

BRITISH MEDICAL ASSOCIATION.
SUBSCRIPTIONS FOR 1903.

SUBSCRIPTIONS to the British Medical Association fall due on January 1st each year. All members who have not yet paid should forward, without delay, postal order or cheque for 25s., to the General Secretary, 429, Strand, London, W.C., or, in the case of Colonial members, to their Branch Treasurer.

British Medical Journal.

SATURDAY, JULY 4TH, 1903.

"CHARLOTTENBURG" AND AFTER.

THE great scheme for the foundation of a college of applied science for teaching and research in the higher realms of technology, launched by the letter addressed by Lord Rosebery to the Chairman of the London County Council, has been on the stocks for the last two years or more. The conception, though grandiose, ought to appeal to the practical commercial instincts of the country; and we are glad to know that the appeal has, in fact, met with so much success that the contributions already promised so nearly approach the sum of £300,000, the minimum suggested as the capital expenditure, that the Chancellor of the University of London has felt himself justified in applying to the London County Council to provide £20,000 per annum for the maintenance of the institution. Lord Rosebery's letter was considered by the London County Council at its meeting on June 30th, and referred to the General Purposes Committee in conjunction with the Technical Education Board.

Details of the organization of the proposed institute are to be settled in consultation with the Senate of the University and other bodies concerned, but it is intended that, while working in close co-operation with the Royal College of Science, the Central Technical College, and other branches of the University, the new institute shall be organized as a distinct school of the University to supplement provision for teaching and research now existing in London by taking up subjects as yet dealt with inadequately, or not at all. Only advanced students able to profit by the instruction and facilities for original research which the institution is to provide will be admitted. The subjects which the Chancellor of the University enumerates as those to be embraced in the Institute are chemical technology, mining and metallurgy, electro-chemistry, electric traction, optical technology, bacteriology, railway and marine engineering, hydraulics and naval architecture. As the London County Council has already recognized the existence of the need for greater facilities for education and research in London in these subjects, there is reason to anticipate that the proposal to make an annual grant for maintenance will be sympathetically received, and that a London "Charlottenburg" may come into existence in a not distant future.

The scheme has little direct bearing on biology or medicine, but indirectly it may have an important influence on the development of teaching and research in these subjects in London. In the first place, it may be hoped that the example set by Messrs. Wernher, Beit, and Co., who have placed a large sum of money in the hands of trustees to be applied towards defraying the cost of building and equipping the new Institute of Technology, may be followed by other

men of wealth, and that thus the habit of giving to the University of London may be created. In the second place, the fact that the arguments in favour of the establishment of such a college in London were being brought to the notice of wealthy men, and that an appeal was about to be made to complete the capital sum required, has tended to deter members of the Senate and Faculties of the University, interested in other branches of learning, from launching proposals which must be carried out if the University is to be worthy of the capital of the Empire.

The theory that a teaching institution which prepares students for a profession or handicraft must be altogether or to a very large extent self-supporting—a theory evolved, we believe, by Chancellors of the Exchequer—is now disappearing, but it has had a deterrent influence on men who might have made large gifts or bequests to institutions engaged in higher education. We hope it is not too sanguine to believe that, when the case is properly put before the public, contributions may be obtained in sufficient amount to warrant the establishment of a great medical institute in connexion with the University. The Chancellor has announced that the Royal Commissioners of the 1851 Exhibition will probably be willing to place a suitable site for the erection of the Institute of Technology at the disposal of the trustees, on condition that funds sufficient for building and equipment are raised, and that adequate provision is made for maintenance. The site extends to about 4 acres, adjacent to the present University buildings at South Kensington, and close to the Royal College of Science now approaching completion, and the Central Technical College of the City and Guilds of London Institute. Some two acres will still remain in the hands of the Royal Commissioners, and there are grounds for hoping that they may be willing to hand over these acres for the erection of an Institute of Medical Sciences upon similar conditions as to the raising of funds for building and maintenance. For the reasons mentioned no serious effort has yet been made to raise the money which will be required; but such an effort must be made before long, and we trust that it may have the success which it deserves.

THE FROUDE-CARLYLE CONTROVERSY.

REFERENCE has already been made in the BRITISH MEDICAL JOURNAL to the unedifying controversy which has been rekindled by the publication of a book entitled, *New Letters and Memorials of Jane Welsh Carlyle*, with an introduction by Sir James Crichton-Browne. Sir James, in the ardour of his championship of Carlyle, cursed the memory of Froude with a vigour and a wealth of vocabulary which Ernulphus might have envied. Mr. Ashley Froude and Miss Margaret Froude retorted by publishing a private record by Froude himself of his relations with Carlyle not intended by him to see the light.¹ They cannot fairly be blamed for seeking to vindicate the character of their father; it is deplorable, however, that the publication of such a document should have been judged to be necessary. It consists of notes written by Froude in pencil, unrevised, and never seen by any one till after his death. These notes show how keenly he felt the storm of criticism which broke over his head after the publication of his *Life of Carlyle*. The special interest of the book from our point of view lies in the fact that it contains a

¹ *My Relations with Carlyle*. By James Anthony Froude, together with a letter from the late Sir James Stephen, Bart., K.C.S.I., dated December, 1886. London: Longmans, Green and Co. (Demy 8vo. pp. 80. 2s.)

statement in plain terms of what is obscurely hinted at in the biography—namely, that the secret of Carlyle's life was that "he was one of those persons who ought never to have married." In the last issue of the BRITISH MEDICAL JOURNAL Sir James Crichton-Browne came forward in defence of Carlyle against this "cruel imputation." He swings his controversial Excalibur with such might that he speedily reduces an adversary to the "doleful dumps" of the hero in the ballad. Had Mr. Froude been still alive he might perhaps have "fought upon his stumps," but being dead he has not a leg to stand upon.

We do not propose to go into the details of the question at issue. Sir James Crichton-Browne says that Froude "trusted entirely to rumour," and he certainly shows that the witness on whose testimony he appears mainly to have relied was quite untrustworthy. The evidence of Sir Richard Quain is not so entirely convincing to us as it is to Sir James Crichton-Browne; but we are heartily glad that the discreditable story as to the examination of Mrs. Carlyle's body after death in St. George's Hospital is now shown to be utterly false.

