

week since the middle of May last. During the first eleven weeks of the current quarter the death-rate in the city averaged 25.2 per 1000, against 21.2 in London and 20.1 in Edinburgh. The 224 deaths in Dublin last week showed an increase of no less than 58 upon the number in the previous week, and included 20 which were referred to the principal zymotic diseases, against 14 and 12 in the two preceding weeks. These 20 deaths included 9 which were attributed to whooping-cough, 8 to "fever" (typhus, enteric, and simple), 2 to diarrhoea, 1 to diphtheria, and not one either to small-pox, measles, or scarlet fever. The death-rate from these zymotic diseases was equal to 3.0 per 1000 in the city, while the rate from the same diseases last week was 3.0 in London and 3.6 in Edinburgh. The fatal cases of whooping-cough in Dublin, which had been 5 and 2 in the two previous weeks, rose to 9 last week, while the 8 deaths referred to "fever" were within one of the number in the previous week, and were equal to a rate more than twice as high as the average rate from this cause in the twenty-eight English towns. The deaths of infants showed a marked further increase upon recent weekly numbers, and those of elderly persons were also more numerous.

THE SERVICES.

THE Greenwich Hospital pension of £50 a year, vacant by the death of Retired Deputy Inspector-General of Hospitals and Fleets Alexander Cross on Dec. 3rd, has been awarded to Retired Deputy Inspector-General of Hospitals and Fleets Andrew Murray from that date.

ARMY MEDICAL DEPARTMENT. — Brigade Surgeon Frederick M. Skues is granted retired pay, with the honorary rank of Deputy Surgeon-General. Brigade Surgeon Sir Robert William Jackson, C.B., is granted retired pay, with the honorary rank of Deputy Surgeon-General. Surgeon John Percival Hunt, M.D., from half-pay, to be Surgeon, vice D. O'Sullivan, who has resigned his commission.

MILITIA MEDICAL DEPARTMENT. — Surgeon-Major George Wilson, Royal Devonshire Engineer Militia, resigns his commission; also is permitted to retain his rank, and to wear the prescribed uniform on his retirement.

ARTILLERY VOLUNTEERS. — 1st Sussex: Surgeon Heckstall Smith resigns his commission; also is permitted to retain his rank, and to continue to wear the uniform of the corps on his retirement. 1st Kent: Acting Surgeon William Eyre Blennerhassett Atthill resigns his appointment.

RIFLE VOLUNTEERS. — 1st Ayrshire: William Sneddon, Gent., M.D., to be Acting Surgeon. 9th Lanarkshire: Acting Surgeon James McGlade resigns his appointment. 1st Lincolnshire: Honorary Assistant Surgeon George Walker resigns his commission. 14th Lancashire: Surgeon Frederic Blakesley Mallett, M.D., is granted the honorary rank of Surgeon-Major. 1st Midlothian (Leith): James Allan Gray, Gent., to be Acting Surgeon. 22nd Middlesex (Central London Rangers): John Robert Kemp, Gent., to be Acting Surgeon. 6th West Riding of Yorkshire: John Sutcliffe, Gent., to be Acting Surgeon. 2nd East Yorkshire: D. Ridpath, M.D., to be Acting Surgeon.

ADMIRALTY. — Fleet Surgeon George William John Sutherland having been placed on the Retired List from Nov. 20th last, has been allowed to assume the rank and title of Deputy Inspector-General of Hospitals and Fleets on the Retired List from that date. In accordance with the provisions of Her Majesty's Order in Council of April 1st, 1881, Staff Surgeon Thomas Harvey has been placed on the Retired List of his rank from the 8th instant.

The following appointments have been made: — Staff Surgeon Evelyn R. H. Pollard, to the *Albatross*; Surgeons Archibald McKinlay, to the *Belleisle*; Thomas D. Gimlette, to the *Hector*.

PRESENTATION. — On the occasion of the transfer of Dr. Vans Christian Clark, R.N., from the medical officership of Millbank Prison to H.M. Prison for Female Convicts at Woking, an illuminated address was presented to him by the governor of the former establishment on behalf of the officials, who desired thereby to testify their sense of the value of the Doctor's services.

Correspondence.

"Audi alteram partem."

"THE SCOTCH UNIVERSITIES AND MEDICAL LEGISLATION."

To the Editor of THE LANCET.

SIR,—I have no pleasure in controversy with such medical teachers as Professor Struthers and Professor Gairdner. I shall therefore not prolong it. I will leave it to you and your readers, and all seriously interested in placing our medical licensing system on a better and permanent basis, to judge whether my essential statement to the Lord President does not remain entirely unshaken—that the Royal Commissioners have safeguarded the just interests of the Scottish universities by adopting the proposal of Professor Turner before the select committee, which was repealed by Professor Struthers, to exempt all university students from all but the final examination of the conjoint boards to be established, and this, Professor Struthers suggests, not to cost more than five pounds.

