions. He was a man of great courage, and his work was always done with the best of intentions. He was a man of great intelligence, and his work was always done with the best of intentions. He was a man of great learning, and his work was always done with the best of intentions. He was a man of great eloquence, and his work was always done with the best of intentions. He was a man of great charm, and his work was always done with the best of intentions. He was a man of great beauty, and his work was always done with the best of intentions. He was a man of great spirituality, and his work was always done with the best of intentions. He was a man of great spirituality, and his work was always done with the best of intentions.
I Invention of new doctrines.

Three and a half centuries roll by, and what has modern thought to say in the light of history of the story I have just related? I cut from The Times of October 17th, 1911 the following extract:

MONUMENT TO SERVETUS

A monument to Michael Servetus was unveiled this morning in Dauphine where he resided for several months as the medical attendant of the Archbishop Paul Paulinier, from 1541 to 1553. The monument represents the burning of Servetus at the stake (October 27th, 1553). He stands in the midst of the flagstaff chained to a stone with his book of theological tracts under his hand. On his head is a wreath of leaves covered with brimstone. The sculpture of the University of Paris, Professor Charles Riche, spoke of the discovery by Servetus of the pulmonary circulation of the blood as marvellous and as prolem sine cite. Since Servetus, unlike Harvey, had not practised vivisection, he had never had a complete inductive study of anatomy. His contemporaries could not appreciate his discovery; it was not immediately followed up, and 75 years elapsed before it was scientifically established by Harvey.

To be concluded in our next.


HOW TO GET THIN.

Nowadays it is not the fashion to be corpulent; the proper thing is to have a slight, graceful figure, far removed from embonpoint, and a fortienu from obesity. For once, then, the physician is called upon to interest himself in a question of feminine aesthetics. We cannot, indeed, do otherwise than approve of this general tendency to impose a certain loss of flesh on the body. Merely advice on our part with this object in view would do little harm. It is decided, but now that fashion is on our side we stand a chance of being listened to. At the same time, the mere fact of losing flesh is not per se any guarantee of good health; the result must be achieved in a particular way, and it is here that the problem becomes more complex. Moreover, we must make a distinction between persons whose obesity is clearly pathological, the outcome of a definite affection, usually more or less glandular insufficiency, and those in whom it is due to sedentary habits and carelessness in the matter of food. The latter constitute the great majority of the cases. Moreover, whatever their glandular insufficiency, whether thyroid, vesicular, ovarian, suprarenal, pituitary or other.
wise, are almost always amenable to proper hygienic treatment, complementary to organotherapy, which, alone, so often yields disappointing results.

Our object must be to have in view a thinning treatment, as M. Prudhomme would say, to get thin. This is too simple a formula, and I shall complete it by saying that the subject must not only lose weight, but must also diminish in size; he must lose fat and gain muscle. A sedentary obese subject may change shape without losing weight by an exercise course which has for effect to develop his muscular system.

Only too often weight is taken as the only guide in a thinning treatment, and I think we ought also to rely upon measures of the chest, the abdomen, the circumference of the arm and leg, and the distance from the ensiform cartilage to the pubis.

Of the thorax we ought to increase in size as the belly diminishes, and to obtain this result it is not enough to enforce a diet; we must also have recourse to physical training which calls into play all the muscles of the organism. Sports such as fencing or cycling which bear on particular groups of muscles to the exclusion of the others, fall short of the desired effect.

It follows that the scales and the tape measure must serve as guides in any treatment having for object to bring about progressive loss of flesh. They enable us to regulate the diet in such wise as to lose weight without losing too much at a time. At the onset, during the first few months of treatment, we can cut out a loss of seven or eight pounds without causing fatigue, but thereafter the loss of a couple of pounds a month is quite sufficient and does not depress the organism. The data also tell us whether harmony is maintained between the different parts of the body.

It is well for the physician to control the course of treatment by examination of the urine, the heart and the blood pressure.

Diet must be the basis of any treatment of obesity. I repudiate the plan adopted by certain fashionable people who deliberately cut down liquids, a practice which at most deprives them of four or five pounds of water retained in the circulation and that can be got rid of, as Widal has shown, without any disadvantage, but the lack of which is very apt to interfere with elimination. I also repudiate actual fasting in favour of a regimen which is not unduly restrictive as to quantity but from which farinaceous articles are in great measure banished.

We must forbid bread almost entirely, allowing a daily ration of at most four ounces. We must advise the pasties (macaroni, vermicelli, and the like), rice and mashed vegetables, haricot beans, peas, lentils, bread beans. Potato contains go per cent. water, so is permissible in moderate quantities. We therefore allow eggs, fish, meat (raw or cooked) and green vegetables with small amounts of cheese and fruit. The question of quantity is closely connected with the weight curve. Daily weighing is one of the best auxiliaries of the thinning treatment. While we forbid farinaceous things almost entirely, we must also moderate the use of fatty substances—butter and sugar—though not banning them altogether.

The nature of the articles of food allowed depends on the individual patient, while the quantity is regulated according to the weight.

A person afflicted with obesity will generally improve under this regimen, but, as I have already pointed out, the treatment must be supplemented and completed by physical culture and exercise, and we must bear in mind that while a loss of weight is a legitimate ideal a diminution of bulk is even more to be desired.

Massage is a useful adjunct from the aesthetic point of view in order to prevent the skin of the face becoming wrinkled and the abdominal adiposity which is always very refractory.

Then arises the question as to the length of time during which it is desirable to pursue this thinning treatment, and this is tantamount to asking what is the normal weight of a healthy subject. It is customary to state that this weight should equal the number of continued weeks of youth. Thus, for example, if we are empirically established, may be exceeded or not attained, but it does approximately represent the physiological weight of a normal, properly developed subject.

Simple enough in theory, this course of treatment implies a strong will in those who aspire to take advantage of it. It requires to be persevered with, in some cases for months and in others for years, but the result is well worth the sacrifices which it entails. There is invariably a diminution of the blood pressure, consequently suppression of the tendency to plethora and its consequences, postponement of the advent of arterio-sclerosis—i.e., old age.

But when the result has been achieved it will have to be maintained by adhering to hygienic habits in the matter of diet and exercise.

PERCUSSION OF THE LUNGS.

PART I.—AN EFFORT TO STANDARDISE THE DEGREES OF DULNESS.

PART II.—THE ADVANTAGES OVER THE OPPOSITE METHOD OF PERCUSSION FROM BASE TO APEX. (a)

By Nathaniel K. Wood, M.D., Boston.

Associate in Medicine, Peter Bent Brigham Hospital; Physician in General Medical Department, Boston Dispensary; Assistant Physician, Out-Patient Department, Boston Consumption Hospital; Instructor Medicine, Harvard Medical School.

PART I.

While studying physical diagnosis as a student, one of the things difficult for me to understand was percussion. As I talk to students in the medical schools now, I am told by them that percussion is one of the hard things for them to learn and that it means the least to them of the physical signs. It has interested me to study why this is so, especially as I have come to regard percussion as a distinctly definite and valuable diagnostic means. This is so true that instead of correcting my dulness by what I learn from auscultation, as I once did, I now correct my auscultation by what I learn from percussion.

My studies have led me to recognise that the standards of clinicians for the various degrees of dulness, 2-2-3-4-line dulness—meaning respectively, impaired resonance, definite dulness, very marked dulness and flatness—are so individual, so lax and so diversified that they amount to no standard at all; certainly not a standard that can be grasped by an intelligent student. It is a common occurrence for a physician to percuss a chest which shows nothing but 2 or 3-line dulness, and to have him call the 2-line dulness normal resonance, and in consequence, call the 3-line dulness outside. In this way serious pathologic conditions are overlooked. The following instance, which illustrates my point well, impressed me distinctly, as it was

(a) Paper read before American Climatological and Clinical Association, Atlantic City, June 20th, 1914, and published in the Journal of the American Medical Association, October 17th, 1914.
furnished by one of the leading hospitals of Boston and by one of the good instructors of physical diagnosis in the Harvard Medical School. This physician examined a well-built, muscular young man, a light-weight wrestler by trade, who had lost almost no weight, looked perfectly well and complained only of hoarseness. The examination, signified the physician, "the chest was normal throughout, lungs showed no disease." I examined the patient the next day at the Boston Consumptives Hospital and found 3- and 2-line dulness throughout both chests, and fine cracking riles with cough throughout. The larynx showed miliary tuberculosis and the voice contained numerous tubercle sounds. I think that the first clinician failed to recognize this very serious condition because he had no fixed standard of dulness.

In 1912 I began to study the pitch of the various notes of percussion in an effort to establish for myself some definite standard. I made a frequent practice, therefore, of whistling the pitch of the notes as I percussed the lungs. I soon learned that the variation between normal resonance and flatness was a range of over two octaves. This winter I have carried the investigation further. With an assistant, who has no medical training, I plotted out on the piano the notes which corresponded to what I considered my personal standard of 1-2-3-4-line dulness.

In each instance I took at least six cases and did not tell my assistant what note I expected to find. At first she hummed the note, found it on the piano; then we freed our minds of the notes by playing chords. I next hummed or whistled the note and she attempted to find that note on the piano. A comparison of our two notes showed that we never differed more than a half tone. Later we concluded that an easier and more accurate method was to strike middle C and then work up or down the scale until both of us agreed that the note on the piano corresponded with the percussion note.

In this way we examined six cases for each of my assistant’s notes. We also came back to the same case two or three times after examining others to determine how well we would agree with our former notes. When I percussed the same individual in the same place, we always agreed with our previous findings. Not only did we agree on the note previously found in a particular chest, but we also found that the degrees of dulness were the same in a variety of individuals. This proved that the problem was purely a matter of pitch and not one of individual variations.

I determined in this manner that normal resonance is F or F sharp below middle C, 1-line dulness A below middle C to middle C, 2-line dulness E flat to F above middle C, 3-line dulness B flat to intermediate C, 4-line dulness E to F above intermediate C. Thus it will be seen that there is an interval of an octave between normal resonance and 2-line dulness, and an interval of another octave between 2-line dulness and 4-line dulness or flatness.

Has this any practical value? Or is it simply an interesting thing theoretically and musically, requiring a specially trained ear to detect these changes of pitch? I think that it does not need a specially trained ear; that it is of distinct practical value and can be acquired readily by anyone who has no previous musical training. If it is not practical, then percussion as a physical sign is not practical. The discussion of this point, however, brings me to the second part of my paper.

**PART II.**

To percuss well, the stroke on the pleximeter must be sharp and quick. A rapid recovery is essential. The motion may be best illustrated by saying that it should be made exactly as a woodpecker uses his head in boring a tree. All the motion should come in the wrist, and none in the arm. This secures a crisp note. The pleximeter may be held flat or raised, so that only the end of the finger touches the chest. In this position a distinctly smaller area is percussed at one time. The note, consequently, is less disguised by the surrounding normal or semi-normal tissue. It is essential, moreover, to remember in a disease like tuberculosis that normal lung is always in intimate contact with abnormal. This change from the lung to the apex to the base does not alter the pitch of the pathological note. It only makes the note much more evident.

Of far greater importance than the proper manner in which to use the plexor and pleximeter, however, is the direction in which the chest is percussed. It should be percussed upward and not downward, from the base of the lungs to the apex, and not from the apex to the base as has been taught so universally. This is so important that I wish to state my reason for it carefully:

A. It is much easier for the ear to pick up a higher note from a lower, than it is to do the reverse.

B. It requires a much lighter stroke to bring out the normal note than the pathological. The reverse leads to faulty standards.

C. It is the rational plan to work from the normal as a standard toward the pathological. The reverse leads to faulty standards.

D. The apices, as is well known, are most frequently affected and more rarely give a normal note. To start at the apex, therefore, is usually, if not always, better. The mind judges the further examination. With downward percussion, the higher note merges into the lower too imperceptibly to be accurate work. This is so for two reasons: first, as I have already said, the mind becomes prejudiced in favour of a pathological note and consequently does not attempt to make fine distinctions. The other reason is that a high note is required for the pathological note and when the more resonant is reached, the percussion is continued too heavily to detect what should be readily appreciated: differences in the force of stroke necessary to bring out a good note. In this way the examiner deprives himself of a very important guide to determine the pathological note.

The best place, therefore, to start the percussion of the lungs is the left lower front, as this is most often normal. From there, work upward to the apex, and record the various notes without perceiving the opposite side. Then percuss upward on the right side and finally from side to side and alter your first findings, if necessary. The comparative note between similar areas of the two lungs is often misleading, as both may be pathological. This comparison, therefore, should only be used later to correct first impressions and to detect or confirm fine gradations. In doing the backs follow the same order, left lower to apex, right lower to apex, then from side to side. If this order is followed, you have every assurance that interesting observations will follow as regards the usual progress of a disease like tuberculosis, and the relative frequency between incipient cases and chronic ones of long standing with marked reparative ability.

I am absolutely convinced that a fine ear for percussion can be trained only by the rapidity with which students appreciate the difference between the two modes and the readiness with which they acquire a standard of dulness as a result of it.

I said that I considered that a musical standard is practical and can be taught easily to the non-
musical. I should like to prove that these statements are true. In the first place, I have had no difficulty in teaching such a standard to quite a wide range of students, good, fair and poor.

How, then, can this be taught the non-musical man? In the first place, the mind must be entirely freed from all preconceived ideas as to what pathologic condition will follow the different degrees of dulness: what stage of the disease is indicated and what bearing the dulness has on the prognosis. I am sure that I am correct when I say that many men to-day consider that a 3-line dulness over all of both chests means a hopeless condition of the lungs. This very attitude of mind prevents them from making what should be an accurate scientific recognition of the dulness. One cannot discriminate why I have so little difficulty with students because their minds are open. I have several times been told by older men that the patient whom I was examining was too well to have such extensive dulness as I claimed. I am convinced that, until a more uniform standard of dulness is adopted, we are in no position to discuss the pathology of 1-2-3-4-line dulness, when applied to such a disease as tuberculosis. At present such terms are as much of a hindrance as a help in the diagnosis and prognosis of chest cases.

In the second place, and in teaching students this occupies the first consideration, when resistance is felt under the pleximeter finger, the note is close to B below intermediate C or 3-line dulness. As we are all accustomed to this feeling of resistance under the finger when percussing, we have here not only an easy guide to any man, but also an accurate one. This observation depends on the muscle sense of the fingers of the physician and not on his ears. Until you feel this resistance, therefore, you should only decide between normal resonance and 2-line dulness.

Now the differences between normal resonance and 2-line dulness can be detected readily by the muscle sense also. Here, however, it is the muscle sense of the plexor rather than that of the pleximeter. There is a very definite difference between the gentle tap which is sufficient to bring out the normal note, and the decided stroke necessary to make the note of 2-line dulness loud enough to carry any distance at all. The physician who trains himself to start with very light percussion will quickly learn to appreciate these differences. That is why the examination should begin with that part of the chest which is most likely to be normal.

Although I have placed stress on the muscle sense of the pleximeter in detecting 3-line dulness, and on the plexor in detecting 2-line dulness, in both instances the muscle sense of both hands comes into play. As we measure the resistance under the pleximeter, we naturally measure the force of the plexor stroke. On the other hand, as we measure the lightness of the stroke of normal resonance in the plexor wrist, at the same time we measure the force of the stroke on the pleximeter. This, then, is as much a matter of training the muscle sense of the fingers and hands as it is of making use of a well-trained muscular ear.

I wish to repeat, however, that one of the great barriers to acquiring this skill is the preconceived ideas which we have as to what the underlying pathologic condition must be for a given degree of dulness. I am free to confess that my physical examination occasionally makes it hard for me to determine the Dulness Standard. That is because more attention is attracted by my lines of dulness than by my report of symptoms.

CONCLUSIONS.

1. Present methods of percussion are of little value, because, far from having any universal standard of dulness, there is not, in most instances, even an individual standard.

2. To a field in which there is no accurate standard, I bring some standard, to me one that is definite, logical, and wide of resistance.

3. Normal resonance is F to F sharp below middle C; 3-line dulness, or impaired resonance, is A below middle C to middle C; 2-line dulness, or definite dulness, is E flat below middle C; 3-line dulness, or very marked dulness is B flat below intermediate C to intermediate C; 4-line dulness.

No intelligent idea of diagnosis, prognosis, nor of the underlying pathologic condition can be formed by percussion without some such definite standard.

5. This standard can be acquired readily by the ear, and by the muscle sense of both hands, measured by the force of the plexor blow and the resistance under the pleximeter.

6. Upward percussion is an absolute essential of correct work. The old method of downward percussion should be discarded, and no longer taught to medical students.

THE SUBCUTANEOUS INJECTION OF OXYGEN.

By H. O. HOWITT, M.D., L.R.C.P.Lond., M.R.C.S.Eng.,
Guelph, Canada.

Every practitioner finds some time or other the giving of oxygen to be indicated as a therapeutic measure, and he gives it—well, some idea of the benefits is invariably of note only by their absence.

I have given oxygen a great number of times since Derose's article was published in The Medical Press and Circular of May 1st, 1912. I believe this method to have been unused before in this country, except for the treatment of milk fever in cows. With this disease the milking cow suddenly goes off its food, relaxes its neck muscles, loses interest in its surroundings, falls, and the hind legs become useless. The cow is apparently about to die, until a veterinary surgeon, well up in his work, arrives on the scene and injects oxygen into the udder, and almost instantaneously the animal recovers. I am informed of cases when this treatment is not used the cow frequently dies within three or four hours from the onset of the symptoms. Acting on this principle, Dr. Williams reported in August, 1912, intra-mammary injections of oxygen for eclampsia, and attributed any beneficial effects which were noticeable to absorption of the oxygen. Delmas in 1912 reported on his excellent success in resuscitating asphyxiated infants by this method. Derose recommends the use of oxygen by the subcutaneous method in cases of tuberculosis with dyspnoea, and remarks that "the temperature falls and a feeling of well-being immediately prevails, for which the patient is very grateful, and sleep, deglutition, and respiration become easy, soothing and refreshing." He suggests its employment for (1) the toxic dyspnoea of uremia, (2) eclampsia, (3) carbon dioxide poisoning, (4) in certain cases of diabetes, (5) emphysema, (6) pertussis, (7) asthme, and (8) in those cases where mechanical obstruction is precisely located in the air passages.

I have given oxygen intravenously, which is only two years, the dyspnoea of tuberculosis, gas poisoning, pneumonia (lobar and lobula), cedema of the lungs, bronchial asthma, and operative cases.
In no case were any ill effects noticeable, either at the time or afterwards. One asthmatic said that it relieved him, but I did not notice appreciable improvement. The carbon dioxide case may have recovered without the injection, but in some of the pneumonia and operative cases the results were simply astounding.

Case I.—One of my early experiences was with a man whom I had a few days before operated on for perforated gastric ulcer. He had a well-marked bronchitis at the time of operation which developed into pneumonia. The case rapidly became alarmingly ill, apparently hopeless; there was no noticeable breathing, the pulse was imperceptible, a cold clammy sweat had broken out on the forehead, the extremities were actually cold at the knees and elbows. I injected oxygen subcutaneously and in less than one minute the man could speak with a fairly strong voice, the pulse returned with fair volume, the colour reappeared in the skin, and he breathed easily. There were three astonished witnesses to this scene, or I would refrain from mentioning it. Subsequently the man made an uninterrupted recovery.

Case II.—A woman, aged 66, with lobar pneumonia; temperature 103.3°, respirations 46, rapid pulse, rusty sputum. The condition became alarming on the fourth day from the onset. Oxygen was injected. The temperature dropped a degree, and almost at once the breathing became less laboured, and the patient was very grateful. Injections were given twice daily, and the case no longer resembled pneumonia.

Case III.—A young man with lobar pneumonia. He was quite delirious, and had not slept for sixty hours. In an unwatched moment he crawled out of the window into the snow. On his return to bed oxygen was injected, and before the needle was withdrawn he fell into a sound sleep which lasted two hours. What is particularly interesting about this case is that the injection was intramuscular and apparently was the only thing that gave any relief. This patient succumbed some three days later.

Case IV.—A young woman with lobar pneumonia, temperature 104° degs., pulse 150, respirations 46 to 52, and apparently about to die. This was three days from the initial chill. With these conditions I took over the case, injected oxygen subcutaneously and she made a rapid recovery. Of course this injection may have coincided with a third-division pneumonia.

Case V.—Dr. Orton, of Guelph, informs me that he was about to operate on a case for empyema when the patient suddenly stopped breathing, turned extremely cyanotic, and those present considered the end had come. The anesthetist was immediately stopped and oxygen subcutaneously injected. At once the cyanosis disappeared and the pulse and breathing returned. The operation proceeded without inanition.

Case VI.—Dr. J. McCrae, of the Royal Victoria Hospital, Montreal, wrote me to the following effect:—In only one case in thirty were the results of oxygen sensational. This was a man, aged 34, just operated on (excision of the bowel for new growth). Three hours after the operation the man appeared to be dying. The lungs were edematous. Respiration were shallow and rapid, and Dr. McCrae's impression was that the patient would die within the next fifteen minutes. Four injections of oxygen were given, and the man recovered without alteration of the respiratory rate, and the oxygen immediately increased his comfort.

The following is a description of the apparatus and the method of its use (a): Oxygen is generated from a sodium peroxide in contact with water in a closed cylinder, and the gas set free escapes by long and slender tubes. The distal end of which is an aspirating needle which is inserted into the subcutaneous tissue. The tube is then oiled and by a pumping action of the hand, sufficient force is used to raise a lump once or twice as large as the closed fist.

The oxygen injected by this method forms a local embolism which lasts for hours and slowly travels over the surface of the body. Apparently the body only absorbs that which is necessary. It is really the formation of an artificial lung, I have never known a single ill effect to follow its use; in every case where the breathing was laboured, the patient experienced some relief. In some cases, the ones I have mentioned, the results were about as wonderful as a chapter from the "Arabian Nights," and were witnessed by several medical men and nurses. Before passing judgment, I would ask that it be given a fair trial. One case like these mentioned, among a great many who were helped only a little, would make it well worth while.

It is not a "sure cure" for pneumonia or any other disease, but when oxygen is urgently needed by the cells of the body this method of introduction of oxygen fills the requirement. In my experience the old method of inhalation was a failure.

OPERATING THEATRES.

THE MIDDLESEX HOSPITAL.

Mr. Sampson Handley operated on a woman, aged 57, for carcinoma of the rectum by the abdomino-perineal operation. After the performance of the abdominal part of the operation, the blinded upper end of the colon was brought out through a stab wound through the left rectus muscle at the site of the future colostomy opening. The bowel was not opened, but a large rubber catheter was introduced into it through a small puncture, and was tied in by means of a purse-string suture. Mr. Handley explained that the object of the catheter was to permit the introduction of saline into the bowel. Its rejection or loss was impossible, and the patient could thus be safely tied during the lingering period of the succeeding two or three days. The perineal portion of the operation was completed in the usual manner.

In his remarks, Mr. Handley said: In my opinion, with rare exceptions, and excluding squamous-celled growths beginning near the anus, the only two operative procedures worth considering in cases of cancer of the rectum are: (a) abdomino-perineal excision of the rectum with the formation of a colostomy; (b) a simple colostomy.

This view leaves out of account the possibility of keeping the natural fecal outlet at the anus, an end very desirable in itself. But attempts to bring down the upper colon and fix it to the sphincters are very risky. The mere fact of an abdominal operation terminated by bringing down the bowel is quite double that of the same operation terminated by a colostomy. Even if the patient survives the operation the anal sphincters may subsequently become fibrotic and useless. The risk of recurrence of the growth in the anal structures left behind must not be forgotten. In many cases, too, the final result is a sacral anus owing to the yielding of part of the line of union of the bowel.

As regards excisions of the rectum performed below, some surgeons, notably Mr. Harrison Cripps, have recorded satisfactory results in a considerable number of cases; others, including myself, have experienced some very bad cases. In one instance a case has not been my good fortune to meet with early cases.
where the growth is a small one and well localised to one portion of the bowel wall. In such cases some competent authorities would advocate a perineal excisional operation. A very small partial colectomy with impaired constitutions, and those over seventy years of age, are unsuitable subjects for the abdomino-perineal operation. In such cases I should perform a small colostomy, and even in small early growths, if the patient is a suitable one, I should advise the complete operation. For it is known that glandular involvement may occur when the local growth is still in an early stage, and the abdomino-perineal operation is the only means by which all the glands connected with the rectum can be removed.

As regards immediate risk, the perineal operation is undoubtedly the safer procedure at present. But as a colostomy-closed operation is being rapidly improved, I anticipate that the mortality (fall to 2·1 per cent. Mr. Cripps' mortality for perineal excision is eight per cent. (3 deaths in 38 cases). Mr. Miles among 26 cases of the abdomino-perineal operation lost ten. The same operation, perhaps, however, on rather more restricted lines, shows in my own hands a mortality of three among fourteen cases. Only one death occurred in the first ten cases, a result mainly one, I believe, to the method of post-operative saline infusion which I advocate.