If Froude trusted entirely to rumour, it is only fair to say that Sir James Crichton-Browne seems to trust largely to gossip—some of which, as for instance the remarks attributed to the late Dr. Maclagan, seems irrelevant. On both sides it is a case of "what the soldier said," and that, as we know from the pronouncement of Mr. Justice Stareleigh, is not evidence. Sir James complains that Froude did not test Miss Jewsbury's statement, and points out that "many medical men who had attended Mrs. Carlyle were accessible." This strikes us as a somewhat remarkable suggestion from a writer who a little further on makes a fine display of indignation at the mere thought of Sir Richard Quain having committed an act infamous in a professional respect by divulging a secret confided to him by a patient. We take this opportunity of making a strong protest against the notion that seems to exist in the public mind that medical advisers are at liberty to tell everything they know about a patient who happens to be a man or woman of genius. One satisfactory feature in this wretched business is that the rumours and tattlings about the Carlyle *ménage* cannot be traced to the medical men who at various times attended the distinguished couple.

The fact is, there is no conclusive evidence either way as to Carlyle's physical condition. Sir James Crichton-Browne says that Froude has done his best to "brand Carlyle as a Narses." With all respect we submit that Froude did no such thing. Narses was a eunuch, and we have seen no suggestion that Carlyle presented any physical deficiency or anomaly. The evidence of trussmakers, etc., is really nothing to the purpose. There is a psychical as well as a physical impotence, and it is precisely men absorbed in brain-work, as Carlyle was, who are most likely to be the victims of the spell expressed in the old French phrase *nouer l'aiguillette*. Many a strong man has been bewitched in this way; some never recover from the mental effects of an initial failure. It has been hinted that this is just what happened to Carlyle, but no one can now know the truth about the matter; nor is it of the slightest importance to mankind or to the memory of the dead that it should be known.

Of Froude's statement we may say as the lisping French philosopher said of the existence of a deity: *Zolie hypothèse! Ça explique bien des choses*. We would point out, however, that this pretty hypothesis in no way touches the moral

character or intellectual greatness of Carlyle. Therefore, to speak of the allegation as a "vile imputation," a "foul falsehood," etc., as if impotence were a heinous crime, shows a want of the sense of humour which Carlyle himself displayed in regard to this very matter. Who that has read it can have forgotten his account of the squire of dames who was wounded in a duel and lived many years afterwards, doubtless breaking many commandments but keeping *one* with inflexible rigour?

We earnestly hope that this unseemly controversy will now be allowed to come to an end. By us, at any rate, the matter will not be again referred to, nor can we allow it to be discussed further in these columns.

DECIDUOMA MALIGNUM OR CHORION-EPITHELIOMA.

THE paper read by Dr. John Teacher, of Glasgow, at the Obstetrical Society of London, on June 3rd, on chorion-epithelioma and the occurrence of chorion-epitheliomatous and hydatidiform mole-like structures in teratomata, was followed by an excellent epidiascopic demonstration of drawings and photographs of microscopic preparations illustrating the nature and origin of chorion-epithelioma and its relation to the placenta, hydatidiform mole, and certain tumours which are not related to a pregnancy, but which show the same histological character.

Dr. Teacher, in his introductory remarks, assumed that the attitude of the Obstetrical Society towards the question of the placental origin of deciduoma malignum was the same to-day as it was in 1896, when it will be remembered that a special committee consisting of Messrs. Kanthack, Bland-Sutton, Targett, Spencer, Doran, Eden, and Griffith expressed the opinion that "there is nothing in the histological characters of these specimens to justify the supposition that they are of decidual origin, and the term deciduoma malignum is therefore an inappropriate one." Dr. Teacher asserted that this was the last word spoken at the Society on the question; that, as far as the Society was concerned, the matter was brought to a standstill by this report.

Dr. Horrocks, who opened the discussion on June 3rd, pointed out that a paper had been read before the Obstetrical Society in January, 1902,¹ on a case of chorion-epithelioma with pulmonary metastases, and that Dr. Teacher's demonstration only elaborated and exemplified the demonstration given by Dr. Cuthbert Lockyer in that paper, so that in justice to the Obstetrical Society of London it must be stated that the view of Marchand, which regards the so-called deciduoma malignum as a tumour arising in connexion with pregnancy and originating from the chorionic epithelium (or its forerunner the trophoblast) had already received acceptance by some at least of the Fellows of the Society.

It was pointed out by one of the representatives of the Committee of 1896 that the Society has no reason to regret the conclusions then arrived at on the evidence then at its disposal. At that time twenty-eight cases had been recorded, mostly under the name of deciduoma malignum. Several of these were ordinary forms of uterine cancer; of the rest, the most important were those of Sänger, Marchand, Gottschalk, and Whitridge Williams. Sänger's case, published in 1889, he himself regarded as a sarcoma of decidual origin. Gottschalk took his case to be a sarcoma of the stroma of the chorionic

villi. Marchand's case and that recorded by Whitridge Williams closely resembled one another. No villi were found in either of them. They contained cells which Marchand regarded as derivatives of the fetal ectoderm, by this he meant that they were derived from the cells which are now known as Langhans's layer, for at the time these growths were described Marchand and Williams regarded the syncytium as of maternal origin, a view which left the deep cellular layer of the villus wall as the sole representative of the fetal epiblast. But, as was pointed out in a criticism published in the *Obstetrical Transactions* for 1896, neither of these observers had been able to demonstrate the transition from placental villi to the structures composing these tumours, and what the Committee of 1896 asked was that this important link in the evidence should be forthcoming before Marchand's view was accepted. Not being able to supply this evidence, Marchand and Whitridge Williams relied entirely upon the nature and arrangement of the plasmoidal structures for support of the theory, but this did not convince the Pathological Committee, inasmuch as similar structures had been demonstrated in growths of the testis and elsewhere.