I have never denied that Professor Struthers, Professor Gairdner, and Professor Turner prefer to be entirely left alone, and to have the degree of universities recognised as above the sphere of public criticism, and as, *per se*, full qualifications, and entitling their holders to registration. I believe that it would be safe at present so to regard university degrees; but there have been times within easy memory when it would not have been safe, and there might easily be such times again. Universities, like corporations, are only made up of men, and, like them, again, have interests, sometimes of a pecuniary order, which are not always the interests either of the profession or of the State. It is easy to see that if some precautions are not taken in the contemplated legislation, the Scottish universities, being poorer than the English, would be under strong temptation to enter into competition with the conjoint boards, and we should have a continuance of what Sir Dominic Corrigan called a "battle of the shops," only in a more discreditable form than at present.

I am, Sir, your obedient servant,
Highbury, Dec. 18th, 1882. JAMES GREY GLOVER.

To the Editor of THE LANCET.

SIR,—In your leader of the 9th inst., speaking of the Scottish universities as opposed to the Conjoint Boards, you use the following words:—"They educate probably as many students as all the London schools put together, and their degrees, *though only qualifications in medicine*, entitle the holders to registration. A graduate is seldom content with his mere degree; he wishes to have a diploma besides, and generally takes it from a College of Surgeons. Under the proposals of the Commissioners he will, after passing his university examinations and the clinical examination of the Conjoint Board, *be completely qualified*, and have a honourable degree for a much less sum than he now most generally pays for similar advantages and multiplied examinations." The italicising is mine.

These statements are likely to convey to the minds of those unacquainted with the Scottish universities the erroneous impression that Scottish graduates are only half-qualified. I therefore beg permission to point out that all the Scottish universities themselves either teach very fully both medicine and surgery or require that candidates for their degrees shall have been equally well taught elsewhere. The degrees conferred are the Bachelorship of Medicine (M.B.), the Masterhip in Surgery (C.M.), and the Doctorate of Medicine (M.D.); and no man has been permitted to graduate even as M.B. alone unless he had passed the full examination for both M.B. and C.M. It is usual for candidates to take the two degrees. It is only a very exceptional few who, being already in possession of a diploma from some surgical corporation, take the M.B. degree alone; and candidates for this single degree are not exempted from passing any part of the full examination in

both medicine and surgery. The great body of graduates, therefore, are "doubly qualified," and do not, as you would seem to suppose, seek surgical qualification elsewhere. Now I believe it is imperative on all candidates to take both degrees. It is somewhat beside the point, but I believe I could, also, demonstrate that where the M.D. degree alone has been conferred under the regulations existing prior to 1861, it is a "double qualification"—i.e., in medicine and surgery.

I am, Sir, yours faithfully,

R. M. MOFFAT, M.D., C.M. St. And.

Manchester, 18th Dec., 1882.

* * It is quite true, as our correspondent points out, that the Scotch universities confer the title of Master in Surgery on such graduates in medicine as wish for it. When they do so they charge an additional fee for the diploma. His view of the double virtue of the degree of M.D. under the old regulations has never been acted on by graduates or by the university. On the contrary, regarding it as only a qualification in medicine, the university devised the new title of Master in Surgery, which it confers, we believe, without any additional examination. The ingenious way in which the universities have contrived to give the virtue of a double qualification to their degrees shows how hollow and artificial the system of half qualifications is.—ED. L.

DR. HENEAGE GIBBES' "NEW METHOD FOR THE DETECTION OF THE TUBERCLE BACILLUS."

To the Editor of THE LANCET.

SIR,—At a meeting of the Medical Society of London last night, Dr. Heneage Gibbs exhibited some specimens of various forms of bacteria. Amongst them were several examples of the bacillus of tubercle stained in a way which Dr. Gibbs has described as "new." In the course of some remarks which I made during the meeting, I expressed my inability to perceive anything new in the method of staining the bacillus of tubercle used by Dr. Gibbs. I also said, in effect, that in the specimens of the bacillus of tubercle then before the Society I could not see evidence of any advantage in the results obtained by Dr. Gibbs' plan of mixing the ingredients of the colouring solutions in certain definite proportions. In describing what he claims as his method, Dr. Gibbs says: "It is necessary to make two staining fluids—one, magenta, which stains the bacillus; the other, chrysoidin, which stains the surrounding substance, but not the bacillus."¹ Now, on reading this, it certainly appears as though in using magenta Dr. Gibbs has introduced a new dye for the purpose of staining the bacillus. As is well known to those who are familiar with the subject, Dr. Ehrlich uses fuchsin for that purpose. I had always been under the impression that fuchsin and magenta were different names for the same substance. When Dr. Gibbs described his "new" method and spoke about magenta, I thought that I must have been in error, and that fuchsin and magenta were names for two different substances. On looking up the literature of the subject, however, I found that these two names are given to one and the same substance. In order to put the point beyond dispute, as regards the use of the dye in the staining of this particular bacillus, I called upon Mr. Beck, the manager of the Badesche Anilin Fabrik, 22, Bush-lane, Cannon-street, E.C. I called upon him because Dr. Gibbs says that the aniline colours are made by that company. Mr. Beck, in answer to my questions, told me that fuchsin and magenta are names given to one substance. He said that if he received an order for magenta he would supply the same substance which he would supply were an order given for fuchsin. Fuchsin, he said, is the name used on the Continent; magenta is the name in use in England. I was also told that the substance supplied by Mr. Beck to Dr. Gibbs was known in the trade by the two names, fuchsin and magenta. Mr. Beck said that Drs. Koch and Ehrlich used this same dye in their experiments. In April last Dr. Ehrlich used fuchsin to stain the bacillus of tubercle, and