TRANSACTIONS OF SOCIETIES.

ROYAL SOCIETY OF MEDICINE.

SECTION FOR THE STUDY OF DISEASE IN CHILDREN.

MEETING HELD NOVEMBER 27TH, 1914.

The President, Mr. T. H. Kellock, in the Chair.

EXHIBITION OF CASES.

Dr. E. B. Genson showed a child with the left lower median incision below the umbilicus. It was a male infant, one of twins. It was so small that the tenday tooth, which was then loose and attached only by the gum, was removed, as its presence interfered with sucking. The right lower incisor incisor had then also appeared through the gum. The child was well developed and presented no other abnormality.

Dr. J. Porter Parkinson showed a case of Friedrich's disease with spastic phenomena. The boy, aged 12, was the ninth of ten children. He began to walk at three years, but never walked well, and was never very intelligent. He was now a fairly well grown boy with a rather unintelligent expression. Speech was distinct, slurred and syllabic. Gait spastic, uncertain; slight difficulties of speech; marked sign negative. The legs were held stiffly, the muscles hard and well developed: the foot showed marked pes cavus with some equinus; the great toe was hyper-extended at the metatarso-phalangeal joint, and the extensor tendon very prominent. There were marked knee and ankle clonus and an extensor planter reflex.

Mr. L. Bromley showed a case of tumour of the upper extremity of the femur in a boy aged 12. A swelling on the right thigh had been noticed for the previous seven or eight weeks. There was no definite margin, and no heat or tenderness. Movements at the hip-joint were free. A skintograph showed an endosteal growth of the femur. On exploration, the bone was found to be invaded and destroyed by normal periosteum; a thin layer of compact bone surrounded a mass of cartilage which had entirely replaced the medullary cavity. Microscopic examination showed pure chondroma, and there was no suggestion of malignancy.

Dr. T. R. Whisham showed two cases of heart-block. (1) A female infant, aged 2 years and 2 months, who was born at full term, and had always been backward. The pulse was slow, full and regular, the right side of the heart in the skintograph appeared to be enlarged, and the outline of the organ was almost globular. All over the pericardium a loud systolic bruit was audible, the maximum intensity being between the apex and the left sternal border and extending up to the pulmonary area. The heart rate was slow, but it varied from time to time, the lowest recorded being 48, and the highest 80. An electrocardiogram showed a perfectly regular 2:1 heart-block. There was a positive T wave in the right and left marginal leads, and the homoglobin value was 110 per cent. (2) A girl, at twelve. Six years ago it was noticed that she had a slow pulse, but it was not until about eight months ago that any cardiac symptoms occurred; since then she had complained of pain around the heart on exertion. She was well grown and showed no cyanosis. The pulse was slow, usually between 50 and 60 per minute, and slight irregularity in rhythm the extreme rates noted being 40 and 64. The heart was considerably enlarged, especially on the left side, and a systolic bruit was audible with its maximum intensity in the fourth interspace near the sternum. The second sound in the pulmonary area was at times reduplicated. A tracé cardiographe and a polygraph tracing showed a marked dissociation between the auricular and ventricular beats, and an irregularity in the rhythm of the latter. A subcutaneous injection of atropine sulphate (1/60 gr.) caused the ventricular rate to be increased from 40 to 60 per minute, but did not affect its arrhythmia. The patient at times had complete heart-block with pulse slow and regular, and at times incomplete heart-block (2:1, mixed) which produced an irregular pulse.

Dr. W. H. Alford also showed a case of diabetes insipidus with infantilism. A backward boy, aged 4. He could not yet talk. Height 2 ft. 6 in., weight 1 st. 6 lb. About two years ago he started to use a large quantity of urine and to complain of great thirst and to lose flesh. On admission to hospital he was passing from 200 to 900 c.c. of urine per day, and under general treatment and rest the maximum had been 300 c.c. in a day. The Wassermann was very pale, low specific gravity, and contained no abnormal elements.

Dr. J. D. Rolleston showed a case of giant naevus in a girl, aged 7, showing a pruritic, hairy, and warm dermal naevus almost covering the whole face. The principal naevus occupied the neck, back, right thigh and buttock. There was no spina bifida. The naevus was covered by downy hairs mostly of a light colour, and darker. During the third or fourth month of pregnancy the mother had been frightened by a black and tan dog which had tried to bite her husband, and had thrown her arms over her body, while the child was not expected, though her medical attendant had tried to persuade her to the contrary.

Dr. Bernard E. Myers showed a case of splenomegaly in a boy aged 11 months, who was admitted to the Royal Waterloo Hospital last June (then aged 18 months) for diarrhoea and wasting. When first examined the abdomen was distended. The child was listless, anaemic, of an earthy complexion, and with a sunken fontanelle. Some signs of rickets were present. There were about six motions in the 24 hours. The temperature and pulse were normal on admission, while the respiratory rate, 30, the weight was normal, moderately firm, and extended to just below the level of the umbilicus. The edge of the liver was felt 1½ inches below the costal margin. The Wassermann and von Pirquet reactions, were both negative. The blood-count showed 8,000,000 c.e. of leucocytes, and 44 per cent. of haemoglobin. A provisional diagnosis of splenic anemia of infancy was made. Hydralazine, 4 gr. t.d.s., together with a bismuth mixture, were given. On the seventh day the movements were improved. This treatment was stopped in favour of medicinal injection over the region of the spleen. Distinct and steady improvement followed the injections. The diarrhoea gradually ceased and the child's appetite, though still below normal, was much smaller weekly smaller week by week. On September 17th he was put on syrup, ferri iodide, 10 minims t.d.s. On October 4th a blood-count showed 40 per cent. of haemoglobin, and 10,000
Mr. Philip Turner showed a case of double-retained testicle, in which the left testicle was transplanted to the right side of the scrotum and the right testicle to the left side. A boy, aged 16, had a painful enlargement of his right testicle and was admitted to hospital for double inguinal hernia with imperfectly descended testicles. Both testicles, which appeared to be ill-developed, could be palpated in the inguinal canals; they had never descended into the external scrotum. The hernia was successfully operated upon, and each testicle was transplanted to the opposite side, an interval of two months ensuing between the transplantations.

Mr. Turner also showed (3) a case of double retained testicle in which the right testicle only had been transplanted. He proposed to transplant the left testicle later. (4) A case of seasonal enlargement of the parotid glands. The patient, a boy, aged 11, had a painful enlargement of both parotid glands every spring and autumn for the last nine years. The other salivary glands were not affected, and the boy showed no other abnormality except that he was unusually sensitive to cold.

Dr. Frederick Langmead showed a case of chondroplasia, pseudo-tachitis, in a female infant aged 6 months. Many signs and symptoms were present, but the 'head and neck' were proportionately short compared with the body, and the finger-tips with arms extended reached only to just below the crest of the ilium. On this account the provisional diagnosis of achondroplasia had been made, although amoeba in the head and hands had a characteristic appearance.

Dr. J. L. Burch showed a case of keratoconjunctivitis simillaris spinulosa in a boy, aged 4. Lesions had first been noticed about 14 months ago on the neck and later on the arms, back and abdomen.

Dr. C. O. Hawthorne showed a case of acholuric jaundice. The patient, a girl, aged 1 year and 3 months, was a first-born child, said to jaundiced from birth. She had jaundice, considerable enlargement of the right side of the liver, no bile in her urine, and normal stools. Blood examination showed white cells, 14,500 (polymorphs, 8,18; small lymphocytes, 472), large mononuclears, 6,8. The blood serum contained bile pigment.

Dr. Hawthorne also showed a case of paramyxo-ovarian multiplex. The patient, a boy, aged 6, was said to have been jaundiced since birth. There were frequent, quick, clonic contractions, most marked in the abdomen. A paint brush was used to show the upper arms, thighs, cremaster muscles, and to some extent in the face. The contractions were bilateral, but the two sides were not always affected simultaneously.

Sir Wm. Collins has been again elected President of the University of London Graduates' Association, in succession to Lord Monkton, F.R.S.
symptoms were those of ectopic pregnancy, but he considered it more likely that the supposed abortion was really an abortion, and that between that and October 14 there had been an acute toxemia of pregnancy.

Dr. E. H. Tweedy read notes of a case of severe hyperemesis gravidarum, where recovery was shown to have followed from a very severe and exhausting attack by insisting on abstinence from all food, and the administration of rectified spirits with the amount of four pints in twenty-four hours. There was accumulative clinical evidence to show that the majority of toxemic conditions were due to food. The processes which normally loaned these toxic symptoms to the bodies were undoubtedly interfered with in pregnancy, and it was reasonable to conclude that this interference was connected with the foreign albumin derived from chorionic villi, which was known to circulate in the blood. He suggested that the efforts to neutralise this foreign albumin caused a diminution in the blood of normal food antibodies. Morning sickness was an effort to eliminate food which had failed to combine with its proper anti-body. The consequences of this failure was the measure of severity in toxemia. Clinical evidence was convincing on the following points:—Food, even milk, could induce vomiting or convulsions. Injuries from food were due to (1) irritation or (2) fever, both of which followed the earliest processes of digestion. Carbohydrates and proteids were equally injurious. When it was once admitted that food could to some extent increase the severity of toxemia, it was not logical to limit the amount of any injurious action.

Dr. FitzGibbon said he thought it was the toxins produced by the decomposition of food that were the primary cause of the toxemia. By not allowing constitution to develop, toxemia could be produced, where there was toxemia the administration of purgatives rapidly got rid of it. He considered that the experience in most cases of eclampsia was that the patient had (1) a history of constipation. In his opinion of the composition of excreta, the number of cases of eclampsia would be diminished. The exciting organs of the pregnant woman became over-taxed in the effort to excrete the waste products of the pregnancy plus the abnormal products of decomposition of food, and consequently toxemic symptoms developed.

Professor A. Smith said most of them recognised the cases of hyperemesis as reflex, nervous, and toxemic. The latter was looked upon as coming in the second month. He noticed that Dr. Tweedy's patient vomited every twenty minutes, and therefore all food was rejected; hence, he could not think that food determined the condition. He suggested that the food was of fetal origin. He would administer distilled water, and would consider the exhibition of bicarbonate of soda or anything of that nature wrong. The ordinary enema ought also to be given.

Dr. Solomon said that the greatest difficulty in these cases was to know how long to leave the patient before inducing labour. He considered that Dr. Tweedy must have had a great temptation to empty the uterus when he advised his patient to lie down for ten months. He did not know what the patient was a primipara, but if so, he suggested that she would require careful watching for signs of eclampsia when approaching confinement.

Dr. Macull said it seemed to him that during the months of pregnancy an equilibrium was established which might be upset in later months. He suggested the possibility of the condition being due to the absorption of poisons from the intestinal tract, aided by excessive secretion of bile, and the due functioning of the glands were known to be hyper-toned during pregnancy. He did not think the so-called ammonia-nitrogen co-efficient in these cases would be of much use as a diagnostic sign. He agreed as to the harmful effects of food, but felt more sure of toxemia. He recalled a very serious case exemplifying the danger, where a severe attack of toxemia followed a mild attack owing to the premature administration of a little milk.

The President said that the majority of these cases were hysterical, and, for them, treatment such as that given to a hysterical patient was satisfactory. From his own cases of toxemic hyperemesis he had concluded that the best results were got by terminating the pregnancy when the patients did not react within a reasonable time to the usual treatment for the toxemia. His experiences in these cases were that while the food was injurious to a patient suffering from severe toxemia of pregnancy, it was difficult to see why food alone should be the cause of the toxemia.

Dr. Tweedy, replying, said he brought the paper forward to get an expression of opinion as to the exact cause of these cases. Food could lend its aid to poisoning a patient he would like to know how much aid it could lend. He believed that hysteria acted largely in these cases, but thought that even in the most hysterical cases the toxic effect must take place. The primary cause of the vomiting in every case was the toxemia, and he maintained that the toxemia was due to food. During his experience at the Rotunda Hospital he had never seen a death from hyperemesis. Milk was the most harmless of all foods, but even it would poison the patient. If the cause of toxemia was of fetal origin, he was at a loss to know how a cure could ever be brought about by a milk diet.

NORTH OF ENGLAND OBSTETRICAL AND GYNECOLOGICAL SOCIETY.

MEETING HELD AT SHEFFIELD, NOVEMBER 14TH, 1914.

The President, Dr. Willett (Liverpool), in the Chair.

EXHIBITS OF SPECIMENS.

Dr. HELLER (Leeds) exhibited a specimen of cystic sarcoma of the uterus, removed from a multipara, at 46. Menstruation had been irregular and infrequent for two years, and the patient had noticed a steady growing of the abdomen, which had reached the size of a four-months' pregnancy. The tumour was removed by supra-vaginal hysterectomy, and was then found to be converted into a multicellular cyst filled with yellowish serous fluid.

Dr. GEMMELL (Liverpool) exhibited a specimen of fibroids complicating pregnancy, from a primipara, at 41. In this case it was considered safer for the patient to have the pregnant uterus removed than wait for Caesarean section.

Dr. Stokoes (Liverpool) exhibited a specimen of fibroids complicating pregnancy, from a primipara, at 81, five months' pregnancy. The fibroid had undergone cystic degeneration.

Mr. W. R. FAVELL (Sheffield) related a case of labour obstructed by fibroid, from a nullipara, at 37. The patient had been in labour for a week, during which time meconium was passed and fetal movements ceased. The child was dead and presented by the breech. Pan-hysterectomy was performed.

Mr. W. R. FAVELL (Sheffield) read the notes of a case of chorioepithelioma, from a patient, at 25, whose only pregnancy ended in a two months' abortion in September 1910. Uterus removed a year later with mass behind it with a history like ectopic gestation. Later a small bleeding growth in vagina removed. Patient now gaining weight.

Mr. Miles H. Phillips (Sheffield) described a case of hydatidiform mole in an eleven months' pregnancy, removed from a multipara, at 56; married 33 years. The uterus consisted of a thin-walled cyst lined with columnar cells. The cervix was blocked with fibrous tissue.

Mr. W. W. King (Shffield) read the notes of a case of concealed accidental haeorrhage, with hæmatoa in broad ligament, treated by Caesarean hysterectomy.

Mr. W. W. King (Sheffield) related a case of acute hydraminos in a 9,-para, at 30; six months pregnant. The symptoms were rapid enlargement of uterus with great tenderness and abdominal pain. Delivery was followed by severe post-partum hæmorrhage.
CORRESPONDENCE.

FROM OUR SPECIAL CORRESPONDENTS AT HOME.

SCOTLAND.

BELGIAN DOCTORS’ AND PHARMACISTS’ RELIEF FUND.

The following letter, signed by the Presidents of the three Scottish Medical Corporations, has appeared in the press:—‘December 14th, 1914. Sir,—May we have the courtesy of your columns to intimate to the medical profession here and throughout Scotland that steps are being taken for the formation of a Scottish Committee in connection with the ‘Belgian Doctors’ and Pharmacists’ Relief Fund,’? According to recent information in our possession, the condition of the civilian doctors and pharmacists is deplorable, and their need is very great.”

EDINBURGH UNIVERSITY GRADUATION.

At the graduation ceremonial on the 18th there were 13 graduates in the degree of M.D., 1 in M.B., C.M., and 33 in M.B., B.Ch. A number of the graduates were their academic robes over naval and military uniform, and Prince Louis of Battenberg, this year’s President, took the degree of Doctor of Laws. The graduates, said that they now took their own place in the national life, and the place they would occupy depended on their own exertions. When he took his degree the medical profession looked for its work and reward. Matters were very different now, on account of the great development of preventive measures and the growth of a highly developed public health service. At present military necessities demanded many more doctors than in time of peace, and there was especial need that young graduates who had not settled down in practice should consider that field of work. In the University of Edinburgh they were compiling a roll of those members who had joined up in the services, and they were happy to say that the roll now contained 1,500 names. The names included members of the staff, members of the teaching staff, graduates and students—men from all the Faculties. The graduates and students belonging to the Faculty of Medicine numbered 660. In speaking to them on this question, he must not forget to say that medicine had an important civilian side, because the civilian side of the nation was far larger than the combatant. The need for Army and Navy doctors had to some extent affected the wants of the civil population, and where doctors in the country had joined the services there was a risk in some districts of there being no proper medical advice available. This was a fact that young graduates should bear in mind, and he ventured to say that if in this direction many would equally be doing their duty though they did not go to the front.

SIR JOHN STRUTHERS MEMORIAL LECTURE.

The second of these Lectures (founded by the late Sir John Struthers) was delivered in the Hall of the Royal College of Surgeons, Edinburgh, on Wednesday, the 16th inst., by Prof. Symington, Belfast. The subject of the lecture was a study of the relations of the inner surface of the cranial wall to the outer surface of the brain. It was illustrated with a number of specimens, casts, and photographs. The conclusions arrived at were in the main negative, and the whole lecture was a destructive criticism of the work of anthropologists who have tried to draw far-reaching conclusions from reconstructions of the brain of primitive man from reconstructed skulls. It was shown that it was impossible to infer from the inner surface of the cranial wall what was the exact nature and degree of development of convolutions of the brain, and, for example, certain depressions on the skull had been regarded as representing the position of the superior temporal convolution, and their existence or non-existence as proving the existence or non-existence of the faculty of speech. Prof. Symington, however, that the alleged relation did not, as a matter of fact, exist, and that the depression in question was related to the second, not the first, temporal convolution. A very hearty vote of thanks was conveyed to the lecturer on the motion of Prof. Sir William Turner, who corroborated and agreed with the general accuracy of Prof. Symington’s conclusions.

VENereal DISEASES IN THE ARMY.

At the request of the military authorities, the Royal Colleges have arranged for some of their Fellows to deliver short addresses to the troops stationed in Edinburgh and the vicinity on the dangers of venereal diseases. As there are at present in Edinburgh so many troops that the expression “an armed camp” is scarcely an exaggeration, the need for attempting to prevent venereal disease among them is very apparent, and it is hoped that short addresses which deal was the question from the hygienic standpoint, may be of some service.

NEW LECTURER FOR SHEFFIELD UNIVERSITY.

A Glasgow graduate, Mr. William Macadam, M.A., M.D., B.Sc., D.P.H. Camb., has recently been appointed Lecturer on Public Health at Sheffield University. In taking the degree of B.S.C., Dr. Macadam did so “with special distinction,” and he graduated M.B., Ch.B, with honours in 1909, at the same time gaining the Brunton Memorial Prize awarded to the most distinguished graduate in medicine of the year. For his thesis embodying the results of two years’ research work in physiology under Prof. Noel Paton, Dr. Macadam received the degree of M.D. with honours in November last. Dr. Macadam has been for the last seven years a Medical Officer for Sheffield, and he will continue to hold that appointment along with his lecturership in public health.

HOSPITAL ON FRENCH COAST.

Dr. Cullen, who, as noticed in your issue of 18th ult, left the Border village of St. Boswell’s to take charge of a Voluntary Aid Detachment in the North of France, has written home. He says they are only a few miles from the front, and can hear the artillery duels going on quite distinctly both day and night. He describes the admirable position of the hospital as being quite a nice place, at Malo, a seaside resort. On the long promenade and excellent sands and beach troops, horse as well as foot, are more or less being constantly trained. The weather was at first bitterly cold, but at the time of his writing was nice and warm during the day. They had had several operations in the hospital, pretty big ones. Their staff is about 26 in number. The people there, says Dr. Cullen, are most polite, and appreciate the work that the various detachments are doing.

MEDICAL TREATMENT FOR SCHOOL CHILDREN.

The annual report on the medical inspection of school children in Govan parish was submitted on 15th inst. Govan Parish School Board has the largest school population under its charge of all the Scottish parish school boards, and was the first board in Scotland to institute the medical inspection of children. During the year to June 30th, the report states, a whole-time medical staff was instituted to meet the extra demands for medical inspection, and more especially for treatment of defective children. In previous years from 2,500 to 3,000 children were discovered by medical inspection to be in need of treatment, and of that number only some 45 to 50 per cent. actually received treatment. The benefit of the establishment of the treatment clinics is evident, and evidence was adduced during the year under review 3,373 children were treated for diseases of the eyes, defective vision, skin diseases, diseases of the ear, nose, and throat, and for dental conditions. In addition to the children referred to the clinic, the board has shown by the results that at least 618 children received satisfactory treatment by the family medical attendant. The total of examinations for the year was 22,212. The advisability of establishing similar schools in other parishes is clearly demonstrated, and the Board has decided to establish an experimental class for such children.

SUPPLY OF MEDICAL MEN.

Dr. John Barlow, President of the Royal Faculty of Physicians and Surgeons of Glasgow, was in the chair at a meeting of practitioners held in the Faculty Hall
on the subject of the effect of the war upon civil medical practice. Dr. Norman Walker, Convenor of the Scottish Medical Service Emergency Committee, gave an account of the steps taken to meet the difficulties which have arisen owing to the departure of practitioners summoned to take up military duty. It had been agreed to recommend that the fee offered to a locum tenens taking the work of a practitioner engaged in medical practice should not exceed five guineas per week. Arrangements were being made for retired practitioners taking up temporarily vacant practices, especially consulting-room work. Educational authorities were being asked to grant permission to school medical officers to give at least part of their time to general work. Another suggestion was that the visiting staffs of large hospitals and asylums should consent to a reduction of the numbers of their medical residents and assistant medical officers. Principal Sir Donald Macalister also spoke and mentioned that there were a thousand fewer medical students all over the country, some students postponing their qualifications; so that the dearth caused by the continual drain upon qualified medical men was going to be supplemented by a deficient supply.

LETTERS TO THE EDITOR.

[We do not hold ourselves responsible for the opinions expressed by our Correspondents.]

SERIOUS SHORTAGE OF MEDICAL PRACTITIONERS AND STUDENTS.

To the Editor of The Medical Press and Circular.

Sir,—The Registrars, Deans and other officers of the Schools of Medicine, and of approved scientific institutions throughout the United Kingdom, have been good enough to furnish me with returns showing the number of medical students in attendance this session, as compared with the number in attendance last year. As the statistics have an important bearing on many questions touching the future supply of qualified practitioners for the service of the nation, I would ask you to publish the following figures—

Decrease in Enrollments, October, 1914, as compared with preceding years:—First year students, 50 fewer; second year students, 217 fewer; third year students, 257 fewer; fourth year students, 211 fewer; fifth and (higher) year students, 300 fewer.

The aggregate number of medical students now pursuing their curriculum with a view to qualification is thus about 1,000 smaller than in 1913.

Unless many senior students return to their studies within the next few months, the result will be that the number of young qualified practitioners added yearly to the ranks of the profession will during the next few years be 800 less than at present. This is equivalent to a diminution of about 25 per cent. of the average number annually added to the Medical Register on qualification. The number annually removed from the Register by death or otherwise has for some years past been about 250.

In view of the additional losses among senior practitioners due, directly or indirectly, to the war, the prospective diminution of our reserve supply calls for serious consideration.

I am, Sir, yours truly,

DONALD MACALISTER,

President.

General Council of Medical Education and Registration of the United Kingdom,
26, Harley Street, London, W.,
December 10th, 1914.

PROFESSIONAL ETIQUETTE AND THE R.A.M.C.

To the Editor of The Medical Press and Circular.

Sir,—Will you give me your opinion in the next issue of The Medical Press and Circular on my action respecting the subjoined case?

On the afternoon of the 13th inst., a motor-car arrived at the infirmary and a messenger was sent to tell me that the officer commanding the troops wished to see me. I informed him that one of his men was suffering from appendicitis, and he wished to know if I could take him into the hospital, and if I had an operating room. I replied I would admit him with great pleasure, and that I had every means for operating.

He then introduced me to a man who was with him. He asked some time of how to get the patient to the hospital, his friend suggesting that an ambulance might be formed by aid of two motor-bicycles. I suggested that no better way could be than the use of the motor-car in which they arrived. This was agreed upon, but before starting for the patient some cases were being taken out of the car which evidently were containing instruments, etc., for operating. I at once informed the friend of the O.C., who is a surgeon (not R.A.M.C.), that I would not allow anyone to operate on my patient or in my hospital.

This rather disconcerted the O.C. and his friend. The former gentleman, after some conversation, told me that — was appointed Consulting Surgeon for the Troops and a Hon. Col. in R.A.M.C. I replied that did not matter. I would allow no man to operate in the hospital without my consent, and that I was prepared to perform any operation that might be necessary.

I will thank you to give your opinion as to whether my action was right or not under the circumstances, and would also thank any hospital surgeons for their opinions in similar cases. I have frequently operated successfully, both in the hospital and in private houses, upon similar cases.

I am, Sir, yours truly,

A. MAYNE,

Surgeon, Longford Co. Infirmary,

Infirmary House, Longford,

December 17th, 1914.

[The above letter arrived shortly before going to press. There was hope to answer next week the issue raised by our correspondent.—Ed. M.P. and C.J.]

PHYSIOLOGICAL PRINCIPLES IN TREATMENT.