Since 1896, however, the missing link has been supplied. In fact, it came later in the same year, in a case recorded by Apfelstedt and Aschoff,² where from underneath the intact vaginal mucosa a tumour was removed containing definite villi in a state of vesicular degeneration; there were growths also in the uterus, lungs, and spleen. These authors both regarded the syncytium and Langhans's layer of the villus as of fetal epiblastic origin and rejected the older view that the syncytium was maternal, they therefore considered the tumour to be fetal in origin. In 1897 Neumann, clinical assistant in Schauta's clinic, recorded a case in which vaginal metastasis appeared eight days after the expulsion of a vesicular mole.³ On microscopical examination this growth, together with the uterine wall, was found to contain syncytium, and as Neumann was doubtful about the presence of Langhans's cells, he referred to the tumour as a syncytioma or carcinoma syncytiale. Since 1897 further work on the subject by Marchand, Martin, Pfannenstiel, Poter, Vassmer, and others too numerous to mention, has all helped to throw light on the true source of tumours containing syncytium and Langhans's cells.

Dr. Teacher evidently expected to find himself in the position of a sower scattering seed on soil rendered barren by what our German colleagues are pleased to term "insular prejudice," but we think he must have been agreeably surprised at the tenor of the discussion, especially at the adjourned meeting on June 16th, which proved that the views of Marchand were fully accepted by those Fellows of the Society most competent to speak on the subject.

As to nomenclature, a diversity of views was expressed even by those who were convinced of the fetal nature of the tumour in question. Deciduoma malignum, the term considered inappropriate in 1896, appeared to have more adherents than any other; and although the author thought his own choice of chorion-epithelioma, or the term chorio-epithelioma,⁴ both suitable as indicating the origin of the growth, he admitted that, since the name

deciduoma was so hopelessly wrong it could mislead no one, he saw no objection to its being retained. The ovular hypothesis as to the nature of those teratomata containing elements similar in structure to chorion-epithelioma and vesicular moles was left very much *sub judice*.

SUPERFLUOUS LEGISLATION.

THE Burgh Police (Scotland) Bill was introduced last year as the Burgh Police and Health Bill. To disarm objections which were raised to the introduction of an amendment of the Public Health Act by a side-wind, the words "and Health" have this year been omitted from the title of the Bill, but the public health provisions remain.

The promoters of the measure have adopted the unfortunate precedent of the Burgh Police and Health Bill of 1892 in attempting to weave into a Police Bill a series of public health clauses. The Bill of 1892 met with strenuous opposition on grounds of public policy, and the opposition was supported by the British Medical Association. The immediate result was that the promoters of the Bill first dropped the words "and Health" from its title, and, later, allowed the public health clauses to go by the board. The more remote result—the result which the opposition had in contemplation—was that in 1896 a well-considered Public Health Bill for Scotland was introduced, which became the Public Health (Scotland) Act of 1897. This statute in many respects marks a great advance on the English Act of 1875. Its more especial merit, from the point of view of the opposition to the Bill of 1892, is that it provides a uniform and harmonious sanitary code for the whole of Scotland, burghal and rural. It may be hoped that the opposition on this occasion may be equally successful, that the public health clauses will be withdrawn, and that an amending Public Health Bill, applicable to all Scotland, and embodying a few well-considered clauses, will follow.

The public health clauses of the Bill are not numerous, but individually they appear open to serious objection. Thus one clause, 60, provides, *inter alia*, for the appointment of deputy medical officers of health and sanitary inspectors. This is already provided for in its proper context in the Public Health Act, and nothing but confusion can arise from the duplication, with verbal variations, of existing clauses.

Another clause, 71, is of a more positively objectionable character. It provides that on a certificate from the medical officer of health, sanitary inspector, and burgh surveyor, the town [council may close a house alleged to be unfit for habitation. Incidentally one is inclined to ask what qualifications a burgh surveyor may be supposed to have for determining questions of health. But the other objections to such a clause are obvious. The Housing of the Working Classes Act already provides machinery for dealing with such cases in a less dubious way; it places the primary responsibility for dealing with uninhabitable houses upon one pair of shoulders—those of the medical officer of health. Under the imperial statute the case is heard in open court; in Scotland, before the Sheriff; under the Bill, such cases may be disposed of by the town council, sitting in private. Procedure of such a character is obviously open to grave abuse. Having regard to the fact that the Government has undertaken shortly to introduce a Bill amending the Housing of the Working Classes Act, the production of such a clause at the present time is singularly inopportune.

² *Archiv f. Gynäk.*, Bd. 1, Heft 3, pp. 516.

³ *Monatsschrift für Geburts. u. Gynäk.*, B. vi, p. 17.

⁴ Found in the *Transactions of the Obstetrical Society*, vol. xlv, pp. 34.

Clauses 86 to 94 are what are known in England as the "model tuberculosis clauses." It is objected to them in Scotland that—while they follow the English precedent of the Infectious Diseases (Prevention) Act, which empowers a medical officer of health who is of opinion that infectious disease is being spread in his district by milk from a dairy in another district, to enter that district and examine the dairy, etc.—they are contrary to the precedent set in the Scottish Public Health Act, which provides, in the like case, for the prompt and conjoint action of the medical officers of both districts.

The Bill has been referred to the Grand Committee on Law, where it is to be hoped it will be lightened by the relegation of the public health clauses to a more suitable context.

THE KHEDIVE AND HYGIENE IN EGYPT.

OUR readers and visitors to Egypt last December will remember the active and generous support which His Highness the Khedive gave to the first Egyptian Medical Congress. His Highness not only acted as Patron of the Congress, but came to its inaugural meeting at the Cairo Opera House, where he made an inspiring and able speech. Later, he gave two or three large receptions to the congressists at his Palace of Abdeen, and in many other ways showed the keen interest he took in the success of the undertaking. Without his generous help the Congress could not have attained the success and results it did. It may be remembered also that Mr. Reginald Harrison, the delegate of the Royal College of Surgeons to the Congress, executed his difficult task so tactfully and skilfully that he received the special thanks and congratulations of the Khedive. In view of the Khedive's visit to England some of the congressists and delegates expressed a strong wish that the British Committee formed on behalf of the first Egyptian Medical Congress should in some way endeavour to show honour to His Highness and express the indebtedness they all felt. As a result, certain members of the Committee were graciously received by His Highness last Sunday. The deputation, headed by Sir Frederick Treves (the President), consisted of Sir William Church (President of the Royal College of Physicians), Sir Douglas Powell, Sir Thomas Smith, Mr. Watson Cheyne, Mr. Reginald Harrison, and Dr. Page May. Sir Frederick Treves expressed the deep thanks and gratitude of the medical profession for His Highness's invaluable assistance during the recent Congress and for his enlightened help and guidance to everything medical in Egypt. His Highness assured the deputation of his intense interest in all medical and hygienic measures concerning the welfare of his people; also his great appreciation of the work done by British medical men in stamping out plague and cholera in Egypt, a country which stands not only geographically, but medically, between East and West. The Khedive also stated that the Egyptians are rapidly learning and adopting modern hygienic methods, and anxious to profit by recent advances in science, the value of which they are beginning to realize. His Highness graciously conversed with the members of the deputation, and has consented to accept an illuminated address expressing the profound indebtedness of the congressists to His Highness's support.

HIGHER EDUCATION, OLD AND NEW.

SIR WILLIAM ANSON, Parliamentary Secretary to the Board of Education, distributed the prizes to the successful students at King's College, London, on July 1st, and afterwards delivered an address, in which he said that what impressed him most in the education of the present day was its novelty. Educationally they lived in an age of discovery, knowledge was advancing by leaps and bounds, and educational methods were changing. The old classical studies were almost neglected in their ancient literary form and nearly lost in the pursuit of classical archaeology. Education

was now mainly regarded from the point of practical utility, and in Germany they saw how the State devoted itself to considering how scientific studies could be applied to practical purposes. When in this country the endeavour to apply this new principle to the old practice had led to a conflict between the old and the new schools, which Sir William Anson said he recognized as acute in his own University of Oxford, the old school said that the new studies were very expensive, and they did not really stimulate the mind or enlarge the mental vision, and that they could not be regarded as an education in the true sense of the word. The new school replied that the old was engaged with merely literary elegances, that such education was a mere drawing-room pastime, and that though they called themselves humanists and educators they taught nothing of any value to men for the life they had to lead. Sir W. Anson considered that both schools were wrong, for all acquisition of knowledge must be educational inasmuch as it enlarged the mental horizon. It only failed to be an education if they closed their eyes to everything beyond their own studies and became mere tabulating machines for acquiring facts. If the scientific man shut his eyes to the humanizing influence of other studies he injured his own work, for the arrangement of acquired knowledge and of the ideas arising from new studies was a work of art, and there was no science which was not susceptible of artistic treatment. It was a great advantage to have all courses of study carried on under one roof as at King's College; it reminded the students that there was a fellowship among all forms of study, for though the field of knowledge was vast yet every genuine worker in that field, however remote his work might be from others, was nevertheless a comrade in the advancement of knowledge. A great impulse was to be given to technical study in London by the proposal to form a great technical institute, and now far reaching that offer might be it was impossible to say, but it did seem to suggest very large and very fortunate results for the practical studies of this country. The practical work at King's College was in a singularly happy way to be combined with scientific study, and these practical scientific studies in London would do much for education, and would be an important factor in the education of the whole country.

EPSOM COLLEGE.

OUR attention has been drawn to a slight error in the report of the speech of Lord Rosebery at the Epsom College dinner which appeared in the BRITISH MEDICAL JOURNAL of June 13th. The error, as we have said, was slight, but by spoiling an antithesis the report failed to convey Lord Rosebery's view on a matter of considerable importance. What Lord Rosebery said was: "I have lived for some years as President of the Royal Medical Benevolent College of Epsom, and if I can die president of Epsom College I shall be content." Epsom College itself is a public school with a medical foundation, and other schools possessing similar connexions with other professions exist, but those who founded the Royal Medical Benevolent College of Epsom provided also for giving pensions to members of the profession who had fallen into poverty. The retention of the term "Benevolent" in the title may lead those who are not acquainted with the circumstances to suppose that Epsom College itself is of the nature of a charity school, whereas, as we have said, it is a public school with a medical foundation. In order to remove any misapprehension on this head it is the desire of the governing body of Epsom College to place the purely eleemosynary part of the work on a secure footing, so that in future the school may bear the simple name of Epsom College. We take it that it was Lord Rosebery's intention, in the phrase which we have now correctly given above, to express his sympathy with this desire.

THE NEW HOSPITAL AT BELFAST.

WE publish elsewhere a plan and full description of the new buildings of the Royal Victoria Hospital, Belfast,

which are to be opened by the King on the occasion of his visit to Ireland toward the end of this month. The plans as they stand are worthy of close study, as the conception of them is in some ways unique. The leading "note" is that a hospital should be regarded as a "health manufactory," and that in building it economy of the time and labour of those who have to work in it should be aimed at not less carefully than it would be in designing a modern factory for any other purpose. With this idea the whole of the 17 wards are placed literally side by side, only their intervening walls separating them, adequate lighting being provided by a large casement window and continuous roof "lanterns." For ventilation the "plenum" system has been adopted throughout, and it is intended that the temperature of each ward should be regulated according to the wishes of the medical officer in charge of it. The number of hospitals in which this system has been completely adopted is comparatively few, and for this reason alone its working in Belfast will be watched with interest. With the object, among other advantages, of securing better control over expenditure, the "unit" system has been adopted in its entirety. Each physician and surgeon has a small independent hospital, complete in every way, practically to himself. Perhaps, however, the most striking point of all is the estimated cost of the building. It is estimated to be, at the outside, not more than £350 for each of the 300 beds provided. As this includes elaborate out-patient departments, lecture rooms, administrative and residential quarters, x-ray and photographic rooms, separate pathological rooms, and an isolation building, it is a remarkably low sum, and should not be forgotten by those who are called on to consider tenders for hospital construction.

THE LONDON COUNTY COUNCIL.

THE London County Council resumed its session after the Whitsuntide recess last week, and was confronted by an agenda paper of eighty-six pages. A vote of sympathy with the family of the late Sir John Hutton, a former Chairman, was carried. The Council, upon the report of the Public Health Committee, approved of certain proposals for legislation in the year 1904, with a view to enabling sanitary authorities to require the cleansing or destruction of articles of clothing in a filthy or unwholesome condition, also to deal with verminous premises, to secure the removal of fixed receptacles for dust when movable ones had been provided, to secure the removal or reconstruction of offensive urinals, and to require the flooring of stables with impervious material; also to enable sanitary authorities to examine premises in which food is prepared for sale, and to prohibit hand-picking and sorting of refuse in London. The Main Drainage Committee reported some astounding figures as to the amount of pumping carried on on June 13th, 14th, and 15th during the recent deluge, with a view to prevent the flooding of basements, etc., in low-lying districts. Thus at the Abbey Mills Station, where the normal amount pumped is 75.12 million gallons a day, on June 13th the quantity amounted to 117.2 million gallons (rainfall 1.16 in.), on June 14th 162.5 million gallons (rainfall 1.42 in.), and on June 15th 177.9 million gallons (rainfall 0.68 in.). Indeed on June 13th, between 2 and 3 p.m., the water rose to a height of 22 ft. above its normal level, and the quantity pumped on June 15th is the highest on record. No breakdown of either pumps or engines occurred at any of the pumping stations.