To the Editor of The Medical Press and Circular.

Sir,—I am indebted to your reviewer for his appreciative notice of the third edition of my book on "Physiological Principles in Treatment" (Medical Press, December 16th), but on one point he seems to me to be a little unfair. He complains that I mix up grains and grammes, "as on page 200, where we are told that 250 grains of urea ... would represent an intake of about 50 grammes of urea. To notice, however, that the argument deals with grammes until I quote from Prof. Foxwell, and that I am stating the equivalents in grammes for the figures given by him in grains. Some of the other examples of my "slipped English" he quotes as obvious misprints, such as "minims" of blood-pressure. Very reprehensible, of course, but perhaps he will be more lenient when I call his attention to the fact that there are two misprints in his brief list of quotations from my pages! I am afraid that authors, like reviewers, being human, are liable to such errors.

I am, Sir, yours truly,

W. LANGDON BROWN.

60 Welbeck Street,
London, W.,
December 17th, 1914.

OPERATIONS FOR APPENDICITIS.

To the Editor of The Medical Press and Circular.

Sir,—The writer of the letter (Medical Press, December 9th) giving expression to the opinion that deaths from appendicitis were less frequent in proportion to the number of operations than they are now, thanks "Reviewer" for his reply. "Reviewer," however, makes no pretensions that those expressed are in any way wrong, but simply gives his opinion that a physician in these cases may be required to operate in comparatively less frequent intervals than in the past. If the bases of this opinion on the review of Mr. Owen's book on the subject in your journal, I quite agree with him that Mr. Owen's
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book is an excellent one; it is not for me to say one word against it. But even "Reviewer" would not claim that Mr. Owen's is the last word on the matter, and that nothing further can or will ever be said. Even Mr. Owen would not make such a claim. If "Reviewer" knew from his own personal knowledge what the writer of the letter knows from his own personal practical acquaintance with the subject for a period of over 50 years, he would rather trust his own senses, his eyes, his ears, and the learning at the tips of his fingers, than any number of reviews of any number of books, however good they may be.

When "Reviewer" has more experience and meets a case or two that has gone wrong after operation, when he had expected a brilliant success, he will perhaps wish that he had called in a physician to point out to him some of the objections to operation in the case. As, at least, he will fall back upon, and to comfort himself with the thought that nothing had been left undone that could be done.

It would be truly interesting to know your correspondent's experience of the operation; what has been his percentage of recoveries, the percentage that has been relieved by the operation, the proportion still left complaining (and these are not a few), the proportion that would have done at least just as well without it. He would remember that it is not his practice to leave with hernia in its wake. It would also be interesting to know something about the numerous unpublished cases, those that we hear about but never read about. In the early part of the writer's career a friend made the kind of mistake to which I referred, and that did a man no good to publish his unsuccessful cases. There are not a few others who seem to be of a like opinion. It must also be borne in mind that a physician would be rather in the position of a judge weighing the arguments of a paid advocate, and that his opinion would not be swayed by any unconscious bias.

I am, Sir, yours truly.

THE WRITER OF THE LETTER OVER THE SUBSCRIPTION "A PHYSICIAN."

Liverpool.

RHINORRHEA IN A SEPTUAGENARIAN.

To the Editor of The Medical Press and Circular.

Sir,—In answer to your correspondent "Expectant," I would advise a thorough examination of the nose with a view to determine the presence or absence of purus, ridges, polypi, deviation of septum, and especially "sensitive areas" usually found about the subnasum of the nose along the inferior turbinate bodies. Any abnormal condition found must be appropriately dealt with. In the case of sensitive areas, these must be treated with the galvano-cautery. With regard to internal medication, nitrogenous elimination should be promoted, and nerve tonics exhibited such as valerianate of zinc, iron or quinine, or preferably all combined. Atropine, though the most valuable of drugs, should only be administered for a short period—three weeks or so. When successful, this period of administration usually suffices. Of all measures at our disposal, the galvano-cautery seems one of the most valuable.

I am, Sir, yours truly.

H. CLAYTON FOX, F.R.C.S.

1 Weymouth Street, London, W.

December 16th, 1914.

THE PUBLIC PROSECUTOR AND THE SALE OF POISONS.

To the Editor of The Medical Press and Circular.

Sir,—With reference to some observations in your recently published Supplement, I would like to state that so far as I am aware there has never been publicly made any statement of the powers and functions of the Public Prosecutor. It seems probable that no one is aware of what these may be save that official himself and the authorities at the Home Office. He has never prosecuted in a single case of improper sale of poisons; he very rarely or never intervenes in cases of adulteration of food, which involve virtually the sale of injurious or poisonous mixtures. In only one case that I am aware of has he ever directed proceedings against a vendor of quack medicines, whether or not containing poisonous ingredients. This was the well-known case tried before Mr. Justice Lawrence at the Lewes Assizes some years ago. The judge stated that this was the first case of the kind taken up by the Public Prosecutor, and expressed the hope that it was only the beginning of a campaign against the abuses then exposed. Although "secret" cures are mostly made up of worthless, inert trash, a considerable proportion contains poisons. One example may be cited in the headache "cures" which, under fanciful names, have an enormous sale. These are made up of poisonous drugs having the power to subdue the senses. They must be responsible for much chronic illness and many preventable deaths. Headache is, of course, merely a symptom—often a danger signal pointing to some pathological process, systemic or local, which, taken in an early stage, may be amenable to scientific treatment, but certain to pass into a mortal phase if neglected. The Public Prosecutor would need a vast staff (a large Government department) to deal effectively with the creation of a drug which now goes unpunished owing to lack of any authority to deal with it. As regards the sale of poisons in any form, covert or open, it would probably be better to make the work compulsory on local governing bodies, perhaps under the guidance of municipal and county medical officers of health. If, as we may hope, the legislation proposed by the Select Committee on Patent Medicines be in due course carried, the sale of poisonous nostrums will be put an end to.

I am, Sir, yours truly,

HENRY SEWILL.

December 11th, 1914.

OBITUARY.

Mr. Bernard Pitts.

We regret to record the death of Mr. Bernard Pitts, M.A., M.B., M.C.Cantab., F.R.C.S.Eng., Consulting Surgeon to St. Thomas's Hospital, which took place on the 13th inst., after a long illness, at 66 years. The deceased, who qualified as M.R.C.S. in 1875, received his medical education at Cambridge to deal with St. Thomas's Hospital. In 1876 he acted as surgeon during the Turko-Serbian War, and two years later was appointed resident assistant-surgeon to St. Thomas's. From this time onwards until 1908, when failing health compelled him to resign, he served upon the surgical staff of St. Thomas's and also at the Children's Hospital, Great Ormond Street, teaching, lecturing, and doing his hospital work, in which he was indefatigable. He took a keen interest in the well-being of nurses after they had completed their hospital training, and almost from the beginning was an active member of the council of the Nurses' Cooperation. He was a member of the Court of Examiners at the Royal College of Surgeons in England, and an Examiner in Surgery for the Universities of Cambridge and Durham. Mr. Pitts was also Consulting Surgeon to the St. John's Hospital at Twickenham. He attained a high reputation as a bold and skilful operator. His death will be mourned by a large circle of friends and admirers.

BELGIAN MEDICAL MEN AND PHARMACISTS' RELIEF FUND.

Received at the Irish Office Medical Press and Circular.

Dr. John F. Fagan, Oldcater ... 1 1 0
Miss L. Rowlette, Stockholm ... 0 1 0
REVIEWS OF BOOKS.

SYphilology AND VENEREAL DISEASE. (3)
The first edition of this book appeared in 1906, and it is worthy of note that certain suggestions put forward in that by the author regarding the importance of syphilis as an astomatic factor in many morbid conditions have been strongly supported by serological research. The present third edition has been thoroughly revised and to a great extent rewritten. Syphilology is of such vast importance and ramifications that it is impossible to go into the details of the various diagnostic and treatment that it would seem impossible that it could be efficiently dealt with in one medium-sized volume. Yet in this book the author has not only thoroughly treated the various modes and symptoms, but has done it within many pages to gonorrhoea and chancroid. Dr. Marshall shall be congratulated, not alone on condemning so much instance to a small space, but also on presenting it in a clear and interesting manner. Th. author has a deep knowledge of the subject and has spared neither time nor trouble to produce good work. We strongly recommend Dr. Marshall's book to every practitioner, no matter to what branch of the profession. The arrangement of chapters renders it easy to look up any point without waste of time, and so the book is convenient for reference. It also can be read right through with interest and profit, not alone by the general practitioner, but by those who make a special study of venereal diseases.

Savill's CLINICAL MEDICINE. (2)
Among the difficulties with which the student of medicine has to contend when confronted with a materia medica, that of the right interpretation of the symptoms and signs of disease. In other words, the art of making a differential diagnosis from the patient's description of his malady and from the signs as described by previous examination can only be acquired by the diligent comparison of one disease with another similar one, and by carefully weighing the evidence for and against obtained thereby. Works on systematic medicine, in which the diseases are considered subject in detail, are necessary for the thorough and academic study of medicine, but they nearly always fail to impress upon the learner the importance of being able to trace the course of an illness from its first symptoms to the final stage and its effects as manifested by symptoms. The plan adopted by the late distinguished author of this valuable text-book, the fourth edition of which has been brought up to date by Dr. Ads. and Dr. C. is to approach the subject from the standpoint of symptomatology. Thus in considering the disorders of the intestines the dental symptoms are first mentioned, viz., diarrhoea, constipation and abdominal pain. The physical examination necessary for making a correct diagnosis is next described, viz., the examination of the abdomen and the investigation of the face. Having ascertained that the patient's symptoms is referable to the intestinal canal, the attention of the student is then directed to the numbered paragraphs which follow dealing with each disease separately. Thus a "clinical index of diseases" is available which may be profitably studied for the useful purpose of forming analogies and of weighing evidence. The general plan of the work is similar to that which obtained in the last edition which appeared only two years ago. The section on affections of the heart has been completely re-written and much additional information has been supplied. This section deals with diseases of the nervous system and the skin are particularly helpful.

(3) "Syphilology and Venerable Disease." By C. F. Marshall, M.B., MSc., F.R.C.S., etc. Demy 8vo., pp. xxii., 462, and 452, 1914. Price 10s. 6d. net.


Essentially a learner's text-book, Dr. Savill's work is not only a comprehensive treatise on practical medicine, it is also a compendium of clinical laboratory methods and sick-room helps. In short, this system of clinical medicine may be relied upon to afford valuable assistance to students and practitioners.

THE CHILD'S DIET. (4)
The second edition of Mr. Cargraven's handbook is an amplification of the first, and as it contains a plain and straightforward account of the proper way to feed a child at all ages it may be welcomed by those on the look out for a suitable guide on the subject. The author is great upon the necessity for reducing the starch and sugar in a child's diet and for supply- ing the necessary minerals in a suitable and absorbable form. The teachings of modern physiology at his back. There can be little doubt that much harm is done to the digestive organs of infants and young children by overloading the stomach with carbohydrates. A whole chapter is devoted to the importance of thorough mastication and the care of the teeth. Many useful recipes and diet-tables are given, as well as lists of foods which may and may not be allowed in the com- mon diet of children.

We hear that the American Government has placed with Messrs. Churchill a large order for the work "Operative Surgery" by Professor Edward H. Taylor of Dublin, recently noticed by us. The work is to be supplied by the Government to surgeons in the United States. We are glad to notice this signal compliment to Irish surgery.

The "Calendar of the National University of Ireland," for 1914 (Dublin: A. & Thos. and Co.) is a comprehensive volume. It contains the text of the Irish Universities Act (1908), of the University Charter, and of the various statutes already made, with forward particulars of all the courses of study and of the three constituent Colleges.

Vol. I. of the "Dublin University Calendar" for 1914-15 contains also the ordinary papers set in Arts in the year 1913-14. The present haphazard division of the Calendar into several volumes, the contents of which overlap, is peculiarly inconvenient, and we cannot think what class of readers it is intended to suit. We do not find any evidence of increased accuracy in this volume. For instance, we note that the date of the first election of the present Professor of English Literature is given as 1810, although the chair was held by the late Dr. Dowden until his death in 1813. Inaccuracy seems to be a property specially associated with academic publications.

We have received "from Messrs. J. and A. Churchil a little brochure, entitled "Remedial Exercises in School and School Clinics," by R. C. Fleishie, M.S., F.R.C.S. The author roughly divides the cases into three classes: (1) Certain cases—viz., those in which the deformities are purely postural, which can be treated in classes of small size, ten to twelve; (2) cases where individual treatment is necessary. (3) cases with fixed structural deformities in which remedial exercises can only be a part of the treatment, the rest of which must be carried out by
We have pleasure in greeting an old acquaintance in the 1915 edition of "Hazell's Annual" (now in its thirteenth year) of the extraordinary extent and variety of the information compressed into this book may be gathered from the fact that there are now close upon 20,000 index entries. The articles devoted to "The Welsh Church Act" and "Plague" are among the fifteen pages. The graphic description of the incidents which led up to the outbreak and the subsequent march of events, indeed, make of "Hazell's Annual" for 1915 a valuable historical document. Another special article deals with the international treaties and with the main points of international law; while yet another sums up the present and future position of the labour movement to the war. The pressure of war news prevented the daily Press from doing justice to the important meeting of the British Association in Australia. The editor has been fortunate in securing from a special Press representative who accompanied the English visitors a most interesting account of the complex proceedings. The accompanying the Welsh Church Act should be in the hands of all who take an interest in religious matters; while other special articles of judicial impartiality are those on the Land Question, the Report on the Convocation on Legal and the Royal Commission on the Civil Service. We have no hesitation in saying that "Hazell's Annual" has, with its thirteenth issue, entered on a entirely new career of usefulness as an indispensable work of reference. As a book of general reference on a host of subjects, the busy medical man could not wish for a better book than "Hazell's Annual," whose familiar red covers have graced many consulting-room desks in ages past, and doubtless will for many ages yet to come.

**MEDICAL NEWS & PASS LISTS.**

The King Edward's Hospital Fund for London. At a meeting of the Governors and General Council of the King Edward's Hospital Fund held last week for the purpose of deciding on grants to hospitals, convalescent homes and sanatoria for the present year, a letter was read from the King expressing His Majesty's hope that the pressing needs of the voluntary hospitals during the present crisis will not be lost sight of. The Fund may receive such support as to be able to increase its annual distribution next year." The sum fixed for distribution among the London hospitals was £133,500, as compared with £154,000 in 1914. In many cases the Fund has increased the grants made to hospitals for purposes of maintenance, which was considered to be the most effective way of helping these institutions in their present circumstances.

Sir John Struthers Lectureship. Dr. JOHN SYMONDY, F.R.C.S.Ed., F.R.S., Professor of Anatomy, Queen's University, Belfast, delivered the second of the Struthers Lectures in the Hall of the Royal College of Surgeons of Edinburgh, on the 16th instant, the subject being "Observations on the relations of the inner surface of the cranial wall to the outer surface of the brain," illustrated by specimens, casts and photographs.

University of Durham. At the Convocation held on Thursday, December 13th, 1914, the following degrees in the faculty of medicine were conferred:—Bachelor of Medicine (M.B.)—Arthur C. Freeth, St. Mary's Hospital, London; William W. Farleigh, London School of Medicine for Women; Ernest C. G. Parker, College of Medicine, Newcastle-upon-Tyne; Home Playfair-Robertson, St. Bartholomew's Hospital; Sarah L. Rook, College of Medicine, Newcastle-upon-Tyne.

Bachelor of Surgery (B.S.)—John B. Alderson, M.B., College of Medicine, Newcastle-upon-Tyne; Grace W. Farleigh; Sarah L. Rook.

University of Cambridge. At a Congregation held on Saturday last the following degrees were conferred:—M.D.—H. G. P. Castellain, Trinity. M.B. and B.C.—S. G. Platts, Cauns. M.B.—F. G. Rose, St. John's.


Royal College of Surgeons of Edinburgh—The Fellowship. At a meeting of the College held on Thursday last, the following gentlemen, having passed the requisite examinations between October 5th and 8th, 1914, were admitted Fellows (F.R.C.S.Ed., Edin.):—In alphabetical order:—J. Adams, M.B., Ch.B.; Howard Barrie, M.R.C.S.Eng.; Francis J. Browne, M.B., Ch.B.; Herbert E. Chutterback, M.D., C.M.; Pteamandama Das, L.M.S.Calcutta, L.R.C.S.Ed.; John Flynn, L.R.C.S. (Trip); Arthur James Freeth, M.R.C.S.Eng.; John Kirk, M.B., Ch.B.; Leonard H. McBride, M.D. New Zealand; Percy J. P. Stewart, M.B., Ch.B.; William G. Thompson, M.D.; Thomas J. Williams, M.D.Iowa, L.R.C.S.Ed.
Army Medical Service.

The following appointments have been made:


Private T. A. Marlborough (1869), R.A.M.C., No. 6 Field Amb.—Highly commendable conduct on October 26th, when he helped to carry a wounded officer and men from collecting station to ambulance wagon over fire-swept ground several times. Has performed constant work during the campaign.

Private K. Mears (7191), R.A.M.C.—For exceptionally good work at the dressing stations at Bucy le Long and Ste. Marguerite, during the bombardment of September 14th to 18th.

An officer of the R.A.M.C., now in hospital in France, contributes the following to the Morning Post:

“We have had a good deal of very gruesome work to perform, but the wounded are so grateful for anything that little thing we can do for them that it, in a measure, takes off the horror of their wounds. The motor ambulance wagons in this campaign have done splendid work, and our task and anxiety have been greatly relieved by this efficient means of evacuation of the wounded towards the base. This war is practically one of machines worked by human beings for people we have been dealing with. We left England, and seemed very odd to see motor-cars running along the roads and motor-cycles ridden by despatch riders instead of the old-fashioned horse-mounted orderly, but once we’re used to it, and the poor old horse is beginning to look a little old-time, I think the war will last much longer. I do not think human beings can stand the awful strain of the constant firing of shells. Our soldiers, I think, are magnificent, and deserve well of their country. We see a good deal of English newspapers. They contain snippets, except in the case of one or two of the better class ‘dailies.’”

The following letter from a surgeon on board a British hospital ship now at the French coast is also published in the Morning Post:

“We have had a very busy time, but it was quite a treat to have something to do and to feel that one was being useful, though I wish it had been our own people we were dealing with. We left England on Thursday morning in the same gale in which the Rohilla was wrecked. We got under way at daybreak, and brought up for the night off Yarmouth, as it was too dangerous to the mines and no lights. At daybreak on Friday we were off again, and reached our destination close to the fighting line at about 6 p.m. Owing to the tide we could not get into dock until 11 p.m. Lying outside the harbour we could see the gunners on the battleships of big guns—I suppose those of our ships. Numerous aeroplanes were going about. I was up nearly all night. Our first patients were due at five o’clock in the morning, but they did not arrive until a quarter past six. We took on 622 men, including twenty-eight Germans, and about forty officers, getting them all on board in about three and a half hours, which I think was not bad, as about 300 of them could not move, and had to be hoisted on board. All had bullet holes or shrapnel wounds. We finished dressing them 5 p.m., when I got some breakfast—the first chance during the day. We then started operating on the more serious and urgent cases, gangrenous wounds, etc. Five died, on the way down. I think we had every type of French soldier: Turcos, Soudanese, and all. We are supposed to carry 250, so you can imagine the sight below. Luckily it was fine, or we should have been in a nice state! War is indeed a very busy business, but we had too much to do to be sentimental.

Most of the men were ravenous, having had no food for two or three days. The unfortunate Germans had only been wounded ten days before, and not one of them had had any sort of attention. Some had been shot clean through the chest, and had their clothes sticking to their wounds. What some of them had gone through and yet kept alive was surprising.
NOTICES TO CORRESPONDENTS.

THE MEDICAL PRESS.

"We left the same day and reached this place in due course. It was full of wounded, and we have again been busy bringing them on board and attending to them. I have lost a day somewhere, but as I did not have more than five hours sleep in forty-eight hours you must excuse it. We expect to take in more patients at daybreak to-morrow."

The following account of his experiences at the front is contributed to the Chatham News by Dr. Arthur Bullock, a Civil Surgeon on service with the R.A.M.C. attached to the 4th Middlesex Regiment—

"On Saturday we had a shell right into our headquarters, but fortunately only one man was hurt, and he is not seriously injured. I think the Colonel saw it as he was inside at the time, and we are lucky we did not see the Colonel at headquarters I had to take shelter with him and several other officers for over an hour in a large dug-out behind some haystacks, as shells were dropping all round. The other night three of our boys went out from our trenches under fire to try and bring in one of the men of another regiment, who was wounded. They were fired on by the Germans, two being killed and the third wounded, but the man was got to safety, and is now recovering."

"Last week I recommended my medical orderly to the Colonel and Adjutant for promotion. He has now been corporal. He has done very good work, and has been very useful to me. One day last week a shell burst right on the house that was being used as a hospital by the Medical Officer of another regiment, tearing an enormous hole in the ground, about ten feet in diameter, and taking a huge piece of the side of the house when it arrived. It killed the orderly, and wounded very seriously wounded. Fortunately, the M.O. escaped."

"Last week I had an officer in the 15th Indian Lancers and his Indian trumpeter brought in, wounded by shell; they spent the day with me, till the news came that an Indian trumpeter had been brought in. Another day last week a town was being shelled just behind us, and the church was set on fire. Fortunately, only the spire was damaged, but it was very exciting watching it from where we were watching it."

"Shells are most terrifying things, though of course we are quite accustomed to them now, but one cannot afford to ignore them. You suddenly hear a peculiar whistling in the air, as of a body travelling at high speed—which, of course, it is—and though you cannot see them, you can judge of the direction in which the shell is travelling, and more or less the distance away by the character of the sound and its audibility. At the end of a house is a huge burst of shell bursting, and a cloud of smoke. Some shells burst in the air, the particular point at which they burst being determined by a time fuse attached to them. These are known as shrapnel. You see a cloud like a puff of smoke in the air, followed by a flash and a crash. When the shell bursts it leaves very large quantities of bullets, which scatter in all directions, as well as ragged fragments of iron from the casing of the shell, which latter give most horrible penetrating and lacerating wounds."

"The shell is on an average 18 inches or more high, with a diameter of 2 to 4 inches. The other kind of shell is known as a high explosive, and the idea is that it explodes on impact and not in the air, bursting as soon as it hits anything, and blowing up whatever it hits; hence the latter is used to shell buildings. I was in the farm we were using as our headquarters the other day, when the Colonel went down to observe how a house began to shell the house with this high explosive. Fortunately it did not hit the part of the building we were in, but there was a fearful crash, accompanied falling thick tiles, and broken glass. The concussion is sometimes terrific, and though a house may not actually be hit, the force of a bursting shell close by is sufficient to break the windows. In the instance I mentioned, clear windows went flying for half an hour or more in the ceilings till the bombardment ceased. You will understand from this that one cannot ignore these engines of destruction or afford to be careless. The safest place if there is much shelling going on is a trench, or dug-out, in the open, because although a shell may not actually strike the room you are in, the missile has great penetrating power, and may go right through a roof, and through the floor below into the wall, and destroy the masonry and débris with it, which latter may cause serious injury, quite apart from the shell itself. So it is our rule if a building is struck, when we are in it, to clear out. If you are walking along, and a shell bursts close by, and if dug-out is available, the safest thing to do is to fall down flat on one's face. I have not had to do this yet, but have frequently had to take cover in some way or other. Otherwise, you will see that one has to walk circumspectly, and keep one's eyes and ears open."

Three hospitals units in the Scottish Federation of the National Union of Women's Suffrage Societies have now been organised by Dr. Elsie Inglis, staffed entirely by women for service at the front. One of these has already left this country and is accompanied by Miss Irena, M.S., as chief surgeon, and Dr. Agnes Savill as X-ray worker.

The Queen Alexandra Hospital Ship, formerly known as the Patulina—a 120-ton steamer—has been purchased by the Royal National Lifeboat Institution, and recently announced, has now been equipped under the supervision of Sir Frederick Treves, and is ready to begin her beneficent work.

NOTICES TO CORRESPONDENTS, &c.

CORRESPONDENTS requiring a reply to a column are particularly requested to make use of a Distinctive Signature Initial, and, in the case of the后者, "Reader," "Subscriber," "Old Subscriber," etc. Much confusion will be spared by attention to this rule.

SUBSCRIPTION.

Subscription rates for the year 1914 is £3 15s. 0d. per annum, payable in advance. For India, Marseilles, The Hague, and other Continental cities, and for the Colonies, subscriptions are £3 12s. 6d. In New Zealand and Australian Colonies, subscriptions are £2 12s. 6d. in New Zealand and Australian Colonies, £2 12s. 6d. in New Zealand and Australian Colonies.

ADVERTISEMENTS.

For Our Inscription to the Page, Half Page, £3 10s.; Quarter Page, £2 5s.; One-eighth, 12s. 6d.

The following reductions are made for a series:—Whole Page, 15 insertions at £2 5s.; Quarter Page, 10s.; 15 insertions at £2 10s.; 20 insertions at £3 5s.; 30 insertions at £3, and pro rata for smaller spaces.

Small announcements of Practitioners, Assistants, Vacancies, Books, etc., are inserted for 7d. per line, not exceeding 70 words.

Original Articles or contributions intended for publication should be sent by the post on one side of the paper only and must be authenticated with the name and address of the writer, not necessarily for publication, but as evidence of identity.

Contributions are kindly requested to send their communications, if resident in England or the Colonies, to the Editor at this office; if resident in Ireland to the London office; if resident in the United States, to the New York office; if resident in the Dominion of Canada to the Toronto office; if resident in the Colonies to the Chief Office of that Colony. However, contributions must be of a character likely to appeal to a wide public and such as will be of permanent value.

Reprints.—Reprints of articles appearing in this Journal may be had on application to the publisher, at the rates and in the form prescribed, otherwise notice to the publisher or printer at the rates may be distributed.

This should be done when returning proofs.

Dr. G. F. C.—Your interesting "Clinical Note" is unavoidably held over until our next issue.

Mr. T. J. D. (Newcastle).—Bonds not to practice are held necessary for the proper control of the medical profession. All hospitals for the simple reason that they seldom stay long enough in the institution to secured in establishing a connection with patients conducted in a proper manner. The medical profession and the medical profession and the medical profession are the doctors who are not residents of the hospital at the time of their appointment to that hospital.

M.D., M.R.C.P. (Manchester).—The little book, "Physiological Principles in Treatment," by Dr. J. Langdon-Brown, a third edition of which has just made its appearance—will give you the information you seek in succinct and practical form.
The Albert Kahn Travelling Fellowships—It is announced that the Trustees of the Albert Kahn Travelling Fellowships, after consultation with the Foundation, have decided not to make any election to the Fellowships for the year 1915-16. It is to be understood that the present time is not a suitable period for the election of candidates, particularly in view of the fact that in the existing circumstances serious health circumstances may be derived from applying for or being elected to Fellowships by reason of their employment on military duties or for similar reasons.

S. J. E. (Edmonton).—Our correspondent will find all she is likely to need in "How to Take Care of the Sick at Home," by W. R. published in the Public Library, by the Women's Industrial Council, 7, John Street, Adelphi, W.C. 4.

Dr. J. M. (St. John's Wood, N.W.4).—Your communication arrived just as we were going to press. It will be answered privately.

ST. KATHARINE'S HOSPITAL.

We have received intimation from the management of this ancient charity, founded originally at Tower Hill, and subsequently removed to Regent's Park, in connection with the recommended improvements, that the charity have that a house in Brunswick Road, Poplar, has been claimed as a college for the training of health visitors, in accordance with the provisions of the revised scheme.

J. W. R. (Norwich).—The latest official report of the Registrars-General, and the newly-minted coin of your city is £15 per 1,000 inhabitants. This is an immense improvement and comes most favourably with the rate charged in the past.

Dr. J. M. (Clifton Hill).—Will appear in our next.

Vacancies.

Royal Cornwall Infirmary, Truro.—House Surgeon. Salary £150 per annum, with rooms, board, and washing. Applications to the Secretary.

Clayton.—Senior House Surgeon. Salary £150 per annum, with board, lodging, and laundry. Applications to the Secretary.

Royal Waterloo Hospital for Children and Women, S.E.—Resident Medical Officer. Salary £150 per annum, with board and washing. Applications to the Secretary.

Nottingham General Hospital.—Senior House Physician. Salary £120 per annum, with board, residence, and laundry. Applications to the Secretary.

Tunstall and Somerset Hospital, Tunstall.—Senior House Surgeon. Salary £120 per annum, with board and washing. Applications to the Secretary.

Royal Infirmary, Preston.—Assistant Resident Medical and Surgical Officer. Salary £150 per annum, with board, residence, and washing. Application to Walter Barlow, 5 Webley Street, Preston.

Kent County Asylum, Maidstone.—Junior Assistant Medical Officer. Salary £150 per annum, with board, residence, and washing. Applications to the Secretary.

Warrington Infirmary and Dispensary.—Senior House Surgeon. Salary £150 per annum, with board, lodging, and laundry. Applications to J. H. J. Hampton, Secretary.

Bradford.—Assistant Resident Medical Officer. Salary £150 per annum, with board and washing. Applications to George M. Crowther, Clerk to the Committee, 22 Airedale Street, Bradford.

Certifying Factory Surgeons.—The Chief Inspector of Factories has appointed the following vacant appointments:—Hamilton (Lanarkshire), Ralpshire (Co. Down), etc.

Appointments.

DENTAL.—Eaton, M.D., R. S. Lyons, F.R.C.S.Edg., Surgical Registrar to the Borth Hospital, London; Johnstone, T. M., Ch.B.Edin., Lecturer and Demonstrator in Pathology, Charing Cross Hospital, London; Kellie, John B., L.R.C.P., & S., Assistant Medical Officer to the Borth Infirmary, London; Lower, E. M., B.S.Edin., Clinical Assistant to the Throat, Nose, and Ear Department of the Royal Free Hospital, London; Martin, J., M.A., Ch.B.Edin., School Medical Officer and Assistant Officer of Health to the Borough of South Shields; O'Dowd, E. W., M.D.Lond., M.R.C.P.I., Acting Assistant Physician to the Royal National Orthopaedic Hospital, London; Pickard, E., M.D., B.S.Edin., Medical Registrar to the Royal Free Hospital, London.


December 10th, at 18 Gordon-road, Ealing, the wife of the late E. S. Corbett Thompson, L.M.S., a daughter of Mr. and Mrs. George E. Oakley, of Oakley, Herts, is dead. MRS. HUTTON-ATTENBOROUGH.—On December 10th, at 19 St. George's Square, Stamford, to Dr. and Mrs. E. A. Hutton-Attenborough.

SIMPSON.—On December 10th, at Woodland, Shoot-up-Hill, N.W., the wife of Dr. Simpson, M.B., M.R.C.S., a daughter of Mr. and Mrs. Simpson, of 20, Wellington Crescent, London, W.11.

SINN.—On December 10th, at Ashby Parva Rectory, Lutterworth, the wife of Captain H. C. Siddwick, R.A., a daughter of Mr. and Mrs. Sinn, of 11, Rectory Road, Northampton.

SMITH.—On December 10th, at Richmond House, High Street, Maidenhead, the wife of J. B. Smith, F.R.C.S., a daughter of Mr. and Mrs. Smith, of 42, Maidstone Road, Hillhead, Glasgow.

WILLIS.—On December 10th, at St. Barnabas Church, Beckhill-on-Sea, John Hudson Oliver, B.A., M.B., R.C.H., elder son of Mr. Charles Henry Oliver, of Cambridge and Prestwick, Ayrshire, to Grace Georgina, daughter of Mr. G. Willis, J.P., and Mrs. Willis, of St. Kitts, Beckhill-on-Sea, and Greenwell.

Deaths.

FLANAGAN.—On December 10th, at Fenchurch, Madeira, Taverae Wolffe Flanagan, M.B., third son of the late Mr. Justice Flanagan, of Flanagan, aged 55.

Lawson.—On December 10th, at Kirkcaldy Village, W., Regent's Park, James Ward Lawson, M.R.C.S., L.R.C.P.

LECKIE.—On December 10th, at 28th Street, Brussels, Belgium, Captain Malcolm Leckie, B.M.O., R.A.M.C., younger surviving son of James Blyth and Selina Leckie, Croydon, Sussex, and formerly of Blithedale, Kent.

MAXWELL.—On December 8th, at Kirkby, Notts, Hugh Samuel Maxwell, M.B., Ch.B., and of St. James's and St. George's, London, aged 50.

PITT.—On December 13th, after a long illness, Bernard Pitts, M.A., M.C., Cantab, F.R.C.S.Edg., Consulting Surgeon to St. Thomas's Hospital, and formerly of the Great Ormond Street Hospital for Children, aged 66.


OPERATIONS—METROPOLITAN HOSPITALS.

WEDNESDAY—St. Bartholomew's (1.30 p.m.), University College (2 p.m.), Royal Free (2 p.m.), Middlesex (3.30 p.m.), Charing Cross (3 p.m.), St. Thomas's (4 p.m.), London (2 p.m.), King's College (2.30 p.m.), St. George's (opthalmology 10 a.m.), National Orthopaedic (10 a.m.), St. Peter's (2 p.m.), Samaritan (9.30 a.m.), St. Mary's (9.30 a.m.), Great Northern Central (10 a.m.), West London (2 p.m.), Metropolitan (2.30 p.m.), London Throat (9.30 a.m.), Cancer (9.30 a.m.), South London (11 a.m.), and St. Thomas's (11 a.m.).

THURSDAY—St. Bartholomew's (1.30 p.m.), St. Thomas's (3.30 p.m.), University College (2 p.m.), Charing Cross (3 p.m.), St. George's (1 p.m.), South London (1.30 p.m.), Chelsea (2 p.m.), Great Northern Central (2.30 p.m.), West London (2.30 p.m.), London Throat (9.30 a.m.), Samaritan (9.30 a.m.), and Metropolitan (2.30 p.m.).

FRIDAY—St. Bartholomew's (1.30 p.m.), St. Thomas's (3.30 p.m.), London (2 p.m.), Middlesex (3.30 p.m.), Charing Cross (3 p.m.), St. George's (1 p.m.), King's College (2 p.m.), Samaritan (9.30 a.m.), Great Northern Central (10 a.m.), Charing Cross (2 p.m.), St. Thomas's (3.30 p.m.), Soho Square (2 p.m.), North-West London (2 p.m.), Chelsea (2 p.m.), Great Northern Central (2 p.m.), Metropolitan (2.30 p.m.), London Throat (9.30 a.m.), and St. Thomas's (11 a.m.).

SATURDAY—Royal Free (9.30 a.m.), London (2 p.m.), Middlesex (1.30 p.m.), St. Thomas's (2 p.m.), University College (2 p.m.), Charing Cross (2 p.m.), St. George's (1 p.m.), South London (1.30 p.m.), and Metropolitan (2.30 p.m.).

MONDAY—London (2 p.m.), St. Bartholomew's (1.30 p.m.), St. Thomas's (3.30 p.m.), St. George's (2 p.m.), St. Mary's (2.30 p.m.), West London (2 p.m.), Metropolitan (2.30 p.m.), Samaritan (9.30 a.m.), Great Northern Central (2.30 p.m.), and London Throat (3 p.m.).

TUESDAY—London (2 p.m.), St. Bartholomew's (1.30 p.m.), St. Thomas's (1.30 p.m.), St. George's (1 p.m.), St. Mary's (1 p.m.), and Metropolitan (2.30 p.m.).

Valid for 3 days only. The hours are given in the English Time. The Medical Press, Medical News and Pass Lists, Dec. 23, 1914.
Tetanus and Military Surgery.

The subject was introduced by Captain D. Embleton, R.A.M.C. (T.), who had a large experience of the malady in question among the wounded soldiers at Netley. Many of his points were clearly of practical value. He pointed out, for instance, various fallacies commonly held with regard to different phases of the infection. One was that because the organism was strictly anaerobic in culture it was necessarily so inside the body. As a matter of fact, the B. tetani would grow in broth along with staphylococcus aureus, although no precautions were taken to exclude oxygen. Another error was that pure carbolic acid applied to a wound acted as a prophylactic. Experimentally, it had been ascertained that in 20 solution was equally efficient, while it did not destroy tissue locally and had no autolytic action which favoured and was essential to the development of the spore. The infection was by means of the spore, which was enormously resistant. The clean spore, however—that is to say, the spore without associated toxin on its surface—was readily disposed of by phagocytic and other defensive agencies of the body. Large doses of antitoxin, given at the earliest possible moment, were advocated; the subcutaneous route recommended by Captain Embleton was the safest and best method of administration. He found that intrathecal injection amounted in the long run to a distribution by the blood stream similar to that obtained intravenously. The latter he did not adopt as it might set up a fatal anaphylactic reaction in the patients who had been treated at some previous time by therapeutic preparations of horse serum. The whole subject is repelte with interest, and affords a conspicuous illustration of the dependence of modern medicine and surgery upon laboratory research.

Tetanus in Civil Life.

Only last week an inquest was held on a case of death from "lock-jaw" in London. The deceased was a harness maker, fifty-eight years of age, who, for the last fourteen years of his life had suffered from ulcerated legs. There was no apparent breach of surface whereby the tetanus organism could have gained an entry other than by way of the ulcers. Medical literature has recorded many cases of a similar nature. An interesting instance was reported a few years ago where a young lady developed tetanus after being vaccinated on the leg. In a case under the writer's care many years ago the patient, a young road sweeper of fine physique, died of tetanus, the only point of entry discoverable in his case being that of an ulcer on the leg. At that time there were practically no remedies beyond those which aimed at symptoms, such as spasm, exhaustion and starvation. In the case of a road sweeper it is easy to understand how the specific bacillus could reach an open sore in the lower leg, but the fact that the B. tetani is an anaerobic organism inhabiting the soil hardly conforms with the conditions presented by the hard roadways of the streets of London. The fact appears to be, as acutely pointed out by Professor Andrews at the Medical Society discussion, that the organism is connected with the dung of animals put into the soil rather than with the soil itself. Its presence in London roads suggests that possibly the organism may be deposited there amongst the bowel bacteria of horse droppings—a point that may be commented upon in the consideration of experts. So far as civilian tetanus is concerned it would be well for private practitioners to bear in mind the desirability of the prompt administration of large doses of anti-tetanic serum.

Bogus Medical Certificates.

The moral should not be lost of the recent conviction at the Central Criminal Court of the unqualified pretender who, under the name of Harrison, had granted certificates of death and committed perjury by giving evidence at inquests as a medical man. Evidence showed that he had been prosecuted for similar offences fourteen years previously, and, in spite of several terms of penal servitude for bigamy and other offences, he was, nevertheless, successful in obtaining situations as assistant to several medical men. So far did his effrontery carry him that in one case he posed as a Surgeon-General and a baronet. At the trial it was stated by his last employer that Harrison (his real name is John Cubbin) possessed considerable medical knowledge, and he had not the slightest suspicion that the prisoner was not a qualified practitioner. This experience should serve as a warning to all medical men engaging assistants of the necessity of making stringent enquiries into the antecedents of those who apply. The General Medical Council, whose duty it is to preserve the integrity of the Register, might with advantage introduce some system of identification and personal records that would enable one to establish the bond fides of any individual referred to that body. It would not be asking too much of any applicant to satisfy the Council of his right to assume the privileges of medical qualification.
A FURTHER question suggests itself in connection with the Harrison case. What means are taken in Courts of Law, Coroner’s, Criminal, Civil and otherwise, to ensure the fact of legal qualification in a medical witness? The Medical Acts expressly state that only registered medical practitioners are entitled to give such evidence. It may be doubted if a medical man’s testimony is ever refused on the ground that, although qualified, he is not registered. Again, a man may be struck off the Register, and yet permitted to testify simply because an old Register has been consulted, if, indeed, the Court officials took that amount of trouble. As a matter of fact, the evidence given by men not on the Register at the time of their appearing as witnesses is pretty certainly worthless from a legal point of view. Why should not the General Medical Council have some simple means of reference available in the law courts as to the good faith of medical witnesses? The Council constitutes the main protection of the public against “false practitioners,” a duty that it discharges conscientiously and, on the whole, satisfactorily. The best friends of that important body, however, must admit that there is still some room for improvement.

A DECISION of some importance to panel practitioners was decided of late in the High Court of Justice. The executors of a deceased medical man, Dr. O’Driscoll, formerly in practice at Manchester, sold the goodwill of his practice to Mr. W. D. Sweeney, who paid part of the purchase money but was unable to pay the balance, for which judgment was obtained against him by the executors. The plaintiff, in order to satisfy judgment, secured later a conditional order attaching all monies due from the National Insurance Committee to Mr. Sweeney as a member of the panel. In the High Court Mr. Justice Rowlatt upheld that order. In doing so he distinguished between the case of payments due to a similar body and the cases of officers of the Crown, which are not liable to attachment, and held that as soon as monies came into the hands of the Committee for distribution to the panel members a debt became due to every medical man who had done the work under contract, and the money then falling due was liable to attachment. This decision enables County and other courts to deal with the incomes of medical men as far as they are derived from panel practice. The distinction that exempts salaried officers of the Crown from a similar liability will appeal to the legal rather than to the lay mind, and constitutes an anomaly that might be removed with advantage to the public interest.

The Royal Hospital of Bethlehem have brought from Sir George Savage a letter which will be found in our correspondence columns. It courteously explains that the income is derived from joined estates, which have fallen in, and that leave has been accorded by the Charity Commissioners to receive a certain number of paying cases at £2 a week. The recent poisoning accident at the Hospital he attributes to the absence at the war of the junior medical officer, who is nominally the apothecary. So far as our original criticism is concerned, we throw no blame upon the medical administration for an occurrence which was purely accidental. The lack of a trained dispense, however, in an institution of the size and importance of Bethlehem is an instance how the lay management had fallen somewhat behind the times. Then, again, the fact that the poisonings were not referred to by the Lancet and the British Medical Journal suggests the desirability of further inquiry in the public interests. Sir George agrees that the Hospital was founded for the benefit of the poor of London. He thinks the London County Council have no part in the Hospital, and that is undoubtedly the case. That body, however, as well as the general ratepayers of London, are concerned closely enough if they have to pay for keeping in London County Council asylums any insane patients who, as City of London inhabitants, should be maintained by trust funds in the hands of the Corporation. In any case, it would be satisfactory were a statement of the financial and other details of lay administration of Bethlehem Hospital issued to the public, especially after the assurance of Sir George Savage that such a course would express the wishes of the committee.

LEADING ARTICLES.

A MEDICAL RETROSPECT—1914.

The closing days of the old year afford us yet another opportunity of taking stock of our progress and of reviewing the principal medical events of the past twelve months for the benefit of our readers. Little did we dream, a year ago, that the nations of Europe would be plunged in such a tremendous conflict as that which we have lived to witness. The year 1914 will ever be a memorable one in the annals of history, not only because it marked the beginning of what will henceforth be called “The Great War,” but also because of the large and important share in the struggle borne by medical men and women in every class of practice. There is not one who has not been affected in some way as a result of the war. A great number have left their work cheerfully at their country’s call, and, in some cases, at no considerable personal loss and inconvenience, have gone to the Front not only as officers in the Royal Naval Medical Service and the Royal Army Medical Corps, but also as medical officers in connection with the various Red Cross Societies of the Allies, Ambulance Corps, Volunteer Aid Detachments, as well as in many other capacities where their special services were needed. Indeed, it is not too much to say that the whole aspect of medical practice has materially changed since the war. Many medical men who, from various causes, have remained in this country have had their work greatly increased, whilst others have suffered considerable losses from the decline of practice. The whole country is experiencing such a shortage of medical men that has never occurred at any previous time, and this diminution was pointed out by Sir Donald MacAlister, K.C.B., President of the General Medical Council, in a communication which appeared in our last issue. The medical profes-
sion is proud to be able to help in every possible manner in the present crisis, not only by active service with the Forces, but also by agreeing to provide free treatment to the dependants of our brave soldiers and sailors. Our readers are fully aware, too, of the manner in which we, as a profession, have striven to assist our unfortunate Bel-
gian confères in the time of their distress. As we have previously mentioned in these columns, the war has naturally put a check upon all medical research, yet, we are glad to believe, quite an appreciable amount of good scientific work is still being carried out by skilled investigators in our laboratories, while ordinary hospital work and the training of students has to go on just the same.

If we consider that part of the year before war was declared, there are several interesting and important events to record. In chronological order we have the acceptance by the London County Council, in March last, of a tentative scheme for the provision of an ambulance service for London which was virtually identical with that proposed some nine years ago by Sir William Collins. On April 1st the new Mental Deficiency Act came into operation in England and Wales, and the local committees authorised by the Board of Control have already set to work to ascertain what persons within their jurisdiction are defective and to pro-
vide suitable accommodation for them. Ophthal-
mia neonatorum has become a notifiable disease throughout the country instead of in a few areas only, as was previously the case. The Report on the infectivity of pulmonary tuberculosis made by a Committee of the Royal College of Physicians of London was issued in April, and was designed to allay needless fears among the public as to the supposed contagiousness of consumption. The same time Madame Victor Henri communicated to the French Academy of Sciences her discovery of the transmutation of certain micro-organisms, the effects of which may be far-reaching in a bacterio-
logical sense. The British Medical Association held a successful meeting at Aberdeen, in July, under the presidency of Sir Alexander Ogston, and during the same week there was the notable Clinical Congress of Surgeons of North America in London, presided over by Dr. J. B. Murphy. The Report of the Select Committee on Patent Medi-
cines was issued in September, and the recom-
 mendations of this important document, upon which much comment has been already devoted in the pages of the Medical Press and Circular, may be taken to serve as the basis of future legis-
lation upon the subject when the Government is at liberty to attend to such matters. Last month witnessed the inauguration of the National Council for Combating Venereal Diseases, which move-
ment has the hearty support, not only of the mem-
bers of the Royal Commission, which held many sittings during the year, but also of the whole medical profession. Several interesting medico-
legal cases have been tried during the year, one of

decision and the most important being the second trial of Stev-
ev of the British Medical Association, with a verdict for the latter. The Local Government Board has been busy during the year, and several important circulars have been issued to the various local authorities dealing with sanitation, latterly with special reference to the presence of large bodies of troops in urban and rural districts. Numerous interesting lectures have been delivered by eminent medical authorities before the Royal Colleges and other public bodies, but space forbids us to mention these individuals. The campaign against tubercu-
losis and infantile morality has been marked by considerable activity on the part of the various health authorities throughout the country.

PROFESSIONAL SECRECY.

The question of professional secrecy is one of considerable importance to the medical man. From time immemorial it has been recognised that the medical man is bound under all ordinary circum-
stances to preserve inviolate any information that has come to him in the course of professional relationship with a patient. Amongst medical men there can be little difference of opinion as to the wisdom and the necessity of this general rule in the interests not only of himself and of his patient, but also of his profession and of the community to which they both belong. When applied to particular cases, however, the rigid enforcement of any such principle might readily lead to results of a kind inimical to the public welfare. The most obvious illustration is that of a murder which has by chance come to the knowledge of a medical man in the discharge of his professional duties. It may be that suspicions aroused in his mind as to the secret administration of poison are confirmed by analysis, and as a consequence of the knowledge thus acquired he perforce becomes cognisant of a criminal act of a most serious nature. If, under such circumstances, he deemed it his duty to regard as sacred the information that had come to him in that particular way, he might be in a fashion condoning murder or assisting a would-be murderer, or possibly a murderer, to escape justice. The commonsense of the overwhelming majority of the medical profession would in such a case agree with that of the public—namely, that rules for general guidance of professional conduct must under particular circumstances be modified to suit the occasion. In other words, it would be the duty of the medical attendant to inform the police of what had come to his knowledge. We take it that few medical men would deny an obligation of that kind in a case of murder or attempted murder. The difficulty arises in determining at what degree of criminality the obligation should cease. Supposing a man calls a doctor up in the night to have a dressing applied to a scalp wound, which is later connected in the mind of the medical man with a burglary or a non-fatol poaching affair, it may be assumed that most medical men would unhesitatingly resent the suggestion that it
was part of his duty to report the incident to the administrative law authorities. Next let us turn to the case of illegal operations for abortion, concerning which vexed questions of the particular kind under discussion not infrequently arise. On December 1st, Mr. Justice Avery made some highly important observations on the subject of professional secrecy in the course of a charge to the Grand Jury at the Birmingham Assizes. The case was that of Annie Hodgkiss, who had been committed on the coroner's inquisition on a charge of murder. The woman, said the learned judge, clearly died as the result of an illegal operation, but the charge was dismissed in the magistrate's Court. Three medical men in succession attended her, and to one at least she confided the name of the person who committed the act. With the exception of a letter making an appointment there was no evidence against the accused. The fact that none of the medical attendants took steps to secure a dying deposition from the deceased woman prevented the opportunity of acquiring other evidence. Mr. Justice Avery then made the following emphatic statement:—"Under circumstances like those in the present case, I cannot doubt that it is the duty of the medical man to communicate with the police or with the authorities in order that one or other of those steps may be taken for the purpose of assisting the administration of justice. No one would wish to see disturbed the confidential relation which exists, and which must exist, between the medical man and his patient; but in order that the medical man may properly discharge his duty towards his patient: but there are cases, of which it appears to me that this was one, where the desire to preserve that confidence must be subordinated to the duty which is cast upon every good citizen to assist in the investigation of a serious crime such as that which has been imputed to that woman." We should imagine that the words of the learned judge, one of the soundest lawyers on the bench, would be generally endorsed by the common sense of the medical profession. Such, however, is not the opinion of the Lancet, which, with characteristic assumption of superior judgment, hastens to speak for the medical profession. In its issue of the 10th December, commenting on the trial of the woman Hodgkiss (page 141), it makes the following editorial comment:—"We doubt if there will be any general agreement in the medical profession with Mr. Justice Avery's remarks." A matter of this kind is far too important to be dismissed by an off-hand editorial pronouncement of that kind, especially when unsupported by argument. The plain truth seems to be that a few extremists would probably uphold the action of medical men in concealing any professionally acquired knowledge of criminal abortion. Admitting that so far the case may be arguable, we should imagine that the majority of medical men would refuse to become accessory, no matter in however remote and impersonal a degree, to the escape of a criminal abortionist from justice. At any rate, the Lancet appears in the passage quoted to be making an assumption that is likely to be offensive, as it is gratuitous, to the minds and the consciences of a large number of the medical practitioners of the United Kingdom. Mr. Justice Avery was careful to repudiate the meaning attributed in a leading book on forensic medicine to some remarks made by him many years ago on the subject. We have rarely seen a more grotesque abuse of editorial omniscience, even in the pages of the Lancet, than that which suggests that the majority of medical men are ready to condone grave criminal offences.