STATE CHILDREN'S ASSOCIATION.

THE annual meeting of this Association was held by kind permission of Sir Edwin Dering-Lawrence, Bart., M.P., and Lady Durning-Lawrence, at 13, Carlton House Terrace, S.W., on June 23rd, and there was a large attendance. The Earl of Crewe, Chairman of the Association, who presided, gave an account of the objects and work of the Association. State children are Poor-law children who have to be provided for out of the rates. The objects of the Association are to abolish the large barrack schools, and to extend the system of boarding out these children or to

vide scattered homes for them. Under this last system each home contains from eight to twelve children under the care of a foster-mother. They enjoy the advantages of family life and mix with the ordinary child population, sharing in their interests, sorrows, and pleasures. The Association also encourages emigration to Canada, because it takes these children away from the influence of undesirable relatives or friends and from pauper surroundings, and gives them a fresh start in life. Allusion was made to a printed report by Dr. Priestley, Medical Officer of Health to the Borough of Lambeth, on an outbreak of measles at Lambeth Schools, Norwood. According to this report there had been five deaths from measles, three from whooping-cough, and eleven deaths from non-infectious diseases in these schools. The stamina of the children, previous to their contracting measles, Dr. Priestley said, was poor, and the state of their constitution was such as to render any illness that they might contract dangerous to life. The Association contended that by removal of these children from barrack schools to scattered homes this loss of life might have been prevented. The Rev. Canon Scott Holland, Lady Frances Balfour, and Miss Margaret Baines also advocated the claims of the society, and Mrs. Barnett, Honorary Secretary, read a report of the work which the Association had done during the past year. The average cost of each child in barrack schools is about £30 per annum, but in scattered homes it is from 6s. 6d. to 9s. 6d. a week, or from £16 18s. to £24 10s. per annum. The cost of boarding out children is even less, amounting only to £13 6s. 8d. per annum.

MEASLES AT THE LAMBETH POOR-LAW SCHOOLS.

DR. PRIESTLEY, the Medical Officer of Health for Lambeth, has recently been investigating the prevalence of measles at the Lambeth Poor-law Schools in Elder Road, West Norwood, which accommodate 600 children. He finds that during 1902, 5 deaths were registered as from measles among children in these schools, and the total mortality-rate was 31.7 per 1,000, as compared with 17.7 for the Borough of Lambeth. During January and February, 1903, 8 more deaths from measles were registered, making a total of 11 including the two months of November and December. Since October, 1902, and up to the end of February, 1903, there were 68 cases of the disease with 11 deaths, giving a case mortality of 16.2 per cent.; 60 cases and all 11 deaths were amongst children under 5 years of age. Dr. Priestley's inquiry was in particular devoted to (a) the nature of the nursing and attention given, (b) the state of health of patients before attack, and (c) conditions under which the patients lived before death. The result of the inquiry under (a) proved entirely satisfactory. But various facts elicited seem to show a low standard of health and constitution in the children previous to their attack of measles. Under all the circumstances this is not surprising. The immediate cause of death in all 11 cases was disease of the lungs, 2 cases being tuberculous. Inquiry as to the sanitary conditions under which the children existed reveal a state of things open to grave criticism. The drainage system is defective, old, and obsolete. Broken drain-pipes, defective joints, and ill-ventilated drains appear to be present. Open traps were found at the foot of the soil pipes near to the entrance doors of the dormitories in the playground, foul trough closets coated with filth, and waterclosets opening direct and ventilating into the dormitories are certainly very grave conditions to be obtaining in a large institution for the guardianship of children. It appears that measles was introduced to the schools, not from Norwood, but from the inner wards of the borough of Lambeth, whence children are drafted to the schools. From the schools the disease has now spread into the Norwood district. Further, whilst the schools have been planned in a suitable manner for preventing the spread of infectious disease, the actual arrangements of mixing the children from the probation wards with those from the general building in school hours has stultified the advantageous use of the premises. Dr. Priestley finds, then, that measles was introduced from Lambeth Borough in the ordinary course of events; but the infection, instead of being checked at the Poor-law

schools, has been increased by mixing the children and housing them under insanitary conditions. He makes a number of practical suggestions, and it is to be hoped the Lambeth guardians will at once apply the suggestions, and will also consider the advisability of making other arrangements for children under 5 years of age.

THE RÔLE OF ANTIFERMENTS IN THE PROTECTION OF INTESTINAL PARASITIC WORMS.