CURRENT TOPICS.

The Dublin Castle Hospital.

We are glad to learn that, following on the careful inspection made ten days ago by representatives of the War Office and the (British) Red Cross Society, the War Office has sanctioned Dublin Castle as a temporary hospital for wounded soldiers. The original intention was to put up 450 beds, but the War Office thinks that 250 will be as much as the building can conveniently accommodate. The inspectors have, it is said, made several suggestions which will be of much help in preparing the premises for use as a hospital. The executive committee is proceeding in its work as rapidly as possible, and it is hoped that within a few weeks the hospital will be ready for occupation. It is to be hoped that the last has been heard of the very disgraceful intrigue which aimed at destroying a useful and patriotic scheme, urged by motives which certainly had nothing to do with the care of our wounded soldiers. If not, we venture to congratulate the medical profession for the project its cordial support. A visiting staff of ten physicians and ten surgeons has been appointed, one physician and one surgeon being nominated by each hospital staff in Dublin. The members of the visiting staff will give their services gratuitously.

Professional Etiquette and the R.A.M.C.

In a letter under the above heading published in our last issue, Dr. Mayne asks us for our opinion on a point of professional etiquette. The letter, being addressed to our London office instead of our Dublin office, reached us too late for consideration last week. Dr. Mayne's case briefly summarised is as follows:—He is sole surgeon to the Longford County Infirmary; on the 13th inst. he was waited on by the officer commanding the troops in his neighbourhood, and a consulting surgeon to the troops, with the rank of Colonel in the R.A.M.C. The commanding officer asked Dr. Mayne to admit to the infirmary a soldier suffering from appendicitis. Dr. Mayne at once consented; on it being made evident that the consulting surgeon intended to perform the operation, Dr. Mayne, while willing to admit the patient and to operate, declined to allow anyone else to operate in his hospital; he does not tell us how the matter was arranged. As we understand it the case is fairly simple. As Dr. Mayne does not mention the point, we assume that the military authorities have not entered into any arrangement with the governing body of his infirmary, which could in any way interfere with his control of the infirmary. If that be so, the consulting surgeon in asking for permission to operate in the infirmary was in the position of any other surgeon who desired to operate on his own patients in any country infirmary. It is obvious that such permission could only be given as a matter of courtesy, and in refusing it the infirmary surgeon was strictly within his rights. We are aware that it is not uncommon for a workhouse medical officer in Ireland as a matter of courtesy in the absence of other accommodation to permit other
Ambulance Barges

The ponderous and generally unattractive-looking vessel which crawls along our canals and waterways and disturbs the small boys bathing is, of all craft, perhaps, the clumsiest. No one except an artist has a good word to say for the barge, if we except the gondoliers who are moored along river banks for the enjoyment of the carolling and certain magnificently appointed state craft. We should miss the familiar barges on the Thames, half-guided and half-drifting in the dank mists of an evening in late autumn. The much-despised vessel has lately come into prominence in a somewhat different guise, for it is announced that Mr. Douglas Hall, M.P., has offered to procure and equip four ambulance barges for use on the canals and rivers at the Front. The use of these vessels as a means of transport for the wounded has been recently tried with success upon the Seine and it is said to have given great satisfaction to the military and medical authorities. The scheme has received the approval of Sir Arthur Sleigh, K.C.B., Surgeon-General to the British Forces at the Front. The use of four barges will be placed under the direction and control of the Royal Army Medical Corps, and it is hoped the combined vessels will constitute a floating hospital capable of accommodating two hundred patients. Public assistance is being solicited in order to carry out the scheme successfully, and there appears to be no reason why this novel use of canal boats should not prove most acceptable in France and Flanders.

Poisoning by Aeroplane "Dope"

It is a truism to say that new industries, like new games, are responsible for their own special injuries or diseases. At an inquest held in Marylebone on December 19th some important disclosures were made by the Medical Department of the Home Office regarding the toxicity of tetrachlor-ethane, the marked changes in the liver were responsible for a case of acute yellow atrophy of the liver. The patient was a French polisher employed in the aircraft works at Hendon, and part of his duty was that of the varnishing of the wings of aeroplanes with "dope." Some weeks before his death he had complained of headache, an unpleasant taste in the mouth, nausea, and jaundice was admitted to the Middlesex Hospital, where he died, and at the autopsy the liver was seen to be in a condition of subacute hepatitis and acute yellow atrophy. Death was due to heart failure consequent upon the hepatic degeneration. It was shown that the vapour of tetrachlor-ethane was poisonous to rats, in which animal experiments the disease was produced as a result of inhalation of the fumes. If quick drying of the special varnish employed for aeroplanes is desired it is incumbent upon the authorities to see that there is an adequate system of ventilation for getting rid of the fumes. On account of the pressure of work caused by the war, it appears that more of the varnish was used than usual, with a result that more of the vapour hung about. It is sincerely to be hoped that some efficient means of disposing of the fumes may be adopted in future in all places where such dangerous varnishes are used.

New Restriction on the Sale of Laudanum

After many years of protest, the sale of laudanum, one of the most commonly fatal causes of narcotic poisoning, has been placed under more stringent regulations. Curiously enough, this result has been brought about indirectly through the new edition of the British Pharmacopoeia, recently issued by the General Medical Council. The strength of the standard tincture of opium has been raised, so that in its new form it passes automatically on January 1st from Schedule II. to Schedule I. of the Poisons Act. Henceforth the chemist has been permitted to sell laudanum in any quantity to a purchaser, provided he dispensed the drug in a bottle of peculiar shape recognisable by touch, and accompanied by the name and address of the vendor on a label. In future he will have to enter particulars of the sale in a poison-book, and the purchaser will be required to append his signature. These facts were mentioned last week at an inquest held by Dr. F. J. Waldo, the learned Coroner for the City of London. The chemist who sold the laudanum deposed that he had supplied deceased with four or five ounces a week for the past five or six years. In any case, the schedule or no sale, because the laudanum is decided that a deadly drug should be sold under such lax conditions. The General Medical Council may be congratulated upon having rendered a substantial service to the public in the further restriction of the sale of laudanum, a duty which has been so long and so unaccountably neglected by the regular authorities, the Pharmaceutical Society and the Privy Council.

PERSONAL.

DR. FREDERICK MANN WILLIAMS has been appointed Consulting Medical Officer of Health for Plymouth.

DR. J. RUSSELL MAGEE has been appointed Medical Officer to the Londonderry Port Sanitary Authority.

LIEUTENANT-COLONEL R. J. BAKER, L.M.S. (ret.), has been appointed Officer Commanding the Indian Field Ambulance Training Corps.

DR. FRANK GEORGE BUSHNELL, M.D., B.S.Lond., L.R.C.P.Lond., M.R.C.S., D.P.H.Cantab, has been appointed Tuberculosis Officer to the Plymouth Borough Council.

DR. PATRICK EDMUND CARROLL, M.B., B.Ch., N.U.I., has been appointed Assistant Medical Officer of Health and Assistant School Medical Officer by the Walsall Town Council.

DR. W. I. ESCOFFERY has been awarded the "Duncan Medal" of the London School of Tropical Medicine, which is awarded to the student who obtains the highest aggregate of marks during the session.

DR. F. M. SANDWITH, Chairman of the County of London Branch of the Red Cross League, will deliver the next series of Chalmers's Lectures on "War and Disease" at the Royal Society of Arts on January 15th, 22nd and 29th, at 5.15 p.m.

PROFESSOR WILLIE, who has lately retired from the Chair of the Practice of Medicine in the University of Edinburgh owing to ill-health, has been elected Consulting Physician to the Edinburgh Royal Infirmary "in grateful recognition of his long, devoted, and valuable services" to that institution.

I have only laid before you the stories of two martyrs of medicine, the most tragic, perhaps, that I could have chosen, but, as I said at the beginning, there is ample material for a book of martyrs of no mean proportions, if all the categories I have mentioned be included.

I could tell of Pietro d'Abano, an Italian physician, born in 1250, who narrowly escaped burning by the Holy Inquisition; of Giorgio Blandrata, another Italian physician, successively Catholic, Lutheran, Calvinist and Anabaptist, whose portions, have of the Holy Spirit included. The Theodore of Ample by his years colleague was the Flemish Surgeon, George Van Paris, was burnt for anabaptist and unitarian views. There was Dr. Theodore Masure, born at Geneva in 1573, appointed Physician to Henri IV., who was persecuted by the medical faculty of Paris for disputing the validity of Galen, and employing chemical remedies. He was driven out of France, and, coming to this country became Physician successively to James I. and Charles I.

James Drake, of Cambridge, author of "Systems of Anatomy," who died in 1637, was a political physician whose writings on behalf of the Tory party led on two occasions to State prosecutions, and though he escaped unpunished through legal technicalities, the distress his trials occasioned hastened his early death.

The learned Dr. Freind (1675-1728) who wrote the "History of Physic from the Time of Galen to the Sixteenth Century," was imprisoned in the Tower for three years for high treason in connection with what was known as the Bishop's plot. Dr. Richard Mead, himself a political physician who helped the house of Hanover to the throne, secured the release of Freind by refusing to prescribe for Walpole's gout unless his colleague was first liberated from the Tower.

Quite recently we have had to add to the roll the name of Dr. Bombarda, the alienist physician of Lisbon, who, liberated by the Portuguese revolution two years ago, who fell a victim to assassination at the hands of or at the instigation of the Royalist party. From what I have heard of him he seems to have been a thinker of great power and promise.

John Howard, the philanthropist and prison reformer, though not a physician, was the first to take notes on sanitary questions, and may well be regarded as a martyr in the cause of medicine. His essays presented to Parliament demonstrated the awful neglect which obtained in Lazagettes and prisons both at home and abroad. He showed that typhus arose from malarial conditions, and in the course of his post-chaise travels and investigations in the South of Russia, he at length contracted this disease and fell a victim to it. As Pomelius said of his travels: "What a singular journey. Not to admire the wonders of art and nature, not to visit courts and ape their manners, but to dive into dungeons, to compare the misery of man in different climates, to study the arts of mitigating the torments of mankind! What a contract might be drawn between the painful labour of this man, and the ostentations sensibility which turns aside from scenes of misery, and with the mockery of a few barren tears, leaves it to seek comfort in its own distress."

The last of the list of martyrs is the subject of our next lecture.

There is a sort of law which is at present in force, that no man really had a "bee in his bonnet."

He must be wrong and the majority right, because it was a majority.

Our oracular Journal is more just to the memory of another man who suffered unmerited obloquy in his day on behalf of a movement which is at present in full,-I refer to Henry MacCormac of Belfast, who preached the gospel of unseen air, in the prevention and treatment of tuberculosis. The Journal says: "How his teaching was received by the
CLINICAL LECTURE.

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profession is shown by the fact that when a paper setting forth his views was read before the Medical and Chirurgical Society in 1852, it was received with undisguised contempt. One learned physician characterised it as "a waste of time," another sapient person demanded that the Society should be protected against the reading of such productions. The Society returned thanks to the author at the conclusion of the sitting. In scholarship MacCormac probably far exceeded most of his courteous audience. He had travelled widely, was familiar with twenty languages, and an authority on "comparative physiology." The phrase may well be written largely on theology, and he had translated the "Meditations of Marcus Aurelius." He was, in fact, one of those many-sided, broad-brained, unclassifiable men who are ever the object of scorn and ridicule as well as despair, of microscopic minds and conventional insignificance.

The name of MacCormac in this connection recalls that of George Bodington, who had endured similar ridicule and neglect when, in 1840, he taught that "to live and breathe freely the open air without being deterred by wind or weather is one important and essential remedy in arresting the progress of pulmonary consumption."

As the Editor of the Journal on July 31st, 1909, observed: "It is not only the rejection of that part of air treatment which is against the medical profession. Long before, it had turned its back on the truth, which it had once received, that the disease is communicable," and he concluded by describing the treatment of Bodington and MacCormac as "an illustration of the modern attitude, which has been insisted on in this journal that the superior person is one of the great obstacles to the progress of medicine."

Words of wisdom and words of warning, too, which made as a check upon those who, in the case of our own present problems and the questions which divide us to-day, are apt to choose the easier part of shouting with the crowd than standing by the advocate of a cause at the time unpopular but which may hereafter be accepted when "the multitude make virtue of the faith they had denied." Let us, in the words of Lowell, ask ourselves—

"Shall we in our haste to slay
From the tombs of the old prophets steal
Our lips away?
To light up the martyr-sagots round the prophets of to-day?"

What are the lessons to be learnt from these tragedies which I have briefly epitomised? What explanation can be vouchsafed for these crimes which have been possible to the intolerance of religious orthodoxy? How are we to avoid falling into similar errors to-day, and preparing pages of history which future generations will execrate and deplore as we do now the treatment meted out to these martyrs of medicine by men claiming to be animated by the highest motives of professional purity and a burning zeal for God and man within their hearts?

We have in the first place to admit "that there is a spirit of orthodoxy in science as well as in theology, and when we remember the sacred names of medical orthodoxy? How are we to avoid falling into similar errors to-day, and preparing pages of history which future generations will execrate and deplore as we do now the treatment meted out to these martyrs of medicine by men claiming to be animated by the highest motives of professional purity and a burning zeal for God and man within their hearts?"

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In The Times of February 28th, 1912, I read a letter by Dr. Charlton Bastian, F.R.S., in which he complained: "The Roman Catholic Jurisdiction still remains at the headquarter of Science here—this Roman Society. He complained that a paper by a Fellow like himself of 40 years' standing had to be submitted to a committee to decide whether such paper should be presented or not. Unfortunately," he says, "scientific interjewelry as well as clerical still exists." Sir William Osler, writing in Servetus admits that "next to theology itself the study of medicine has been a great heresy breeder." Dogmas of science and doctrines in medicine are as tenaciously held as they are in the case of the theologian. Herbert Spencer says ("Man State," p. 79): "It is curious how commonly men continue to hold in fact doctrines which they have rejected in name—holding them under a colorable form," and cites in evidence the case of Sir Charles Lyell, who united naturalism in geology with supernaturalism in biology, and "only in later life surrendered to the arguments of Mr. Darwin."

It is in Vol. 1 of his "Principles of Geology," Sir Charles rather loftily exposes the follies of the catastrophists and the Mosaic cosmonogists who demurred to the proposition that the causes now operating on the earth's crust were adequate to explain all the existing phenomena. A man who was one of the best known of the catastrophists, and the author of the "Origin of Species," still retained his faith in the theory after having been convinced of the fallacy of that theory, but "in the succession of quadruped remains he failed to detect any signs of a progressive development of organisation, and he concluded that the "theory of the successive development of the animal and vegetable world from the simple to the perfect forms, rests on a very insecure foundation."

Huxley, in his chapter on "the Reception of the "Origin of Species" in the "Life and Letters of Charles Darwin" (Vol. 2, p. 183), says: "The idea that a species cannot be derived from a more simple species has been one of the commonest errors of the past. Yet in the ninth chapter of the same volume he argues with no less emphasis against the progressive development of organic life upon this globe. He was unwilling to believe that "the author of Nature in the creation and distribution of animal beings followed the same rules formerly as now": in the succession of quadruped remains he failed to "detect any signs of a progressive development of organisation," and he concluded that the "theory of the successive development of the animal and vegetable world from the simple to the perfect forms, rests on a very insecure foundation."

Huxley too reminds us in regard to evolution that the supporters of Mr. Darwin in 1860 were numerically extremely insignificant. There is not the slightest doubt that if a general council of the Church scientific had been held at that time, we should have been convinced by an overwhelming majority. And there is as little doubt, if such a council gathered now, the decree would be of an exactly contrary nature. It would indicate a lack of sense, as well as of modesty, to think that generations would be as wise or less honest than their successors possess. What, then, are the causes which led instructed and fair-judging men of that day to arrive at a judgment so different from that which seems just and fair to those who follow them? That is really one of the most interesting of all questions connected with the history of science, and I shall try to answer it."

As a clue to this scientific mystery Huxley, with a frank apology for his egotism, offers his own story of conversion. He was a member of the branch of the Church of England which, on the chapter "The Vestiges," his disapproval of Dr. Grant, of University College, and his opposition to Herbert Spencer, one is inclined to think his list of evolutionists redundant as well as exclusive and to say that Huxley himself, Que le diable allait-il faire dans cette galère? Thus we see that the doctrine of evolution was at one time poohpoohed by the Pontiffs of the Church Scientific whereas in our day it has until lately been regarded almost as sacrosanct as an article of religion or even a dogma of the Church. I could multiply examples of the instability of scientific authority which should serve to inculcate humility rather than to promulgate positiveness, and invite a liberality of sentiment rather than an esoteric exclusiveness.

The corpuscular theory of light is a case in point.
Newton advocated it, but Young and Huyghens disputed it and introduced the undulatory theory which has done duty for three-quarters of a century. This wave theory which has been abandoned as the last word of luminary gospel was in Young's day rejected by the Royal Society, and he himself was severely trounced by Lord Brougham for his sciolism and heresy. A few years ago Sir Joseph Thomson, however, revived the corpuscular theory with triumphant demonstrations of mathematical demonstration which challenges the learned and overwhelms the humble. It now seems not unlikely that the wave theory having had its day may in its turn be placed under the ban, or shall we say held by in lavender with other dogmas once triumphant, now discarded, once the gospel, now anathema.

One more example of scientific positivism, that fruitful cause of heresy and martyrdom, I will cite and then conclude. In 1584 at the Gottingen Congress, according to a tradition among five score there assembled, not one could be found who would say a word for the soul, or for vital force, or do otherwise than denounce Rudolph Wagner's book on Faith and Knowledge. Carl Vogt, who held that "man is what he eats" and that the "brain secretes thought as the liver secretes bile," ridiculed poor Wagner to his heart's content in his "creed of a charcoal burner." Liebig resolved vital force into its chemical constituents, and it was resolved that "without phosphorus there is no thought." Littré, a pupil of Comte, with great condensation, analysed the soul and pronounced it to be "the ensemble of functions of encephalic sensibility." That was less than 60 years ago, yet how changed is that which regards itself as the best opinion of to-day. Idealism is in the ascendant and has, if I may be allowed the metaphor, knocked the bottom out of materialism. William James and his school have taught us to look with "eyeless observation on a sense-transcending world," and Henri Bergson from the College de France lectures "sur la nature du temps," at the Sorbonne University College which aforetime rejected Martineau as a philosopher because he was a parson!

Let us point the moral and adorn the tale.

We need to keep our minds open to truth from whatever quarter, however humble, it may come. To keep the equal mind in things severe. To see man and nature in their totality. The mere fact hunter, the dull laborious man of research with his eye glued to a microscope and his nose stuck into a test tube; or one who finds in our newspapers, not essential of the synthetic thimber who does not fit his calculus, and is often only too apt to scent a heresy or hunt a heretic. The pursuers of little game, the narrow-minded specialists in their zealotry and isolation are sure to be orthodoxy and consistently conventional.

Again the striking, the incredible, the marvellous, the fine-sounding, the loud-mouthed, will always split the ears of the groundlings and secure heroic welcome from the notaries thereof. As of old, Paracelsus and Albano are more attractive than the homely waters of the Jordan.

Theories brought from the ends of the earth will secure acceptance when that which is "very nigh in their hearts and in their mouths" will fail to draw the common heart. The Christ and the Christian martyr with the first Christian martyrs, conspicuous for honesty, wisdom, and a simple faith which worked wonders, it was the inability of the Libertine critics to answer him in dispute no less than his repudiation of their customs dating from Moses that cut this preceptor to the Greeks down and forced them to grapple with him their teeth and stone him to death at the feet of the pupil of orthodoxy.

Besides these lessons of warning against bigotry and intolerance which made so many martyrs of medicine, which drop Semmelweis to the mad-house and Servetus to the stake, let us also take lessons of courage and comfort, let us recall from time to time those stalwart old iconoclasts unconvined by stake or gibbet that all virtue was the past's." Let us honour their memory, revere their spirit, emulate their constancy and reflect with the poet—

Oft as we run the weary way
That leads through shadows unto day,
With trials sore amazed,
Deeming our struggles are unknown;
Our battle joined and fought alone,
Our victory unpraised.

In hope and faith we yet may trace
The witnesses who watch our race;
We may not know our saviour's name,
The mighty cloud of all who died
With faithful rapture, humble pride.
For love of God or men.

With patience, then, we run the race,
With joy and confidence and grace;
Our message to defend,
Enduring cross, despising shame,
Enkindled with the battle flame,
And faithful to the end.

Note.—A Clinical Lecture by a well-known teacher appears in each number of this Journal. The lecture for next week will be by Sir G. H. Savage, M.D., F.R.C.P. Lond., Consulting Physician to Guy's Hospital; Examiner in Mental Pathology, University of London. Subject: "Feeling as a Cause and as a Symptom of Insanity."

Original Papers.

The Four Common Types of Heart Disease:

An Analysis of Six Hundred Cases (a).

By Richard C. Cabot, M.D.,
Professor of Medicine in Harvard University, Physician to the General Hospital, Boston.

To classify cases of disease according to their pathogenic agent or process, and not solely by naming the region affected or the function disturbed, is the ideal of scientific progress in medicine. But until the last decade we have made little advance in this direction as regards the diseases which gravely disturb heart function. Thus we still find in standard textbooks a section devoted to "Mitral regurgitation," its diagnosis, prognosis and treatment, although mitral regurgitation is almost as vague a phrase as "spinal paralysis" or "brain fever." Just as a "spinal paralysis" may be due to trauma, to the tubercle bacillus to the Spirocheta pallida, to the organism of pellionyelitis or to cancer, so "mitral regurgitation" is only a symptom caused by the action of streptococci, by the degenerative lesions of arteriosclerosis, by the muscle-tiring resistance of nephritic hypertension and probably by many other causes. It probably contributes its mite to the downfall of cases of pernicious anemia, typhoid fever and puerperal sepsis. Hence there can be no diagnosis or treatment of mitral regurgitation but only of the various underlying diseases in which this leak is a symptom.

A similar criticism applies to all diagnoses of "myocarditis." The micro-organism of rhenatism and of syphilis, the ravages of arteriosclerosis and perhaps more may produce the lesions of chronic fibrous myocarditis, with or without recognisable symptoms. A diagnosis of myocarditis is like a diagnosis of "nihil"; it calls for an aetiological qualification, such as syphilitic or tuberculous.

The matter has many practical aspects. A sane

(a) Read before the Section on Practice of Medicine at the Sixty-First Annual Session of the American Medical Association, 1914.
prognosis and treatment of "aortic regurgitation," for example, depends on knowing or guessing what disease has produced it. Even physical diagnosis may have to await an intelligent interpretation of its results until we make up our minds what micro-organism is at work, in the heart, as well as elsewhere in the body. When we hear a low, rumbling presystolic murmur at the heart's apex and an early high-pitched diastolic along the left sternal margin, our conclusions about the mitral valve depend on our answer to the question, "Is syphilis or 'rheumatism' at work here?" If the former, then the mitral valve is probably sound; if the latter, then it is already diseased.

Four relatively new tests have now made it possible—as I think—to reclassify cardiac lesions more satisfactorily: the Wassermann reaction, the "red test" (a) of renal function, the measurement of blood-pressure and the Roentgenography of the chest. When auscultation, percussion and the older methods of urinary examination leave us in the lurch, the four diagnostic methods just mentioned can often guide us aright.

With the help of these methods I have attempted a classification of 600 recent hospital cases in which a failing heart was the most notable feature. The results are shown in the accompanying table.