WHEN alchemists were seeking for the universal solvent, a cynic asked, Where is the vessel that will hold it? In the digestive tract we have ferments capable of dissolving, transforming, analysing, and modifying our various foods, and there are also, as are well known, many parasites that live in and thrive in our digestive juices. These juices, although they attack our foods, leave intact the "vessels" or viscera that contain them. The parasitic worms that live in the stomach and intestine, and even in the duct of the pancreas, and which belong chiefly to nematodes, trematodes, cestodes, and acanthocephala, are themselves not attacked by the digestive juices. Cysticerci, the larvae of taenia, in order to reach the intestine to develop into proglottides, have to pass the stomach, and must therefore be proof against the digestive action of the acid gastric juice. It would appear, however, that only the head and neck resist the digestive action of the gastric juice. Thus, not the whole animal, but only a limited part of it, is "protected." Moreover, it is remarkable that it is protected, as a whole, from the action of proteolytic ferments when it is in the tissues of its original host—for example, the sheep. This resistance is all the more remarkable, as some of these parasites—notably those without a digestive apparatus—have a very delicate outer covering through which the nutrient fluids can pass. Even in nematodes with thick coverings this covering cannot be the protective mantle, for the digestive ferments are taken into the intestines of these worms. The question is closely associated with another—namely, why the stomach and intestine are not digested by their own proteolytic ferments. The various theories—for example, that put forth by Bernard in 1856 as to the protective influence of the epithelium; of Pavy in 1863, as to the protective influence of the alkalinity of the blood—are not satisfactory. Notably so is this the case in the intestine where the ferment is active in an alkaline medium. In connexion with intestinal parasites, the recent researches of Ernst Weinland deal with their relations to the tryptic ferment. We have got a little further than the theory of the "living principle" of John Hunter, set forth in his famous paper in the *Philosophical Transactions* in 1772, although something very akin to it was again suggested by Matthes in 1893 and by Fermi in 1894. J. Frenzel in 1891, in dealing with the digestion of living tissues and intestinal parasites, suggested that the protection was perhaps to be sought in the presence of antiferments. When an appeal is made to experiment and an artificial digest—peptic or tryptic—is made with fibrin and to the mixture is added a few cubic centimetres of the juice expressed from ascaris or taenia and the whole kept at 37° C. under toluol, even after eight days' digestion, the fibrin is practically unaffected. In a control test without ascaris juice the fibrin was completely dissolved in an hour. This shows clearly that the protective influence has nothing to do with tissues as living tissues, or to the organism as a whole; as the clear expressed juice of the animal is protective for fibrin against the proteolytic ferments in a digest. This extract may prevent digestion of the fibrin for more than fourteen days; the expressed juice, if treated with 1 to 2 per cent. of sodium fluoride was found to be active after eight months. A second extract, to which a little common salt and disodium phosphate were added, was even more effective than the first. If the "juice" is boiled, its protective action is destroyed. Heating for ten minutes to 60° C. does not materially affect its activity, but when heated to 80° C. for ten minutes there is a very great diminution in its protective power. Thus the substance, whatever it is, has a relatively high resistance to heat.

The protective action seems to be due to substances which have a greater or less effect in inhibiting the action of ferments, and they have been called "antiferments." If the extract be kept warm a precipitate forms. This contains none of the active substance. The latter is contained in the clear filtrate. From this a substance can be precipitated by alcohol which possesses the antifermentative action of extract of ascaris, and this applies both to tryptic and peptic digestion. Most probably there are two substances, one antipeptic and the other antitryptic in its action. It would seem that ferment and antiferment may exist side by side in a mixture for a long time, and that the latter does not destroy the former, but only inhibits its action. The substances, whatever they are, are probably pretty closely and intimately connected with the cells, but with which of the cellular constituents is not proved. Fibrin impregnated with the expressed juice behaves like "living" tissue in resisting the action of proteolytic ferments. The net outcome of these experiments seems to be to show that the parasitic worms living in the stomach, intestine, peritoneal tissue, liver, etc., are protected from proteolytic action by the presence of specific "antiferments," and that these substances can be precipitated by alcohol without losing their protective influence. This is a very material advance in our knowledge, for it shows us that the explanation of some of the most difficult problems is to be sought along the lines of chemical research.

GIANT INFANTS.

OLD reports of infants of great size and weight are not to be trusted, but recent researches into the records of contemporary institutions show that the newborn child may be of proportions which without accurate record the obstetrician would think incredible. Mario Vecchi has recently reported in an Italian medical paper¹ a case of a true giant fetus, free from pathological changes and developmental anomalies. The mother was 28 years old, and had borne four children. At the fifth month in the next pregnancy the abdomen began to attain an unusual size, the patient suffering at the same time from a voracious appetite. At the labour the head presented with the occiput anterior and to the right, and was delivered spontaneously. The shoulders gave great trouble, and could not be delivered under half an hour. The placenta was nearly 8 in. broad; it was very thick and heavy. The child, apparently dead at birth, had to be abandoned by the midwife, as the mother was in jeopardy from flooding when the placenta was expelled. It measured 53 cm., or over 20½ in., in length; the girth of the abdomen a little above the umbilicus was 41 cm., or 16 in. The occipito-frontal diameter was 11 cm., or over 4¼ in.; the bis-acromial diameter 15.5 cm., or over 6 in. The child weighed 9.184 kilogrammes, or nearly 20¼ lb. Of other giant infants we may refer to some recently quoted by Whitridge Williams in his *Obstetrics*; according to him and to Dubois, who collected in 1897 28 cases in which the child weighed over 12 lb., the heaviest children on record were reported by Ortega (24 lb. 3 oz.), Rachel and Neumer (24 lb. 2 oz.), and Beech (23 lb. 12 oz.). The length of the child was 28 in. in Ortega's case, and 30 in. in Beech's. Thus, the three infants noted by Whitridge Williams and Dubois all exceeded Vecchi's both in weight and probably in length, although the length is not given in Rachel and Neumer's case. The above-mentioned authorities record an instance of fetal giantism specially interesting to the obstetrician, namely, Ludwig's case, where after craniotomy and amputation of the extremities he was obliged to perform Caesarean section in order to deliver a child weighing 16½ lb. It is well known that the child destined to be an adult giant is not by any means necessarily a giant at birth. But since the fate of the giant infant is almost invariably death as it is delivered into the world, we cannot determine whether—if it could have been saved by Caesarean section—it would have maintained its giantism till it reached maturity.

¹ *L'Arte Ostetrica*, quoted in *L'Obstétrique*, May, 1903.

QUACKERY IN GERMANY.