### Classification of Cases with Failing Heart.

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<th>Male</th>
<th>Female</th>
<th>Total</th>
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<td>Rheumatic</td>
<td>178</td>
<td>170</td>
<td>348</td>
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<td>Syphilitic</td>
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<td>23</td>
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<tr>
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<td>40</td>
<td>93</td>
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<tr>
<td>Nephritic</td>
<td>29</td>
<td>51</td>
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### Guite Heart

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### Total

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**The Rheumatic Type.**

Under "rheumatic" are grouped the cases of weakened heart, adherent pericardium and valvar disease associated with (a) acute or non-gonoerreal polyarthritis ("rheumatic fever"); (b) chorea (of Sydenham's type); (c) acute tonsillitis, and (d) "primary endocarditis" with negative Wassermann reaction, especially when the Cardiac symptoms followed these diseases during the patient's youth. In my opinion it has been demonstrated by the converging results of English, German and American work as the best working hypothesis that a streptococcus is the exciting agent of acute "rheumatism," chorea, endocarditis and tonsillitis (b). This streptococcus in the joints produces acute rheumatism, in the brain chorea, in the heart endocarditis, myocarditis and peri-carditis. It may attack the heart first and later the joints. Then our old terminology would make it appear that endocarditis is the "cause" of rheumatism. It may attack first the brain and heart, appearing later in the tonsillar or peri-tonssilar tissue. It may attack the heart and kidney simultaneously, so that we find true cardiac and renal disease from an identified organism, as Libman and others have maintained.

This form of streptococcus is essentially a disease of youth, both in man and in the animal experiments of Rosenow. In 60 per cent. of the cases here analysed the disease began (usually in the joints) before the twenty-second year. The patient rarely dies a mechanical or heart-death, but almost never leakage alone. In other words, mitral stenosis is the rheumatic (or streptococceous) valve lesion, although it is combined with aortic stenosis in a relatively small percentage of cases. It rarely produces aortic stenosis without a severe stenotic lesion of the mitral. It seldom, if ever, produces severe symptoms or death by leakage alone, although it often produces systolic apical murmurs alone.

On the other hand, it seems probable that stenosis at the mitral or aortic valves involves regurgitation as well in practically every case.

When a cardiac streptoccosis occurs in its most virulent and intractable forms, we call it "malignant," "ulcerative," "septic" or "slow" (endocarditis lenta) and we find in the blood (according to Rosenow) a streptococcus culturally distinguishable from the organism of the milder cases. Nevertheless, I have here included all such cases in the "rheumatic" group of my table.

If the patient survives the second decade of life his smouldering, often recrudescing, cardiac infection may die out, leaving a serviceable heart, despite some narrowing at mitral or even at the mitral and aortic valves. Such cases carry a good prognosis and are often compatible with twenty, thirty or forty years of hard work.

**Syphilitic Heart-Disease.**

Most cases of "causeless" aortic regurgitation appearing in men between 20 and 40 without "rheumatic" history have a positive Wassermann reaction and may be considered due to syphilitic aortitis with or without aneurysm. In negroes and south Italians we find a great deal of this type of heart-disease because of the prevalence of syphilis among them.

I have included twenty-four such cases, together with the eighteen aneurysms, among the syphilitic group in my table. To these I have added a group of thirty-two failing hearts, with or without evidence of valve lesions, without rheumatic history, without evidence of nephritis or arteriosclerosis, but with a positive Wassermann reaction. The permeation of the congenital syphilitic myocardium with spirochates (as shown by Warthin and others) makes it probable that in adults as many cases of myocarditis are due to syphilis.

Probably a more searching study would result in transferring some cases from the arteriosclerotic to the syphilitic column in my table.

**Arteriosclerotic Heart-Disease.**

Under "arteriosclerotic" are included the cases of weakened heart in elderly persons with sclerotic peripheral arteries and hypertension, often with angina pectoris, occasionally with cerebral or peripheral symptoms of the arteriosclerotic type, and always with negative Wassermann reactions.
I do not attempt to decide the question whether any of the hearts of this group are weakened solely as a result of renal arteriosclerosis or whether generalised arteriosclerosis works part or all the mischief. In either case arterial disease is the cause. If anemia is present these cases more often belong in the next group.

With further knowledge this arteriosclerotic group could probably be subdivided into the plumb cases, those of infective origin, etc. The heart itself shows enlargement, weakness, often arrhythmia of gallop rhythm. Angina pectoris and the cerebral and peripheral evidences of arteriosclerosis are often present. Such patients often live many years in comparative comfort. On the other hand, they may die suddenly of coronary stenosis or cerebral hemorrhage.

**Nephritic (or Nephrogenic) Heart-Disease.**

Vollard and some other modern authors would designate many of my "arteriosclerotic" cases as "benign chronic nephritis." But it seems to me more convenient to confine the term "nephritic or nephrogenic heart-disease" to the cases of weakened and enlarged heart apparently resulting from the hypertension of glomerulonephritis.

Such cases are associated with urinary anomalies more marked than those seen in the arteriosclerotic group. The hyperuricemia, the nocturia, albuminuria, cylindruria and especially the functional weakness with the "red test" are very marked. The response to cardiac stimulants and to drugs like theobromin sodium salicylate is feeble. Demonstrable arteriosclerosis of the peripheral vessels is slight or absent. Uraemic manifestations, reinitis, and anemia are relatively common. The patients of this group average thirty years of age, those of the arteriosclerotic group fifty years of age.

Cases with positive Wassermann reaction or marked history of rheumatism are excluded. The heart itself shows enlargement, an accentuated aortic second sound, sometimes a systolic murmur at the apex or base, often gallop-rhythm and valvular first sound. Occasionally an absolute aortic murmur. The usual prognosis is for not more than one or two years of life.

Most of the cases of "senile heart," "cardio-renal" disease, "myocarditis" and myocardial weakness have been grouped with the arteriosclerotic cases, some with the nephritic, a few with the syphilitic.

The table shows that 93 per cent. of 660 successive and unselected cases of failing heart can be pushed into one of these four groups. How much violence was used in the grouping process I shall try to suggest later on.

**The Exclusions.**

Outside these four groups fall (a) the "goitre hearts," that is those showing no cause for weakness except a thyreogenic intoxication (exophalitic goitre); (b) the "obese hearts," manifesting decompensation in very fat persons without streptococcic (rheumatic) or syphilitic infection, or arteriosclerosis, nephritis or thyreotoxicosis; (c) certain cases of myocardial weakness without any known cause. Had any of these occurred in athletes or ex-athletes they might have been called "athletes' hearts." But they did not.

**Limitations of this Classification.**

One patient had a history of syphilis, a positive Wassermann and an aortic regurgitation; also a "rheumatic history," a continued fever, murmurs suggesting a mitral lesion and a pure culture of atypical streptococci in the urine. He seems to belong in two classes at once (Classes 1 and 2).

Three patients (two with necropsy) had a "rheumatic" heart and type of history; also a glomerulonephritis. There is good reason to believe that the same organism caused the two lesions. I have, therefore, classed these cases in the "rheumatic" (streptococcic) group despite the presence of a glomerulonephritis.

There are good grounds for holding that arteriosclerosis and glomerulonephritis may act conjointly and simultaneously to weaken the patient's heart. In my table the few cases which seemed to me of this type were grouped among the "doubtful cases."

Many believe that syphilis may cause arteriosclerosis. If so, Groups 2 and 3 of my table would in part coalesce. The "syphilitics" of this table are the relatively active cases with positive Wassermann.

**Summary and Conclusions.**

1. Ninety-three per cent. of 600 recent hospital cases of failing heart have been found to group themselves without much resistance into four classes: rheumatic (streptococcic), syphilitic, arteriosclerotic and nephritic.

2. About 5 per cent. cannot easily be thus classified. The remaining 2 per cent. are "goitre" hearts.

3. In the 275 rheumatic cases females predominate: 170, or 61 per cent.; 105 males, or 39 per cent.

4. Sixty per cent. of these rheumatic cases began before the twenty-second year. The typical rheumatic heart patient is therefore a young girl.

5. Of the seventy-four syphilitic cases 70 per cent. were in men; only 30 per cent. in women. The typical syphilitic heart patient is a middle-aged man (average age 47), with aortic regurgitation and no rheumatic history.

6. The ninety-three arteriosclerotic patients averaged 59 years of age. The 117 glomerulonephritic patients averaged 36 years. The arteriosclerotics are therefore twenty-three years older than the nephritic. The sexes are about equally represented in these two groups.

7. Diagnosis, prognosis and treatment are put on a more rational basis if we give up the terms "myocarditis," "cardiorenal" disease, "aortic regurgitation," "mitral regurgitation" or qualify them with an adjective like "syphilitic," "rheumatic" or "arteriosclerotic."

8. Practically all the stenoses belong in the rheumatic group.

**A CASE OF BILATERAL OPTIC NEURITIS DUE TO SPHENOIDAL SINUSITIS PRESENTING SEVERAL FEATURES OF INTEREST.**

(a) By A. ALISON BRADBURNE, F.R.C.S.Ed., Manchester

The addition of yet another case to the long record of eye affections due to sinusitis is excusable on this occasion, by reason of the following:—Its method of onset, the implication of the abducens nerve, and its fortunate termination. As...
far as one's researches have extended the last two features seem not to have been recorded before.

The patient was an apparently healthy married lady of twenty-seven, with one healthy child and no history of miscarriages or other evidences of speculation.

When she consulted me in January, 1914, she gave a history of twelve months' headaches, the pain being situated chiefly at the back of the head and neck. About Christmas time she had suffered from a severe cold in the head, accompanied by a fairly copious nasal discharge, but it had cleared up without resort to medical advice. Recently she had experienced a muffled feeling when gazing into the distance, and a tendency to double vision at times was noticed when looking to either side. She had no trouble in reading or sewing, and, except for the former complaint, was in excellent health.

Examination revealed a slight weakness of abduction of the left externus muscle, and the vision in this eye was 5/10 and in the fellow eye 5/5.

The right optic disc and fundus were normal, whilst the only change detectable in the left was a slight suspicious blurring of the nasal border and some hyperaemia. The pupils were equal with normal reactions. No tenderness on pressure; no piosis or proptosis. The left visual field showed a slight peripheral contraction and a little enlargement of the blind spot, normal field for red. The patient was advised to rest from her work for a week's time. When next seen diplopia had become very troublesome, although no actual squint was discernable. The fundus changes were unaltered.

Seen again three weeks after the first visit, neuritis was plainly evident in the left nerve, although the vision had improved to 5/5. As time passed the whole disc became blurred, the vessels emerging from a cloud. The other disc became slightly affected in about five weeks from the onset, attacking mainly the upper edge of the disc and gradually spreading along the nasal border, the temporal and lower margins being unaltered during the whole course of the affection. At this stage the patient complained of intense neuralgic pains affecting both sides of the face and back of neck, and, as well as the exophthalmic, its extraction was advised and carried out.

In March eight degrees of deviation of the abductor was present, which reached its maximum of fourteen degrees a few weeks later. The condition of the left disc became gradually aggravated, but at no time was the central lumen closed. A broad patch of exudation appeared at the upper and inner section, where there was also a small hemorrhage. The vision in both eyes remained normal (5/5 and J.1).

No chorioiditis or K.P. present.

The suggestion had been made at the commencement of the illness that the seat of the mischief was in all probability located in the nose, and she accordingly agreed to consult Dr. Courtenay Yorke, of Rochay Street, Liverpool, who furnished the following report: "At Christmas, 1913, the patient had severe rhinitis with purulent discharge. As the eye changes appeared immediately afterwards, it was thought feasible that they were dependent on some inflammatory condition in the posterior ethmoidal labyrinth or in the sphenoidal sinus. The absence of pus in the nose was not opposed to this idea as a closed empyema of one of the posterior ethmoid sinuses would have extended to the cellular tissues of the orbit would anatomically most adequately explain all the ocular changes. A symptom suggestive of sphenoidal sinus suppuration was occipital headache. On examination, the nose was found to be apparently quite healthy. The septum was in the middle line, and no trace of pus was seen. The naso-pharynx was normal. On transillumination both sides were clear, no pressure was observed over any of the sinuses accessible to the finger." And yet, as the sequel proves, the sphenoidal sinus was undoubtedly choked with matter, a feature which the many recorded cases show is particularly common, and, in fact, to be expected.

At the consultation cocaine and adrenaline tampons were applied to the body of the sphenoid, with the removal of the matter by gentle measures. The manœuvre became impossible, on account of the patient's apprehensiveness and nervousness. It was, therefore, decided to keep the patient under careful observation, and if necessary at a later date to explore the posterior ethmoidal cells and sphenoidal sinuses.

The following day the patient suffered from what she termed "cold in the head," accompanied by a copious, thick yellowish discharge. This continued for over a week, and caused the patient intense discomfort, and when seen again the neuritis was plainly subsiding. Five weeks later the diplopia suddenly ceased to trouble her, but slow, jerky nystagmus on extreme abduction could be elicited. The condition of the discs was improving, and the central vision still normal. When the disc was examined at its height slight piosis of the left upper lid manifested itself, and this feature, it was particularly noticed, became more marked when the patient was apprehensive or suffering from mental excitement—as, for instance, when the idea of operative measures was suggested to her at the consultation.

She was last seen in October, and complained then of occasional attacks of blurred vision—more marked on getting out of bed in the morning or when entering a brightly lighted room. She experienced no difficulty in near work, or moving about abroad or in her home. She still suffers at times from pain down the right side of the neck, aggravated when the head turns suddenly to the right. Has no diplopia, but occasionally stumbles when walking.

The eyes show equal, but dilated pupils, which react feebly to light, but fairly to accommodation and convergence. Slight jerky nystagmus can still be elicited, otherwise the ocular movements are free and full, and there is no squint and no piosis. The left disc is still hyperemic, its whole edge blurred but definite; exudation covers the vessels in places, but does not seem to cause any sudden constriction, although as a whole the vessels seem to be narrowed. A lesser marked condition is present in the right disc, and in addition are two patches of exudation, one above to the nasal side and one below. The vision in both eyes is 5/5 and J.1, the visual fields are contracted, but the central scotoma remains about the same size—viz., 10 deg. in right eye and 5 deg. in left eye.

This case presents several features of interest, and some problems the solution of which can only be surmised. When first seen the only objective signs were the slight weakness of the left abductor and the suspicious neuritis of the left disc. The length of time which elapsed before the neuritis became definitely evident on the face of the disc undoubtedly pointed to a lesion affecting the nerve itself many weeks before, as further confirmed by the absence of pain or tenderness on pressure over the eye-ball and the primary implication of the sixth nerve. The implication of this
nerve still further assisted the localisation of the seat of mischief, for such could scarcely be anywhere else than at its situation on the body of the sphenoid, where it traverses the cavernous sinus alongside the carotid artery. By direct extension of the mischief forwards the implication of the optic nerve can be explained, for, as pointed out by O'Nodi in his investigations on the relations of the optic suleus, this canal can be formed entirely by the bone forming the sphenoidal sinus. It is possible that in this case the sixth nerve may have had an abnormal relationship to the carotid artery in the cavernous sinus, and, instead of lying external to the artery, might have lain on its mesial aspect in contact with the bone. This theory would explain why the occurrence of abducens paresis has not been recorded before. Again, the localising feature of this paresis enables one to put out of court any liability of the posterior ethmoidal cells, which, as is well known, are a frequent cause of optic neuritis.

A more difficult symptom to account for is the complaint of occipital pain, which is, I believe, almost pathognomonic of sphenoidal sinus trouble. In my humble opinion, such may be attributable to implication of the sympathetic plexus around the carotid artery. That this was affected is proved by the character of the piosis. The dropping of the lid might be due to levator paralysis, but, as it is a very important point to find the frontal division of the third nerve implicated without at the same time the fourth nerve being involved. The piosis in this case was due to weakness of the bundle of non-striated muscle fibres running between the striated fibres of the levator, along the under surface of which they run to be inserted in the upper margin of the tarsus, a muscle discovered by and named after Heimrich Müller, and innervated by the sympathetic. That the sympathetic was affected is confirmed by the aggravation of the piosis under mental excitement; despite the fact that the other classical text-book (sic) symptoms were not at the same time present.

The termination of the case is not without interest. At the first consultation one had a very strong suspicion where the mischief lay, due in no small degree to the history of rhinitis, which had suddenly ceased. When, then, a fairly lengthened interval followed before the neuritis became established, the diagnosis became practically settled, and I ventured to express the opinion that the recurrence of the original cold in the head would be a blessing in disguise. The sequel proved the truth of the surmise, although one scarcely expected it would prove as beneficial as it turned out.

JEJUNOSTOMY FOR MALIGNANT STRICURE OF THE OESOPHAGUS.

By DOUGLAS DOUGLAS-CRAWFORD, F.R.C.S.

Hon. Surgeon, the Royal Southern Hospital.

The operation of jejunostomy has been advocated for various conditions by Maydl, Neumann, Mayo, and others. It was not until consulting a paper by Mayo Robson in January, 1912, that I fully appreciated its possibilities as an alternative for gastrostomy.

Mayo Robson thinks most favourably of the operation, and would extend its field of usefulness much further perhaps than would be generally accepted. He considers that, in practice, it is suitable in all cases of malignant stricture of the oesophagus. He considers the operation suitable no mention is made of malignant stricture of the oesophagus. He thought the operation would be possible in malignant stricture of the oesophagus. He had no experience of the results of gastrostomy. For some years I have had serious doubts as to whether the operation of gastrostomy prolonged life; in some few cases it may have done so, but often one felt that operation had hastened the end, and in the past two or three years I have declined to operate unless specially urged thereto by patient and relatives.

Malignant stricture of the oesophagus runs a fairly rapid course, a year or eighteen months being the average duration, but death may occur within a few months from the onset of the disease.

One case I can recall—that of an elderly man—in whom the first difficulty of swallowing manifested itself only eight weeks before his death, which took place on the ninth day, the tenth upon which I had intended to do a gastrostomy.

Within the past two years I have had seven cases of stricture of the oesophagus under my care—six men and one woman. Of these, five men submitted to operation, the oldest being 72 years of age and the youngest 44. In three of these the stricture was situated in the oesophagus above the diaphragm, and in the other two opposite the seventh dorsal vertebra.

The longest history of inability to swallow solids was given as twelve months, the shortest eight weeks, and all had had regurgitation of fluids very shortly after swallowing for some days before operation.

Perhaps the most important point in the operation of jejunostomy, as in gastrostomy, is the avoidance of leakage from the fistulous opening. In my first case, owing to faulty technique, leakage of intestinal contents took place, leading to considerable damage to practically the whole of the skin of the abdomen, and causing one some anxiety for a few days. One precaution which was taken was to bring the fistula down above the diaphragm and, in the other two opposite the seventh dorsal vertebra.

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during the previous six months that the patient complained of the difficulty in swallowing solid food. For three weeks he has had difficulty even with fluids, regurgitation occurring soon after swallowing. Dr. Lloyd Roberts demonstrated a stricture of the esophagus; and at the diaphragm by X-ray of a bismuth meal, and transferred him to the operation theatre. A jejunostomy was done on April 16th, 1912. The patient went home on June 10th, feeling very well and having put on weight. It was in this case that leakage from the fistula occurred. In November, 1912, I found that this patient had been transferred to the workhouse owing to some mental troubles. The head surgeon informed me that the fistulous opening had closed, and although there was evidence of secondary deposits, the man was able to take food by the mouth. This might suggest that our diagnosis had been incorrect. I am inclined to think, however, that central necrosis of the tumour had occurred, resulting in restoration of the patency of the esophagus. This case is instructive in showing how readily these fistulas fail to he. Case II.—C., aged 72, admitted under Dr. Lloyd Roberts in May, 1912. He had suffered from dyspepsia for about eight months, and had had difficulty in swallowing for four months. During the preceding few days he had not swallowed anything, and was considerably emaciated. The X-rays showed a stricture at the lower end of the esophagus, with marked dilatation above the stricture and vigorous peristalsis. The patient suffered from heart block, pulse being 32. On May 8th the abdomen was explored: the stomach was very small, and the glands along the lesser curvature were enlarged. A jejunostomy was done, and the patient fed as in the previous case. He did well until August 23rd, when his pulse, which had never been above 42, rose to 90. Vomiting set in, and in the next forty-eight hours his pulse became uncountable, and he died on August 25th. The whole course of the disease was apparently less than eight months' duration. The autopsy showed secondary deposits in the liver. Sections of the growth showed an exceedingly malignant type of carcinoma.

Case III.—E. L., aged 59, admitted under Dr. Lloyd Roberts in July, 1913. He had had difficulty in swallowing solids and liquids for eight months. During the preceding week he had been unable to swallow fluids. The stricture was shown to be opposite the seventh dorsal vertebra. A jejunostomy was done on July 18th. His condition improved considerably; he put on weight, and was sent home on August 23rd.

Case IV.—D. M., aged 43, admitted on October 10th, 1913. He was apparently quite well until July, when suddenly he began to lose after taking food. The food returned quite unaltered. He had lost considerable weight since July. For the preceding week he had been unable to swallow fluids. A stricture was demonstrated opposite the seventh dorsal vertebra. His condition improved after operation, and he was discharged on November 15th.

Case V.—W. T., aged 44, admitted under Dr. Lloyd Roberts in November, 1913. A year ago he noticed that regurgitation occurred a few minutes after taking food. The vomit consisted of undigested food. His weight at that time was 13½ stone. In August he vomited a quantity of blood. On admission his weight was 8 stone. He was fed on a fluid diet, and gained slightly in weight until December 1st. He then began to lose rapidly. On December 23rd he was very collapsed, with a pulse of 140. He improved slightly in the next twenty-four hours, but died on the 27th, something to be done. In this case, also, the stricture was situated at the lower end of the esophagus. An idea of this patient's condition can be formed from his weight, which was at the time of operation (December 24th) 6 stone 2 lb., while a year before it had been 13½ stone. He stood the operation wonderfully well, and although on January 18th, 1914, he had lost 4 lb, since operation, during the last five days, by altering his diet, he has more than regained this lost weight. Since operation he thinks that he has been able occasionally to swallow food, but this is doubtful. The thought, however, that he is able to swallow even a small amount of food exercises a favourable mental effect, and he is quite bright and cheerful.

The results in these five cases justify one in regarding jejunostomy as an excellent substitute for gastrectomy. I feel confident that if gastrostomy had been attempted in the last case it would have ended in disaster. Jejunostomy can be done more quickly; a very small incision suffices to enable one to withdraw a loop of jejunum; there is very slight disturbance of visera, and practically the whole operation is done outside the abdomen.

Either operation is but a palliative measure in so desperate a condition as malignant stricture of the esophagus; but if it be our duty to do all in our power to prolong life and at the same time make the end less distressing, then in jejunostomy we have an operation which fulfills these requirements.
myself suddenly from falling over. About midnight I had another five minutes' sleep sitting up at the roadside. At about 1:30 a.m., on July 28th, I had a very long hill, after which I had to proceed very slowly and gave up. For the next hour or so I was again continually nearly falling over and had to keep on saving myself. Then, at about 2:30 a.m., I came to a long descent; I began to freewheel down it, going very slowly. This descent occupied about a quarter of an hour, and during it I dozed sufficiently to dream about totally extraneous matters, and during this I still felt balanced, never once, as far as I can remember, having to save myself from falling. At 2:45 a.m., at the end of the descent, I awoke and felt quite refreshed. I rode at a good speed into Cologne, and once in the town rode the next three miles at an unusually quick pace. I rang up a friend of mine in Cologne, who was expecting me, at 3:10 a.m., and I have his word that I showed no signs of fatigue, but was as wide awake and lively as usual. The total distance from London was 286.5 miles. On leaving him at 4:45 a.m., I rode another four miles to a hotel where I had ordered a room. After getting into bed I counted my pulse, and found its rate to be 80 per minute. I was not very tired—in fact, it took some little time before I fell asleep.

OPERATING THEATRES.

ST. THOMAS'S HOSPITAL.

A CASE OF ABDOMINAL EXPLORATION IN A SOLDIER—BEFORE OPERATING, Mr. EDRED M. CORNER said: This is a case of a soldier, a type of injury and operation found amongst the wounded. We are apt to forget that where a large number of men are gathered together there will be a lot of injuries and accidents, domestic or military in character. The patient is a non-commissioned officer, an old soldier, with an unbroken history of good health and wellbeing until an accident he received a blow in the abdomen with the butt end of a rifle. The accident was followed by haematemesis, for which he was admitted to a territorial hospital. The loss of blood was so severe as to lead to blanching of the patient. Melena was also found. As the patient could not "pick up " he was transferred to St. Thomas's Hospital. The occasional haematemesis continued, and his diet could not be increased without increasing the former. On examination, he had a dilated stomach, and waves of gastric peristalsis were seen travelling from left to right across the epigastrum. With a diagnosis of pyloric obstruction due to a carcinoma it was recommended that his abdomen be opened. This was done and a hardness felt surrounding the pylorus with secondarily infected glands all along the lesser curvature of the stomach and the vena cava. Clinically, and to the naked eye, this mass was carcinomatous and cystic. No resection of the pylorus was done. A palliative measure allowing food to pass from the stomach into the duodenum was chosen. The great omentum and the mesocolon were withdrawn from the abdomen and turned upwards towards the umbilicus. The forefinger of the left hand was then inserted into the abdomen and swept down the left side of the spinal column, commencing at the diaphragm. The first case of the thymus and the thyroid were identified to its attachment to the spine at the duodeno-jejunal flexure. It was then passed through the meso-colon and the anterior layers of the great omentum at the great curvature of the stomach, where a gastro-enterostomy was done by suture, thread on large curved needles being used. Mr. Cornier said that he did this form of gastro-enterostomy because he found that it was easier to do, and its results seemed better than those of the "cancer" of posterior gastro-enterostomy. If the patient's condition allowed it, he would have liked to do an enterostomy between the two pieces of jejunum, attach to the stomach, and occlude by stitches the bowel on the duodenal segment between the entero-enterostomy and the stomach. This proved impossible by entering the stomach, and ensured its passage into the jejunum. The exposed vena cava were drenched with warm normal saline solution and reduced. The abdomen was closed in layers, a continuous catgut suture closing the wound in the peritoneum and the posterior rectus sheath. No continuous and loosely-tied catgut suture brought the halves of the split rectus muscle together, stopping all oozing; a few interrupted silk sutures were used to unite the edges of the anterior rectus sheath which were further approximated with a continuous catgut suture. The skin incision was closed by interrupted sutures of celluloid thread.

As it was not clear at the operation if the pathological condition was carcinomatous or inflammatory, Mr. Corner had decided not to submit the patient to the more severe ordeal of pyloroplasty. As an illustration of the aptitude of such an incision, Mr. Corner quoted the case of a gentleman upon whom he had operated some six years ago. At the operation the pyloric end of the stomach was seen to be the seat of what appeared to be a carcinoma. Beads of growth were seen in the lymphatic vessels leading to enlarged glands, which in their turn extended through the diaphragm to the chest. The condition was one of inoperable carcinoma of the pylorus. A gastro-enterostomy was done, and the relations of the patient were much afflicted with the news. Six years and more have passed by, and the patient is red and healthy, and a farmer. The pain and the discomfort that he felt. The patient eats every variety of quantity and quality of food. In fact, it is obvious to all that the cancer was no cancer and that the patient is cured. The present patient, a well-developed man, gets an accidental abdominal injury, and all his symptoms date from that. At the operation is found pyloric obstruction and secondary (inflammatory) glands. Why should they not result from inflammatory changes consequent on the primary homogeneous lesion? One could be miserable and exclaim "Cancer!"? Let us hope that that diagnosis is wrong. It is nice to be wrong sometimes.

Mr. Corner strongly urges the use of palliative operations as apparently old-standing conditions for recent symptoms found at exploratory operations.

TRANSACTIONS OF SOCIETIES.

THE NEW LONDON DERMATOLOGICAL SOCIETY.

MEETING HELD THURSDAY, DECEMBER 10TH, 1914.

The President, Dr. DAVID WALSH, in the Chair.

Dr. D. VINRACE showed (t) a case of rapid subsidence of secondary syphilis after neo-salvarsan in a young man.

The President agreed as to the rapidity of the change produced by this drug. He had seen a definite improvement within even a few hours of commencing treatment. He commented upon the large bulk of fluid, 200 c.c., introduced. Dr. H. SAMUEL said that formerly he gave neo-salvarsan in 200 c.c. of freshly distilled water; but latterly he had used 10 c.c. only. The latter was just as effective; in fact, complications were less likely to result, such as the Harschener phenomena. Moreover, it only required a small syringe, instead of a large apparatus. He did not know of any real objection against the larger volume, but was not aware of the reasons for preferring it to the small volume. A large operating abdomen and some existing occurred occasionally with large volumes.

Dr. VINRACE replied that the larger volume acted much more efficiently than the small one. A parallel case was that of indolent Psoriasis, which should be given in plenty of water. He believed that 200 c.c. was the original measure of the excipient.
(2) A woman in whom alopecia had followed tinea tonsurans in her child twice. In the first attack, November, 1908, fungus was found in the child. In this second case, now exhibited, he did not suggest that his child had tinea tonsurans now, but that he had had it, and that the alopecia followed upon it. It was an instance of repetition of history. The mother twice had a patch of alopecia as the result of infection from tinea tonsurans in her child. The late Sir Jonathan Hutchinson certainly suggested that such grew what occurred here when he gave a demonstration on this mother and her child at the Polyclinic in 1908.

Dr. Norman Maclean said he remembered the ease very well, but could not find the case. In a case of alopecia areata one should ask the question: "Have you ever had ringworm in your childhood?" Patients nearly always said they had. But that was not scientific proof. Sir Jonathan Hutchinson's idea was that a large proportion of cases gave a history of prior tinea tonsurans. But in this case the woman appeared not to have had ringworm. He suggested they were dealing with a family epidemic of alopecia.

(3) Symmetrical wrist lesions for diagnosis in a youth, aged 19, who was employed in the decorative trade, and though he worked in red lead and dry ochre he declared that no irritants got to the affected parts. He now said he used "decorators' soap," having had a reaction from these patients who worked in lead factories and used lead paints often used strong soaps, but they did not have dermatitis unless some heart lesion existed. This patient had a weak, systolic, rough, smothered murmur, conducted down the sternum. If this man's condition went on to fail, he would probably have a severe generalised attack of eczema.

Dr. W. J. Middleton said he had often noticed that skin conditions were associated with many troubles and these latter should receive more consideration. Lead showed a special affinity for the nervous system. The President showed (1) a case for diagnosis in a young woman who was under his care at hospital in October, 1911. Two patches, one on the arm with a white centre and dark surroundings. He then regarded it as an ordinary leucodermic condition, and he had not seen the case since until now. There was no history of sore throat nor of headaches. Superficial scarring could now be seen. He gave her Unguentum perchlor. When he first saw the case he suspected syphilis, but there was no evidence of it. (2) A little girl with a longstanding cicatricial lesion of the nape. The lesion had been excised and was enlarged, probably as a result of secondary coccid infection. The edge was markedly rolled. He exhibited an artist's drawing of the lesion. He had seen Lupus vulgaris with a slough in the centre. The mother's evidence had always been shaky. One was forced to judge by clinical appearance alone, as consent could not be obtained for a biopsy. He suggested the diagnosis of rodent ulcer.

Dr. Mack asked whether the rolled edge was not unlike lupus vulgaris. Possibly it was a case of mixed infection.

Dr. Samuel said he regarded the case as lupus vulgaris, not as a post-exanthemal eruption because he gathered it had been there all the child's life. The scar in the centre and the nodules in the scar seemed to point to lupus vulgaris.

Dr. Mack asked whether, clinically, the case was one of lupus vulgaris; it had not the appearance of rodent ulcer. The difficulty of the past history was great. Rodent ulcer might develop in late childhood. At or near the age of 7, Dr. Gray published not long ago a case in which rodent ulcer occurred in the butt of a child; it appeared in the British Journal of Dermatology. He suggested the use of X-rays in this case, and perhaps tuberculin. Possibly there was a mixed infection in the case. He had not seen lupus vulgaris, and an ernie like this he had not. He did not deny the possibility of it being rodent; but a biopsy would settle it.

Dr. Vincze regarded it as lupus post-exanthematis. Several cases had been recorded in which lupus followed measles and chicken-pox. The mother had stated that at five years of age the lesion had an area of a farthing, and at four years was the size of a pin-point. Any earlier sign was doubtful, and likewise the congenital theory.

Dr. Maclean showed

THE CASES OF RODENT ULCER.

The first case was a woman at 54. Fourteen years ago the patient had, on the left side of the lip, a small cyst, which was removed by her local doctor. The present lesion had taken two years to attain to its present size. There was no pain. The appearance was different from that of the preceding case. The second case occurred in a man at 56. The lesion was on the right cheek, involving the lower eyelid, and there appeared to be some periosis of the orbit.

The President thought the second case was clearly one of rodent ulcer. It was necessary to ascertain whether the bone was implicated. There might possibly be epitheliomatous change present. For treatment, X-rays and radium were available. In the case of the female patient, the lesion had apparently followed traumatism—namely, the excision of the small cyst. There was no sign of atrophy. It seemed to be more malignant than rodent ulcer. If he had seen the lesion alone, without hearing the history, he should have had the opinion of Samuel. Samuel considered the first case was rodent ulcer; he had seen one exactly like it on the chin. The length of the history was against epithelioma, and no lymphatic glands seemed to be involved. The dilated veins on the surface removed the idea of it being rodent as also did the shiny stretched appearance.

SPECIAL REPORTS.

The Medical Press.

THE HEALTH OF LIVERPOOL. (c)

Is his report, which is well written and printed, subsidised with tables and illustrations, durably bound in cloth, and in every way a credit to the city of its issue. Dr. Hope tells us all we can well ask about Liverpool from his point of view. The estimated population in the beginning of the year was 756,552, an increase over the previous year of 4,532.

In 1913 the city boundaries were extended to include the neighbouring areas of Allerton, Childwall, Little Woolton, and Much Woolton which added 4,600 acres to the municipal area and increased the estimated population to 761,435.

The birth and death rates both show an increase over those of the previous year, the birth-rate being 29.8 as against 20.5, and the death-rate 18.0 as against 15.4 for the previous year. This latest birth-rate for Liverpool is rather below the average for the preceding five years being 18.4. The death-rate of Liverpool, like those of other large cities, is to some extent artificially increased by the influx of people coming in to the various hospitals from places outside the city boundaries.

The death-rate from zymotic disease was 2.2, epidemic diarrhoea, measles and whooping-cough causing 191, 322, and 232 deaths respectively. The death-rate from other infective disease is low, and continues to decline.

Although a large amount of attention has been given to the care of infants and young children, the death-rate for the problem year was 152 per 1,000, as against 125 in the previous year.

More than two-thirds of the total births in Liverpool are attended by midwives—viz., 16,459 out of 22,550. Pre-natal hygiene has not been neglected, and the Health Committee affords facilities for midwives to obtain medical help in case of emergencies. A special inspector has been appointed to follow up all notified cases of ophthalmia neonatorum.

The special service of tuberculosis receives thorough attention, both as regards sanatorium and other treatment, and the still more important preventive work, and it is realised that it is to prevention rather...
than cure that we are to look if we intend to reduce the mortality from this disease to any considerable extent.

The number of common lodging houses has diminished, and those that remain are strenuously inspected, and every effort made to prevent overcrowding.

In all the other routine departments of public health work Liverpool is well to the fore. We congratulate the men on the excellence of both of their work in the municipality and on the admirable way in which he presents his results to our notice.

CORRESPONDENCE.

FROM OUR SPECIAL CORRESPONDENTS AT HOME.

SCOTLAND.

GLASGOW UNIVERSITY AND THE WAR.

Graduates and students of Glasgow University, to a number approaching 1,000, are serving with His Majesty's naval and military forces, either at home or abroad. Before the outbreak of the war the Officers' Training Corps attached to the University numbered in cadets and ex-cadets about 600. On the outbreak of war applications for commissions were invited, and over 500 men sent in their names. Of these more than 300 have received commissions, for the most part to the new Army. Some 70 others have gone to the Special Reserve and 70 to the Territorial Force. The large number of men, comprising line, staff, and students who had had no military training, enlisted in the ranks, particularly of the Cameron Highlanders. Of those ranks some to have since received commissions in other regiments. The Officers' Training Corps is still carrying on its work; so much so that during the last two months 200 students have been undergoing a course of military training at Giffnock.

CENTENARY OF GARTNAVEL HOSPITAL.

This institution, whose proper name is Glasgow Royal Mental Hospital, attained its centenary this month. In view of the war the occasion was celebrated only by the granting of bonuses to all members of the staff. The first "Glasgow Asylum for Lunatics," which was afterwards the Barony House, was opened in 1814, and the present asylum was opened in 1843. The present Physician-Superintendent is Dr. L. R. Oswald, who is also Lecturer on Mental Diseases at the University.

PATIENTS FOR THE NEW GLASGOW HOSPITAL.

The new hospital provided by the North British Locomotive Company at their works in Springburn has accommodated for 160 patients. The first batch of wounded for it arrived on 24th inst., and numbered 100. They were all from the region of Ypres, and 25 were stretcher cases. Dr. James M. Grier is Resident Surgeon at the hospital, and Sir Hector Cameron is Consulting Surgeon; Dr. R. S. Dewar and Dr. J. Mills Renton are Visiting Surgeons, and Dr. A. M. Kennedy and Dr. J. B. MacKenzie Anderson are Visiting Physicians. Sir George Beatson was among those who received the patients on their arrival at the Central Station and saw to their transference to the hospital in 10 motor cars and eight ambulances, provided by the Red Cross Society and the St. Andrew's Ambulance Association.

CORRESPONDENCE.

THE WESTERN INFIRMARY.

Sir Matthew Arthur, Bart., president at the annual Christmas meeting of the managers and the staff, and among those present were Sir Hector Cameron, Sir George T. Beatson and Colonel Mackintosh, M.V.O. The military authorities have not yet called upon this hospital to treat wounded soldiers, or sailors, and in view of the many civilian cases waiting admission the managers have thought it right meantime to devolve attention to the ordinary work of the infirmary. About 25 members, however, of the medical and surgical staff are serving either at military hospitals in this country or at the front. Colonel Mackintosh, the Superintendent, is Assistant Director of Medical Services in the Lowland Division of the Territorial Force. Sir Hector Cameron, at the meeting, said that one of the most notable characteristics of the present war was the splendid arrangements which had been made for the treatment of the sick and wounded. In relation to the nursing profession there has occurred, however, one of the most astonishing phenomena of the war, the fact that nurses have not only gone into the field to perform their duty, but have become the leading spirit, which now touched the summit of human philanthropy.

LETTERS TO THE EDITOR.

[We do not hold ourselves responsible for the opinions expressed by our Correspondents.]

THE ADMINISTRATION OF BETHLEM ROYAL HOSPITAL.

To the Editor of THE MEDICAL PRESS and CIRCULAR.

Sir,—I am not surprised that you ask questions about the Royal Hospital of Bethlem, and I have no difficulty in answering them. I was a medical officer there for 17 years, and since then I have been and am a Governor.

The hospital was intended for the poor of the educated classes, and has been and is still for them.

In 1872, when I was a Lieutenant, the case of patients who have not shown signs of recovery at the end of a year are discharged to make room for more hopeful cases. There is a small special fund for a few incurable patients whose cases are specially suitable for charity. The income is derived chiefly from landed estates, and as their value has steadily fallen it was found impossible to maintain the large hospital and its convalescent branch in Surrey on the reduced income. In order to give a new lease of life to the hospital a new dispensary was established, and in 1914 the dispensary application was made to "The Charity Commission" for permission to admit a certain number of patients at a fixed rate of £2 2s. a week. This permission has been from time to time renewed, and as the result the hospital has been able to receive all who fulfil the condition of patients, and has made very great internal improvements.

There is a weekly committee for admission of patients, and this is fully represented by the City members.

The sad accident recorded by you was a result of the shortage of the medical staff for a time, due to the fact of the junior officer, who has always had to be nominally the apothecary, being on war service. At the very time the accident occurred the resident physician was engaged in submitting plans for the appointment of a dispenser. This has been done.

I think the County Council have no pursuit the hospital, which is under the Corporation and elected Governors.

The Governors are only too willing to submit the management to observation.

I am, Sir, yours truly,

G. H. SAVAGE.

26 Devonshire Place, London, W.,
December 23rd, 1914.

OPERATIONS FOR APPENDICTIS.

To the Editor of THE MEDICAL PRESS AND CIRCULAR.

Sir,—Physician's letter consists of a few personal observations and reflections which, however interesting in themselves, do not advance his thesis from the scientific point of view; nor do they supply
any fact towards demonstration of the necessity of the physician's services in any phase of appendicitis. Virtually nothing is known about the aetiology of disease, and neither physician nor surgeon can do anything to prove its uselessness. Of its pathology and morbid anatomy we know more than enough to prove that the usefulness of medical treatment in prevention of either a chronic phase or of an acute or virulent development. The physician is as powerless in treatment of appendicitis as he is in treatment of stone in the bladder, acute glaucoma, strangled hernia, cancer of the breast, or a score of other purely "surgical" diseases—i.e., diseases in which alleviation is offered the sole means of relief or cure. By a process of exclusion any physician ought to be able to make a diagnosis—a very necessary accomplishment. The number of surgeons or physicians who will dissent from these opinions does not seem sufficiently large to allow the physician not to recognise that when he writes about the "swing of the pendulum" he suggests that the great bulk of those specially qualified to pronounce judgment in a matter of life and death are influenced, not by scientific fact, observation and experience, but by some shallow fad or fancy. This is certainly a libel upon the surgeon of the day, than whom no class is more thoroughly steeped in the learning and knowledge that guide their art. A more kind-hearted and hard-headed lot of men it is impossible to find among professions claiming, albeit tacitly, to stand ultimately on a foundation of true humanitarianism.

I am, Sir, yours truly,

REVIEWER.

Christmas, 1914.

"AN IMPROVED (DOYEN'S) MOUTH GAG." To the Editor of THE MEDICAL PRESS AND CIRCULAR.

SIR,—There are many modifications of Doyen's original pattern, which is still sold by some makers. This was worked by a ratchet-like forceps instead of a ratchet and spring, so that its sudden release was sometimes difficult or impossible.

Most of Mr. Heath's objections (MEDICAL PRESS AND CIRCULAR, December 16th, 1914), may be obviated by care; the guarding of the ratchet is, however, a distinct improvement, as regards most patterns. In the one I use it is guarded by the (spiral) spring.

Nipping of the lower lip is a misfortune I used to find impossible always to avoid, especially with untrained children when the gag has to be put in before induction of anaesthesia (as is necessary when using nitrous oxide or ethyl-chloride only). I have found that it may be prevented by a simple oblong rubber strip of size adapted to the patient. This is put on the lower jaw of the gag, which passes through a horizontal slit near the top, so that the shield comes between the lower lip and the teeth. In Mr. Heath's model the fallacy is the shallow groove for the reception of the teeth, but I doubt whether this will prove always to be effective.

I am, Sir, yours truly,

J. D. MOORE, M.B., F.R.C.S.

Anesthetist, Central London Throat Hospital, etc., etc.

12 Clifton Hill,
St. John's Wood, N.W.

OXFORD OPHTHALMOLOGICAL CONGRESS. To the Editor of THE MEDICAL PRESS AND CIRCULAR.

SIR,—The Oxford Ophthalmological Congress will assemble at Keble College, Oxford, on the afternoon of Wednesday, July 14th next, and the meeting will be held on Thursday, the 15th, and Friday, the 16th July. A discussion will take place upon "Industrial Diseases and Accidents," the opening remarks of which will be delivered by Dr. Franklin B. Kneeland, of Newcastle-under-Lyme. The subjects included will comprise "Coal-miner's Nystagmus," having special regard to its "Symptomatology" (Dr. T. Harrison Butler, Leamington Spa), "Psychology" (Mr. T.S. Maitland Birnie, Birmingham); "Physiology" (Mr. J. Jameson Evans, Birmingham); and "Prognosis" (Dr. A. C. Norman, Sunderland). "Industrial Cataract" will be dealt with by Dr. William Robinson (Sunderland); "Plumbism as it affects the Eye" by Mr. S. McCrum (Stoke-upon-Trent); "Steel Furnace Accidents," by Mr. S. H. Pooley (Sheffield); and "Some of the Rarer Industrial Diseases of the Eye," by the Master, Mr. Sydney Stephenson, Dr. J. Gray Clegg, of Manchester, and Mr. M. Cohan, of the Home Office, will also contribute papers.

It is proposed to devote the first day of the meeting to demonstrations only, and it is hoped that members will make a special effort to assist with cases, specimens, operations, or lectures. If your readers have any such, that they are willing to bring forward, will they kindly notify the undersigned at the earliest opportunity, and their contributions will be welcomed.

I am, Sir, yours truly,

BERNARD CLAYTON,
Hon. Secretary.

Wolverhampton,
December 22nd, 1914.

PROHIBITION IN AMERICA. To the Editor of THE MEDICAL PRESS AND CIRCULAR.

SIR,—Dr. Reid's experience in America with regard to prohibition, as reported in the MEDICAL PRESS AND CIRCULAR, December 16th, p. 629, is so contrary to mine as to make some notice.

I have never met an impartial non-abstainer, in America, who did not inform me that in his opinion prohibition is a failure; and even abstainers have stated to me that they were afraid there was a quantity of illicit drinking. I know always where to go to get some "strong soda water." The alcohol was always of an inferior quality, which does far more harm in excess than well-matured spirit. This also applies to Norway, another country where prohibition exists. I am afraid Dr. Reid must have met some of his Medical Temperance Association's fanatics. I am, Sir, yours truly,

THOMAS DUTTON.

25 New Cavendish Street,
Harley Street, W.,
December 23rd, 1914.

PROFESSIONAL ETIQUETTE AND THE R.A.M.C. To the Editor of THE MEDICAL PRESS AND CIRCULAR.

SIR,—Mr. M. Mayne asks a very plain question, to which, I think, a very plain answer can be given. The whole social fabric is founded on a spirit of compromise—i.e., the sacrifice of some portion of the individual will for a common purpose. Presumably, Mr. Mayne is an ordinary Infirmary Medical Officer but occasionally operates. He is therefore not entitled to be considered an expert on a highly technical matter. Equally presumably, the Consulting Surgeon to the Troops is a hospital surgeon of eminence who, from the constant practice of operating, is an expert. Under the circumstances, Mr. Mayne's obvious duty was to have subordinated his authority and opinion to the interests of the patient. He did not do this. Therefore, ethically considered, his conduct was wrong.

I am, Sir, yours truly,

KENNETH CAMPBELL.

23 Wimpole Street,
London, W.

REVIEWS OF BOOKS.

"OHTER SCRIPTA THROAT, NOSE AND EAR." (a) In this brochure the author places before his readers some notes on the treatment of abnormal conditions in these regions of the throat, nose, and ear, frequently met with in practice. Special attention is given to some points bearing on the application to infections in these

(a) "Ohter Scripta Throat, Nose and Ear." By A. R. Friel, M.A., M.D., Hon. Physician for ENT. Throat and Ear Department of General Hospital, Johannesburg. Bristol: John Wright and Sons, Ltd. 1914. Price 2s. 6d. net.
OBITUARY.

Dec. 30, 1914.

regions of the methods devised by Sir Almroth Wright on the one hand, and Professor Leduc, of Nantes, on the other, for the combating of bacterial diseases. The little book contains three chapters. In the first the author gives miscellaneous notes on common conditions in the throat, nose and ear. We note that this is postmortem operation we have not met with a case of severe bleeding. He points out that vario-malar rhinitis, and other conditions of the nose, can be much improved by electrolysis of the part where swelling is marked, the technique of this operation being fully described. In Chapter II. the value of zinc ionisation is described; while Chapter III. is devoted to the consideration of the treatment of ozena, with some notes on Friedlander's pneumobacterium. The procedure contains much interesting information of practical value, and should appeal to all those in general practice who may be called upon to deal with affections of the throat, nose and ear.

PEDiATRICS. (a)

This work is a complete treatise upon the management and treatment of the infant and child from birth onwards in health and in sickness. Every phase of child life is fully dealt with, and all ailments functional or organic of the ear, nose, and throat are described, together with the treatment requisite at different ages-periods. The first portion deals with the nutrition and growth of the new-born infant, the subject of feeding by natural and artificial means and the causes of malnutrition are next described with the appropriate treatment of each. No two children are alike in age or in habits, and Professor Kerley is careful to point out the necessity for an individualised plan of the way of each infant, and stress is great on the importance of the formation of correct habits of life from the earliest possible age. He who would lay claim to any special knowledge of children's complaints soon finds out that a large proportion of his practice is connected with weakly children of the upper and middle-classes. The problem of the "delicate child" is discussed in a special section, and careful directions are outlined for the management of such cases. Much trouble would be saved if mothers would take pains to be more methodical in the ordinary, everyday management of their children, for, after all, the future health and wellbeing of infants are largely in the hands of their parents.

Then follow chapters upon the diseases of each system, which are described in detail, over sixty valuable prescriptions being incorporated in the text. In such acute affections as whooping cough a timely warning is given against the exhibition of heat stimulants too early in the course of the disease. We notice that the author favours the treatment of pulmonary tuberculosis in children at home, rather than in sanatoria, for="life is a great prophylactic if vigorous, and personal supervision, to domestic hygiene. He is also a firm believer in the efficacy of baths, for he says, "I have yet to know of a child who suffered from the effects of a bath properly given, and I know of hundreds of children who have suffered because of its absence." With regard to the administration of unpalatable drugs to children, the method of giving them, when possible, in capsule, tablet or pill form is recommended, since "the element of taste is a most important one in a child." A short account is given of vaccine therapy, but the section on tuberculin is too short and hardly carries conviction. The various gymnastic exercises that are put to therapeutic use are well described. Scattered throughout the book are brief descriptions of illustrative cases which maintain the interest of the various sections in a practical manner. The majority of the illustrations are well chosen. Though X-rays are described for other affections, we do not find them mentioned, curiously, in glaucoma. A list of drugs is given with the appropriate internal dose from six months to five years. The practitioner who is in search of a one-volume encyclopedia of children's diseases cannot do better than take Kerley's "Practice of Pediatrics" as his guide.