THOUGH there is probably no country in Europe where more elaborate laws exist for the control of quackery than Germany, it is a significant commentary upon the manner in which they are enforced that quacks abound and thrive. The increase in their numbers has of late been such that public sentiment has been aroused, and is loudly clamouring for more stringent measures to suppress practices that are rapidly becoming a danger to the public health and a disgrace to common decency. A man called Nardenkoetter has lately fanned the flame of public indignation by booming a "prayer-cure" which seems to have awakened the authorities to the necessity of doing something in the interest of public order for the diminution of the increasing barefacedness of quackery and its methods. They have appealed to the Medical Council, but, according to the *Koelnische Zeitung*, which in a recent issue published a strong article on the subject, that body seems as impotent as its analogue in this country to bring about or even to facilitate the reform which is so imperatively required. The law as it at present stands in Germany, despite its elaborate technicalities, seems incapable of dealing adequately with the rapid increase of faith cures and secret remedies. Dr. Fluegge, President of the Senate of the State Insurance Committee, has recently put forward proposals which are worthy of serious consideration. He is in favour of inserting into the Trade Laws a regulation prohibiting persons suspected of business methods which depend for their success upon advertisement and the abuse of public credulity from attending patients professionally. He would compel every practitioner to keep a book containing records of the persons treated, the illnesses from which they suffered, the prescriptions given for their relief, and the duration of his attendance. Such measures, if energetically carried out, would undoubtedly go far to minimize the evils of quackery under which the Fatherland is groaning, but, although they are approved by several of the German medical journals, they surely lay an unnecessary burden upon the great body of the regular profession, which carries on its daily work legitimately and within the limits of honesty and fair dealing. Such a law might reasonably be applied to non-qualified practitioners, but it would add intolerably to the restrictions, already stringent enough, under which the legitimate practitioner lives and earns his daily bread. In Germany, as in our own country, the power and influence of the quack will continue a menace to the successful practice of medicine and a danger to public health until the arm of the law can be made sufficiently powerful to suppress him summarily, and deal with him as a social excrescence which must be removed by the ordinary methods of fine or imprisonment.

THE POISON OF SEA SNAKES.

In a communication read at a recent meeting of the Royal Society on May 7th, Dr. Leonard Rogers describes his investigations into the physiological action of the poison of the *Hydrophidae*, or sea snakes, which occur in large numbers on the coasts of India, and have been specially studied at Puri, on the east coast, in Orissa. At this spot Dr. Rogers obtained his specimens. He collected their venom by making them bite on a watch glass covered with a thin layer of gutta-percha tissue stretched lightly across it, the poison being injected into the glass as clear drops free from all saliva. When dried the venom forms white scales, freely soluble in water, and differs from the cobra poison by the absence of any yellow tinge. The average quantity of dried material obtained from a single bile was slightly less than 1 centigramme, or about one twenty-fifth of the amount usually obtained from a cobra. The poison is readily destroyed by boiling for a short time, but merely bringing it to the boiling point does not materially affect its strength. The resistance of cobra poison to heat is slightly greater. The clinical symptoms produced by the two classes of poison are identical—drowsiness, muscular weakness, increased depth and frequency of respiration, progressive paralysis affecting all the muscles of the body, respiratory failure, and convulsions. In

white rats, rabbits, and birds the poison of the *Enhydrina*, one of the most dangerous of the sea snakes, is from five to twenty times as potent as that of the cobra; and for fishes fifty times as deadly. The power of dissolving the red corpuscles of the blood and reducing its coagulability, which is a very marked property of cobra venom, is not nearly so conspicuous in the poison of the *Hydrophidae*. Ordinary fatal doses of the venom of the *Enhydrina* have no appreciable haemolytic effect. As regards coagulation, Dr. Rogers finds that whereas a 1 in 200 solution of cobra venom completely abolishes coagulability, a similar solution of *Enhydrina* venom has only a very slight preventive power, the blood still clotting in five minutes. He therefore holds that the toxic properties of the latter venom cannot be attributed, even in a partial degree, to its action on the blood; and, in view of the striking similarity of the clinical symptoms produced by cobra and *Enhydrina* toxin, he regards absence of action on the blood in the case of the latter as an argument against the opinion maintained by Cunningham that cobra venom kills by its action on the blood, and in favour of the view of Lauder Brunton and Fayrer that its action is essentially through the nervous system. Owing to its marked similarity to the nerve poisons, Dr. Rogers was led to repeat with *Enhydrina* venom some of the experiments with tetanus toxin of Wassermann, who found that small amounts of tetanus toxin can be fixed by fresh nerve matter in a test tube, and so rendered inert when subsequently injected into a susceptible animal. Dr. Rogers used an emulsion of pigeons' brains, added dilute solutions of *Enhydrina* venom, and found that pigeons injected with these mixtures always lived longer than the controls, while they sometimes recovered from double, and in one instance from quadruple, minimal lethal doses. When the emulsion was made from the cerebrum the inhibitory effect was more marked than when it was made from the cerebellum or medulla. Although it is now recognized that Callmette's antivenene is not, as he claimed, a specific against all kinds of snake venom, it is undoubtedly of great value in counteracting the poison of the cobra, but, as tested on white rats, it proved not to be of the slightest use; although the animals were given enormous doses of the antivenene, they died in about the same time as the controls. The serum and bile of the *Enhydrina* itself were also tested for antidotal properties, but found to possess none. Dr. Rogers has now commenced, but has not yet had time to complete, a series of experiments with a view to immunizing animals against the *Enhydrina* poison.

ORAL TEACHING OF THE DEAF.

THE annual general meeting of the Society for Training Teachers of the Deaf and for the Diffusion of the "German" system was, by the kindness of the Bishop of London, held in the beautiful grounds of Fulham Palace on July 1st. The chair was taken by Dr. E. Symes-Thompson, Chairman of the Committee, who was supported by a large and representative gathering of the friends of the Society. The work of the Society, which is supported largely by voluntary contributions, is much hampered by lack of funds. A resolution was proposed by the Rev. L. Coxhead, and seconded by Dr. Dodsworth, urging on the Legislature the importance of the education of deaf children, and with a view to the promotion of this object the desirability of a grant from the National funds met with general approval, and was carried unanimously. Miss Champion (Natal) gave a short account of the provision made in that colony for the instruction of deaf children, and stated that the Government there came to the assistance of private enterprise in this matter. Miss Hewett, the headmistress of the Ealing Training College, then gave a most instructive demonstration of the methods adopted for teaching lip reading and speech production. Several children were given a specimen lesson, and the remarkable results which have been obtained in a comparatively short time in their case must have brought home to all who were present the great value of the system. The prizes to the successful teachers and pupils were distributed by Viscountess Melville.

THE DANIELS ETHNOGRAPHICAL EXPEDITION TO NEW GUINEA.