HOW TO LIVE LONG. (a)

That the veteran author of the present work has benefited himself by the advice and hints which it contains, as well as generations of physicians who have lived, is evident, for in the preface to this, the fourth edition, he says, that although in his own 67 years, "I possess good health and a fair amount of strength, and am able, to some degree, to watch the progress in my old profession, in science and art and social matters; and I still enjoy the beauties of nature in my country walks, and above all things the intercourse with my children and their families, and with old friends." Thus it by no means follows that the grasshopper should become a burden when "the sound of the grinders is low," and if the doctrine of temperance in all things, moderation in eating, the cultivation of careful discipline in the habits of life, and the knowledge of the methods of prevention of disease were more widely disseminated among mankind, centenarians, or at any rate nonagenarians, would be found in every street. The author attributes the most important factor in longevity to the state of the arteries, and this is true, in keeping with the now accepted clinical observation that "a man is as old as his arteries." The advantages of regular open-air exercise, and especially of walking, and of running in the open air for a part of middle life are emphasised. The perils of worry are pointed out in the chapter upon food, where the author remarks that some persons do themselves harm by continually fearing to violate the rigid rules of living which they have no knowledge of the way in which they are imposed on them." Most helpful are the hints about sleep and the prevention of insomnia, and instances are given of celebrities and great mental workers who have done with very little sleep. All who would "fain see many days" would do well to read and ponder the pages of this most practical book.

OBITUARY.

SIR ROBERT SIMON, M.D., OF BIRMINGHAM.

We regret to record the death of Sir Robert Simon, B.A., M.D.Cantab., F.R.C.P.Lond., Consulting Physician to the Birmingham General Hospital, which took place on the 1st June last, at Edgbaston, of heart failure following influenza, aged 64. The deceased, who qualified as M.R.C.S.Eng. in 1875, received his medical education at Caius College, Cambridge, and afterwards served as a Captain in the 4th Fusiliers. He was appointed Physician to the Birmingham General Hospital, and then to M.R.C.P.Lond. four years later. His father was Mr. Louis Simon, of Nottingham. Sir Robert was well known as a physician of sound judgment and a teacher of no ordinary ability. He was at one time Professor of Medicine at the Netherfield College, and afterwards was Professor of Therapeutics at the Birmingham University. He was formerly Physician to the Manchester Southern Hospital for Diseases of Women and Children, and afterwards, was appointed Physician to the Birmingham General Hospital, a post which he held for twenty-three years. He received the honour of Knighthood in 1910. In 1885 he married Emily Maud, daughter of the late Mr. W. H. Willans, of Highcliffe, Seaton, Devonshire. Sir Robert Simon was the author of "Lectures on the Treatment of the Common Diseases of the Skin" and also of a work on "Diseases of Grassworkers."


The Drug Habit—Future Sale of Laudanum.

It was stated that the deceased, who was the widow of a soldier, had lived for some years in India, where she contracted a malady for which a doctor prescribed laudanum. For the last five or six years she had taken four or five ounces of the drug every week; on Friday she had an ounce. On Saturday morning, on arriving at the Polytechnic, she was taken ill and died.

Mr. Thomas, the manager, said he had supplied the deceased with four or five ounces of laudanum a week for the last five or six years. He knew it was a deadly drug, but he continued serving her because she did not seem to be affected by it. At present the law only required that the poison should be supplied in a bottle distinguishable by touch, and that the label should bear the name of the drug and the name and address of the seller. On January 1st, however, laudanum would be included in the first schedule of the Poisons Act, and the purchaser would have to sign the poems book. The drug was to be strengthened, which, he thought, would be better in the interests of the public, and a purchaser would be easily traced in criminal cases. From five to six weeks ago a baby had been killed by one drop. Witness had known a man to take three ounces at a time without dying. No doubt the deceased would have gone elsewhere if he had not been supplied, and he had not noted her at the other druggist.

Dr. Thomas Massie, who was called to the deceased, said that death was unconnected with the taking of the drug, and was due to heart failure, following inflammation of the lungs.

In his evidence, in accordance with the medical evidence, the jury expressed their thanks to the General Medical Council for having the drug placed in the First Schedule.

The coroner said he agreed.

Royal Naval Medical Service.

The following has been granted commission as temporary Surgeon in His Majesty's Fleet:—A. M. Gray, M.B., S. S. Beare.

Royal Naval Volunteer Reserve.


Army Medical Service.


Lieutenant W. N. Alexander relinquishes his temporary commission (December 10th); Temporary Lieutenant F. G. Sharpe resigns his commission (December 11th).

University of London.

The following have passed the M.D. examination:—

Branch I. (Medicine).—L. A. Dingley, B.S., University College Hospital; T. P. Edwards, B.S., St. Bartholomew's Hospital; L. B., L. Horsburgh, B.S., Manchester University; J. H. Lloyd, B.S., and Jivraj Narayan Mehta, B.S. (University Medal), London Hospital; J. Tattersall, B.S., St. Mary's Hospital, London.

Branch III. (Mental Diseases).—G. W. B. James, B.S., St. Mary's; J. C. Woods, B.S. (University Medal), London Hospital.


Branch V. (State Medicine).—W. A. Berry, B.S., St. Mary's and Royal Institute of Public Health.

London School of Tropical Medicine.

The following have passed the examination at the end of the 46th session of the London School of Tropical Medicine:—


Society of Apothecaries of London.

The diploma of the Society was granted to the following candidates, entitling them to practise medicine, surgery, and midwifery:—D. Havard, H. R. Hibboton, C. H. Phillips, G. Robinson, T. J. R. Scholz, and W. C. S. Wood.

Conjoint Examinations in Ireland.

The following candidates have passed the examination by the Royal College of Physicians and the Royal College of Surgeons, Winter, 1914:—


The Subdivisions of Chronic Metritis.—Shaw (J.M., Obst., and Gyn, Brit. Emp., xxvi, 2) says, from a pathological standpoint the nomenclature is hardly correct, but is invaluable as a definite clinical term. By it is meant a uterus symmetrically enlarged and hard, which contains no fibro-myomatous or malignant disease, and which causes haemorrhage, pain and leucorrhœa. Microscopically a multiparous uterus can always be distinguished from a parous uterus by the distribution of the elastic tissue, as there is always some remains of the elastic layer to be found around some of the vessels of the stroma. Trabeculation has been quite normal. Subinvolution uteri which histologically show large amounts of elastic tissue around the blood vessels form the main mass of those uteri which are diagnosed clinically as chronic metritis. Chronic metritis is a grade of chronic involution: A section through any part of the uterus shows the increase in size to be due to an increase in the amount of all the constituent elements. The majority of the specimens show a slight increase in the fibrous tissue, especially in those that differ from the third, but in a specimen was marked around the blood vessels, nor the increase sufficient to account for the size of the uterus. The elastic tissue has the same distribution as in the normal multiparous uterus, but in very much greater amount. The vessels are increased in size and their walls thickened, but in the majority of cases not markedly. The great change is the amount of elastic tissue in and around the blood vessels. In fifteen out of twenty-two specimens thickening was marked in thickness, but evidently not from congestion. Ten of the specimens were from patients who dated their symptoms from their last confinement, while in twelve the symptoms only developed when the patients were pregnant. Their last confinement had been from three to twenty years previously. All specimens in both classes of history showed exactly the same changes. It is at the menopause, when the muscular tissue atrophies, that the true growth takes place. It is significant that the clinical symptoms—haemorrhage, pain, enlargement—differ from the last group in that they occur in nulliparous women. All this class had walls considerably thickened of the tissue which gives the arrangement as found in the normal virgin uterus. None showed any increase in the percentage of fibrous tissue, the increase being made up of muscular and fibrous tissue in the normal proportions. The blood vessels are not increased in size or number. In this group the uterus may be as large as in the sub-involution class, and this is produced by a definite hyper trophy of all the constituents. The marked is the thickness of the endometrium. It appears that in this group the endometrium is primarily at fault from some unknown cause, and these cases are cured by curettage during the early stages while the hypertrophy is confined to the endometrium. If this thickening is allowed to persist it acts as a foreign body and gives rise to general hypertrophy from extra work and effort to expel the thickened endometrium. F.

Tetiology of Eclampsia and Albuminuria.—Young (J.M., Obst., and Gyn, Brit. Emp., xxvi, 1) says there is no doubt that pregnancy is the cause of eclampsia and the poison in its ultimate origin is to be traced to the child or the placenta. Since the toxemia may persist after the death of the child, the child must be excluded as the source of the poison, and the resultant thrombosis will cut off any supply from the maternal blood; the placenta therefore must be the source of the poison. The paper goes to prove that the source of the toxins is the recent infarcts commonly found in the placenta. In severe cases ending rapidly in labour there may be no evidence visible to the naked eye of placental disease, but if the placenta is born several days after the attack, massive necrosis of recent origin is seen. It requires some time for the necrosis to evolve into visible form. Placental infarction is due to an interference with the maternal blood supply of the parturient, and the clinical symptoms are dependent upon the maternal blood supply and can live on even when the fetus is dead. If necrosis is not the result of toxemia, and may be found most extensive in cases where there is no evidence of toxemia—i.e., accidental haemorrhage. The placenta is unique as an organ in which products liberated from a dying patch can pass directly into the blood-stream. For the occurrence of toxemia, a circulation of blood from the placenta to the veins of the uterus is necessary. In the absence of a functioning placenta, the placenta becomes detached, and why there is no toxemia in accidental haemorrhage. Where the placental disease is gradual there is more chance of the isolation of the placenta. This explains why in long standing albuminuria there may be more visible disease than in an acute eclampsia. The toxin is concluded to be aborticidal in products liberated in the early stages of the placental death. By irritating the process this internal abortion has been separated from normal placenta which can reproduce the clinical features and morbid changes characteristic of eclampsia. Parturient eclampsia is not explained by this theory, except by a possible retention in the uterus of a portion of placenta to act as the source of the poison. F.

Adenomymenorrhagia of the Uterus.—Both Leitch and Gough (J.M., Obst., and Gyn, Brit. Emp., xxvi, 2) report cases of this in which disease of the uterus was accompanied by that of the sigmoid flexure, and of the Fallopian tube in the case reported by Gough. Neither of the reports suggest metastatic origin for the secondary growths, and it is significant that they are really due to direct extension of the growth through the uterine wall and then invading a neighbouring organ which had become adherent and subsequently became detached. In both cases the uterine in the intestine was extending from the serosa towards the mucosa and infiltrating the muscular coat.

F.

Syphilis and Salvarsan.—Gibbard and Harrison (R.A.M.C., J.M., October, 1914) gave an interesting description of the treatment of syphilis by salvarsan at the Rochester Row Hospital during the last four years. In proof of the value of this treatment they state that in place of 345 clinical relapses within the first year out of 371 cases of syphilis treated with mercury alone they now have 9 clinical relapses out of 283 cases treated with salvarsan and mercury. The purely mercurial cases were treated regularly throughout the year; the salvarsan and mercury cases were mostly treated for only the first three months. They have yet to experience their first casualty after giving more than 3,000 injections, and out of 4,428 injections given by officers in seven large stations in the United Kingdom, from whom they have received reports, only one death has been experienced. This, in fact, is the only death from salvarsan which has been reported to the War Office since its introduction, with the exception of one death in India from gumma in the brain a few days after an injection. They have only had two cases of cranial nerve disturbance in cases treated with salvarsan. Considering that every known method of examination, including lumbar puncture, was used to detect relapses, they consider that no form of treatment has yet been devised for syphilis which
has given such good results—results which mark more than anything else the enormous advance in the therapy of syphilis which Ehrlich's discovery has made.

K.

Thyroid Operations under Local Anesthesia.—Lahey (Boston Med. and Surg. Jnl., October 15th, 1914) records his experience in operating under local anesthesia on eight patients for enlargement of the thyroid gland. He preferred the walls of the wound to be free from pain, prepared, with 15 minims of adrenalin added to each ounce, was used in all but two of the cases. In these two cases a 1 per cent. solution of novocain was used, but it was not found who be so satisfactory as the stronger solution. Dr. Lahey considers that better results are obtained if the first infiltration is made into the skin rather than into the areolar tissue beneath the skin, but points out that it is important to make a further injection of the novocain round the large veins of the platysma before they are clamped. Considerable discomfort is experienced by some patients, but the writer expects to be able to overcome this to a great measure by the use of scopo- lamine. This further experience and a paper which has been written shows the advantage of this addition. Dr. Lahey draws the following conclusions from his experience:—It is unfair to draw any broad conclusions from this small number of cases. While the operations could not be said to be free from pain, yet the pain suffered was slight. Each operation took approximately one-third longer than it would have taken with ether, but the technical difficulties were greater. The writer has followed them when ether is administered. The post-operative recoveries have been excellent and much more comfortable for the patient than in cases where ether had been administered. On the whole, the procedure has been found to be useful and will continue its use, especially in cases of patients presenting toxic symptoms.

K.

Results in Cases of Gastric and Duodenal Ulcer.—Joslin (Jnl. Amer. Med. Assoc., November 21st, 1914) records the end results in a group of patients presenting the symptoms of gastric or duodenal ulcer who have been under his care during the last sixteen years. These patients numbered 234, and of these the present condition of 213, or 91 per cent., is known. Of the total number 149 were men and 85 were women. The average age of the men when first seen was 45 years and 2 months, but the age at the onset of the complaint was 38 years and 8 months. The average age in the women was 36 years and 4 months, but at the onset 39 years and 10 months. The average duration of the ulcer in patients still unreplied is 3 years, the average duration of ulcer before the patients reached the surgeon 10 years. There were 131 patients who were treated medically throughout, and of these at present 53, or 39 per cent., are well, 55, or 42 per cent., are relieved; 16, or 12 per cent., are unreplied; and 9, or 7 per cent., died. Of the patients who were operated on when medical treatment had failed, 82 were traced, and of these 33, or 40 per cent., are well; 13, or 6 per cent., are relieved; 10, or 12 per cent., are improved, and 3, or 4 per cent., are dead. If one deducts 12 deaths for which the surgeon should not be held responsible there are 70 surgical cases, in which 51 patients, or 47 per cent., are well; 13, or 10 per cent., are relieved; 10, or 14 per cent., are improved, and 14, or 20 per cent., are dead. The combined medical and surgical results show at present: well, 84 patients, or 52 per cent.; relieved, 68 patients, or 42 per cent.; unreplied, 26 patients, or 12 per cent.; dead, 35 patients, or 16 per cent.

MEDICAL WAR ITEMS.

An officer in the R.A.M.C. contributes his experience of active service at the Front to the Times as follows:—

"Figure to yourself (as Wells says, isn't it?) a country of flat threshed field, pollard willows, and deep muddy ditches. Then we came along, and in military parlance, 'dug ourselves in.' That is, with the sweat of the brows of hundreds of Tommies working by day and deep trench-makers working by night, to make the line a solid one, from the earth thrown up another 13 feet as a bank on top. These trenches are 13 feet to 2 feet wide, and curl and twist about in a maddening manner to make them safer from shell fire. Little caves are scoured in the sides of the trenches, where men live about four to a hole, and slightly bigger dug-outs where two officers live. All the soil is clay, st黏ker and greasier than one could believe possible. It's like almost solid point, and the least rain makes the sides of the trenches slimy and the bottom a perfect sea of mud—pulls the heels off your boots almost. One feels like Gulliver walking along a Lilliputian town all the time. The front line of trenches—the fire-line—have scientific loopholes and look-out places in them for seeing and firing from, and a dropping fire goes on from both sides all day long, but is very harmless. I was just starting for my daily constitutional on top when the enemy began their bombarding, nearly 12 hours earlier than usual, and I suppose will be able to get away with this instead. Yesterday we had one man killed and two wounded, the first casualties for over a week. The story of one of the wounded is worth telling to show you the pluck of these men. He told me he noted some new formation on the shoulders of the enemy in front of his firing-post. One can see the spadelike of earth coming up from below the ground level when new trenches are being dug. Although this was in broad daylight, our man thought he was safe, and what the trench was to be, so he hopped over the side of his trench and runs forward 30 yards to a ditch and crawls along it some 100 yards or so. He then spots a large shell-hole in a field on one side of the ditch, so doubles off and looks out for him. The second man upbursts the first roundly for being a fool, carries his rifle for him, and brings him back. All this is done quite in the day's work and 'sub rosa,' as they would get punished for leaving the trench on that in the daytime if it was spotted. The pluck of these men is perfectly extraordinary, and the placid way life goes on under the risk of being shelled or sniped any moment is, until one gets used to seeing it, quite past belief. I must say the officers set the men a magnificent example."


NOTICES TO CORRESPONDENTS, &c.

E. F. Correspondents receiving a reply in this column are particularly requested to make one of a Distinctive Signature at Initial, or to avoid the practice of signing themselves "Reader," "Sahabhairsh," "Old Sahabhairsh," &c. Much confusion will be spared by attention to this rule.
SUBSCRIPTION.

Subscriptions may commence at any date, but the two volumes each year begin on January 1st and July 1st. They are also taken free on or before December 31st. Foreign subscriptions must be paid in advance. For India, Meares, Thacker, and Co., 83, William Street, Calcutta. Indian subscriptions are Rs. 13.12.5. Messrs. Dawson and Sons are our special agents for Canada, and for South Africa, Airing Co., South Africa, General Robertson and Co., of Sydney and Melbourne, are our special agents for Australia.

ADVERTISEMENT.

For our Issuenote—Whole Page, £2; Half Page, £2 10s.; Quarter Page, £1 5s.; One-eighth Page, £1 12s. 6d. The following advertisements are made for a whole page—13 insertions at £3 10s.; 26 at £3 5s.; 53 insertions at £3, and per rates for smaller spaces.

Small announcements of Practitioners, Assistants, Vacancies, Books, etc.—seven lines or under (70 words), 4s. 6d. per insertion, payable at time of insertion, or in advance. It is necessary to mention clearly the name and address of the writer, not necessarily for publication, but as evidence of identity.


The following insertions are official—Ordinary Articles on Letters intended for publication should be written on one side of the paper only and must be accompanied with the name and address of the writer, not necessarily for publication, but as evidence of identity. Such communications of the Editors are entered as second-class matter at the Post Office. The Editor is the Proprietor.

The following insertions are reprints—Reprints of articles appearing in this Journal can be had by addressing the Editor, giving the number and page, and the number of copies required. Requests should be typewritten, addressed to the publisher or printer before the type has been distributed. This should be done when returning proofs.

HIGHER MEDICAL OBJECTIVES.

The Editor of "The Surgery at Home" for January, 1915, commenting on his book, says:—"It is a splendid attempt to prepare the students at Middlesex Hospital. He remarks:—"The speech was an excellent one. Every sentence came off with a clatter, and the whole superficies words shorn away, and not a word wanting. I suppose it was characteristic of Kitchener that the address was entirely empty of compliments, either to students or teachers; and that the greater part of it—"it was quite short—"was devoted to telling them that they would need much more instruction and training if they became doctors in the army. They would require special knowledge as to the conditions of life in barracks and in camps, and in the active service. The concluding censure of the address was, "Work hard and read hard.""

Dr. T. H. M. (Conchett):—Communication arrived just as we were going to press and is too late for insertion in the present issue. The subject is dealt with in our editorial column.

FACTORY AND WORKSHOP ACTS, 1901 to 1911.

The Factory Department of the Home Office gives notice that every medical practitioner attending, or called to visit, a patient whom he believes to be suffering from lead poisoning, phosphorus poisoning, arsenic poisoning, mercury poisoning, or arsenic, is required by the Factory and Workshop Act, as revised by the Factory and Workshop Act, 1901, under penalty, to notify the case forthwith to the Health Officer, or a doctor or medical practitioner therefor, and he is entitled to a fee of 2s. 6d. for his doing so. The notice should state clearly—The name and address, and occupation of the patient; the disease from which he or she is suffering; the factory or workshop at which he or she has been employed and is believed to have contracted the disease; the name and address of the notifying practitioner; the nature and date of notification. All such notices should be addressed to the Chief Inspector of Factories, Home Office, London, S.W. No stamp need be affixed. Form for notification will be supplied on application. M.R. (York).—The use of eroticism in pornography is advocated by many authorities. Markwich's has recently recommended 10 per cent. of caustic soda in 5 c.c. of four times a day or 10 c.c. of a 20 per cent. solution twice daily as a hypodermic injection. The disease is said to be greatly relieved, and the general symptoms to be much abated. The temperature falls by this means, which has a bacteriological effect, is slowly abolished.

THE O.P.A. MARKS.

The order the tropheus Decere, en route to——, all men were advised to be vaccinated. Three or four days after, when the news was in, of the order of the Government, was heard between two privates of different battalions of the same name. "Bill, I see that's goten four marks on thy arm and I've nobuted three.""Ay, know, I belong to the 4th Battalion, and we're all goten four marks on our arms."

The Bishop of Derry is a dashed good man. We don't belong to the 16th Battalion—Manchester Guardians.

Vacancies:

Bradford Poor Law Union.—Assistant Resident Medical Officer. Salary £50, with rations, apartments, and washing. Applications to George M. Cowther, Clerk to the Guardians, Union Offices,Bradford, Dec. 7th, 1911.

Kent County Asylum, Chatham, near Canterbury.—Junior Assistant (third Medical Officer). Salary £250 per annum, with furnished quarters and attendance, coal, gas, milk, garden produce, washing, and board. Applications to Medical Superintendent.

Halil City Asylum.—Assistant Medical Officer. Salary £200 per annum, with board, lodging, and washing. Applications to the Medical Superintendent at the Asylum, Willow Hill, near Hall.

Yardley Road Sanatorium (190 beds) and The Anti-Tuberculosis Central Institution (200 beds).—Assistant Medical Officer. Salary £200 per annum, with board and residence. Applications to the Medical Superintendent, The Sanatorium, Yardley Road, Yardley, near Birmingham.

Edmonton Union (500 beds).—Second Assistant Medical Officer. Salary £100 per annum, with residential allowance. Applications, F. Shelton, Clerk, White Hart Lane, Tottenham, N.

Appointments.

Bennell, Frank George, M.D., B.S.Lond., L.R.C.P.Lond., M.R.C.S., Assistant Tuberculous Officer to the Plymouth Borough Council.

Hall, Octavius, L.R.C.P., and S.Edin., D.P.H.Irel., Tuberculous Officer to the Medical Board of the County Borough of South Shields.

MacRae, R. W.,M.D.Aberd., Assistant School Medical Officer for the County of Chester.

Mager, J. R., L.R.C.P. and S.Irel., Medical Officer to the Londonderry Port Sanitary Authority.

Martin, John.—L.R.C.P., L.R.A., Medical Officer of Health to the Hipperholme Urban District Council.

Martin, Douglas, M.R., Ch.B.Edin., B.T.M., Assistant School Medical Officer to the County Borough of South Shields.

Murray, Stewart, L.M.S.R.C., School Medical Officer to the Sutherland Town Council.

Deaths.

Alpin.—On December 29th, at 2 Woolwich Road, Ealing, the wife of Lt.-Col. W. Alpin, L.M.S., of a daughter.

Enoch.—On December 29th, at Convalescent Home of G. E. Edge, M.D., Wilnecote, Warwickshire, of a son.

Evans.—On December 22nd, at 101 Princess Avenue, Hull, the wife of Rev. E. Evans, M.R., of a son.

Phillips.—On December 26th, at Clinton Road, Redhurst, Corwall, the wife of Lionel L. Phillips, M.R.C.S., of a daughter.

Marriages.

Allie.—Hamlet.—On December 23rd, at St. Stephen's Church, Hampstead, Charles Nelson Alie, M.R.C.S., L.R.C.P., D.P.H., to Dorothy, youngest daughter of Frank Hanley, of Hampstead.

Brook.—Cobert.—On December 5th, at All Souls', Langham Place, very quietly, owing to the war, Lt. E. A. P. Brook, R.A.M.C., to Elsie, youngest daughter of J. F. Cobert, of 5 Cavendish Place, W.

Freest.—Barnes.—On December 12th, very quietly, at St. Mark's Church, Dewsbury, Dr. Thomas Priestley, of Dewsbury, to Kathleen Barnes, late House Surgeon of the Dewsbury Infirmary, L.R.C.P., L.S.A., of a daughter.

Vennells.—Cox.—On December 23rd, at 8, Augustine's Grove, Park, S. Augustine's, Hackney, James Vennells, M.R.C.S., of a son, youngest son of Mr. and Mrs. E. Geoffrey Vennells, Esmer, Weybridge, to Helen Croweick, youngest daughter of Mrs. Cox, of Holland, Bridgewater.

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