WE learn with satisfaction that an expedition is to start for New Guinea in August for the purpose partly of ethnographical investigation, but also with the important object of collecting data in regard to the distribution and etiology of cancer; the latter portion of the work has been officially recognized by the Cancer Commission. A grant has been made by the Royal Society towards the expenses of the expedition and the Royal Geographical Society has undertaken to lend the greater part of the instruments for the geographical investigations which are to be carried out. The expedition, which has been organized in London by Major W. Cooke Daniels, will be unusually well equipped, and a schooner with auxiliary steam power will serve as a moveable base. There will be also a sea-going launch. The members of the expedition comprise Major Daniels, Dr. C. G. Seligmann, Dr. W. Merse Strong, and Mr. A. H. Dunning. Major Daniels, who has had much tropical experience, will devote himself mainly to ethnology, in which the other members will also take part; for the experimental psychology Major Daniels has also made himself responsible. Dr. Seligmann, until recently the Superintendent of the Clinical Laboratory, St. Thomas's Hospital, is the representative of the Cancer Commission on the expedition, of which he is in general medical charge. With Dr. Strong, he will pay attention to pathological questions of a more general character. As a member of the Cambridge Anthropological Expedition organized by Dr. Haddon in 1898, Dr. Seligmann has already visited Torres Straits and New Guinea. Dr. Strong will be responsible further for the geographical and geological observations which it is part of the purpose of the expedition to carry out. The photographic work, which will include the use of the latest form of cinematograph for recording native dances and ceremonies, will be undertaken by Mr. Dunning, who will thus assist Major Daniels in his general ethnographical researches. Since practically the whole of New Guinea is still in the Stone Age, the expedition should have valuable opportunities of comparing the pathological conditions encountered with those occurring among civilized peoples.

THE ST. PETERSBURG WOMEN'S MEDICAL COLLEGE.

THE students of the Women's Medical College, St. Petersburg, appear to have risen in rebellion against the constituted authorities by way of protest against some proposed changes in the examinations. They held an indignation meeting in the Anatomy Theatre at which some 600 ladies were present. Notwithstanding the attempted intervention of the professors and the Rector a resolution was passed in the style of the Honourable Elijah Pogram defying the world and refusing to yield to anything but force. For several days lectures were discontinued. Finally 354 of the "revolting daughters" were summoned before the academic court which invited 28 of them to consider themselves expelled from the school. The students of the University showed their sympathy with the fair rebels by making hostile demonstrations against things in general, with the result that 16 have been expelled and 68 punished in various ways. The Government has closed a restaurant patronized by the students which is described in the official journal as "a focus of revolutionary agitation."

A NEW MONUMENT TO PASTEUR.

A MONUMENT to Pasteur was unveiled at Chartres on June 7th. It is especially intended as a memorial of his researches on anthrax, which have been of the greatest service to the Beauce district. The monument has this further feature of special interest that it is from the chisel of Dr. Paul Richer, Member of the Académie de Médecine, physician, anatomist and artist. Dr. Richer is a native of Chartres. At the ceremony M. Henri Roujon, Director of the Fine Art Department, represented the Government; Drs. Duclaux and Roux, the Pasteur Institute; Professor Proust, the Académie de Médecine; Professors Blanchard

and Chantemesse, the Medical Faculty; M. Nocard, the Minister of Agriculture. MM. Proust, Chantemesse and Chauveau gave an account of Pasteur's work on anthrax and its practical results. The monument, which was exhibited at the Salon des Artistes Français last year, is generally considered very successful. It consists essentially of a large bas-relief representing one of the most important experiments in the research amid the surroundings in which it was actually performed. Dr. Chamberland, to whom Pasteur entrusted the performance of those experiments, is represented with one knee on the ground getting ready to inoculate anthrax blood in a sheep brought to him by a farm labourer. Behind are shown M. Maunoury, a landowner at St. Germain-le-Gaillard, and M. Boutet, veterinary surgeon, formerly Mayor of Chartres, at whose instigation Pasteur made his research in that region. On the left Dr. Roux is making a *post-mortem* examination of a diseased sheep which had supplied the blood used in the experiment. A little further off, on the right, is seen the shepherd with his dog, and behind him his flock scattered over a plain. The scene is taken from the Saint Germain estate, and on the horizon are indicated the village of Poisvilliers, the trees along the road to Chartres, and far in the background, the great cathedral. Above the bas-relief, which is in bronze, is a bust in white marble of Pasteur encircled by symbolic oak and laurel leaves. The monument is 4 metres in height by 7 in width.

THE governing body of the Jenner Institute of Preventive Medicine have appointed Dr. J. C. Martin, F.R.S., Professor of Physiology in the University of Melbourne, Victoria, to be Director of the Institute.

At a meeting held at the house of Dr. F. T. Roberts, 102, Harley Street, W., on Monday, June 29th, Dr. G. V. Poore, F.R.C.P., was presented with a piece of plate and a testimonial from his colleagues of the Faculty of Medicine and Medical Committee, in recognition of his valuable services as Professor of Medicine at University College and as Physician to University College Hospital.

MEDICAL NOTES IN PARLIAMENT.

[FROM OUR LOBBY CORRESPONDENT.]

EXPERIMENTS ON ANIMALS.

THE Home Office vote afforded the opportunity of raising the question of experiments made under the Act of 1876.

Mr. JOHN ELLIS began the debate in a moderate speech, and laid down the three principles: (1) That the experiments made should be for a definite object; (2) that it should be conducted by a duly-qualified person; and (3) that it should be performed on approved and licensed premises. He asked for adequate and proper inspection by a reasonable man with a fairly-balanced mind, without any strongly preconceived notions for or against vivisection, and by means of surprise visits.

Sir F. BANBURY, who is in charge of the amending Bill, said he was not one of those who thought vivisection should not be practised at all, but he required great safeguards for its proper performance.

Mr. MACNEILL, who followed, spoke very strongly against vivisection, which he would abolish in every shape and form. He demanded more inspection, and said that there had been 3,261 more experiments last year than in the year before; and "an experiment" did not mean one operation, but a series of researches, often performed by persons who had no more skill than the children who broke up a watch. He wanted to impress on the British public that the Act of 1876 was a sham, and in the course of his speech he quoted many of the strong adjectives used by the antivivisectionists in their publications.

Sir MICHAEL FOSTER said he sympathized with the impulses of those who opposed vivisection, because he recognized in them the conviction that real humanity was not humanity to man only, but to all the things around us. At the same time, he resented, he thought he might say justly, the terms which were applied to the profession to which he belonged, such as "devilish," "hellish," "fiendish," "torture den," and "vivisection den." Did the Committee for a