my friend Dr. Koch, the discoverer of the bacillus, described to me in a letter last May the details of Ehrlich's use of fuchsin in this connexion. So much, then, for Dr. Gibbs' stain for the bacillus in his "new" method.

It is not necessary for me to say anything here about Dr. Gibbs' use of chrysoidin in his "new" method, for last night he himself informed the Medical Society that he had given up the use of that substance in staining tubercular tissue and sputum, although, he says, he still regards chrysoidin as most useful when the object in view is merely to examine the bacillus. In saying this I, of course, speak from memory; but that was the sense in which I understood what fell from Dr. Gibbs upon this point.

Having given up the use of chrysoidin for the purpose of staining "the surrounding substance, but not the bacillus," Dr. Gibbs has substituted methylene blue for it, as was seen in his specimens last night. In the *British Medical Journal* of Oct. 21st last, on page 787, under the heading, "Further Remarks on Staining Bacillus Tuberculosis," Dr. Gibbs writes: "I have made a number of experiments with the view of finding a good contrast to the magenta, and one which would not at the same time stain the surrounding tissues too deeply. I find methylene blue the best for this purpose." Now, at my demonstration at Worcester, in August last (and Dr. Gibbs was present), I pointed out that Ehrlich used methylene blue as a contrast colour to his red-stained bacilli.² The fact was also well known to several men who were then working at Ehrlich's process, and it was mentioned to me by Dr. Koch in May last.

Where, then, is the newness in Dr. Gibbs' "new" method? I suppose it is meant to be found in the statement which he makes on page 787 of the *British Medical Journal* of Oct. 21st, where he says, "There are one or two points about this method which I should like to mention. In the first place, the magenta solution used is a definite chemical compound having a distinct formula; it is, in fact, a diphenolrosanilin resulting from the addition of a fixed portion of pure anilin to a certain form of rosanilin, or, as it is commonly called, magenta. In Ehrlich's method, a definite compound is not formed, hence the fading of the colour from the bacilli, which does not take place when a stable compound is used. In his process, also, the protoplasm alone is stained, and with high powers rows of bead-like bodies only are seen. With the method I have given, the whole organism is stained, and appears, as it really is, a rod-shaped bacillus containing deeply stained spherical bodies (? spores)." I do not know whether a diphenolrosanilin results; but let that be taken for granted. Of the rest of this statement, in so far as it refers to Ehrlich's process, I can only say that it is altogether at variance with my own experience. I have not yet seen a specimen of bacilli produced by that process in which "with high powers rows of bead-like bodies only are seen." On the contrary, the vast majority of the organisms appear as distinct rods.

Dr. Gibbs asserts that with his "new" method the colour does not fade from the stained bacillus, and that it does fade where Ehrlich's process has been used. It is true that when men first worked at this process the stained bacilli did, now and then, lose their colour. In my own early experience that has happened more than once. It is different now. Ehrlich's process, properly carried out, gives quite as good results as any yet shown by Dr. Gibbs. As an illustration I may mention that I have now in my possession specimens which I stained by Ehrlich's process in June last for exhibition at the *conversazione* at the Royal College of Physicians. They have faded certainly, as all aniline colours will, but the organisms are still perfectly distinct. As M. Vignal of Paris remarked in writing upon this subject, "When the chemicals are not good, the colour fades with equal rapidity, whether Gibbs' modification be adopted or not."

Dr. Gibbs also claims for his "new" method that by its use the bacillus can be shown "with the greatest ease with an ordinary quarter-inch object glass and daylight." According to him, where Ehrlich's process is used the bacillus is so faintly stained "that high power or artificial illumination is required to show it in anything like a satisfactory manner." This is another example of Dr. Gibbs' surprising statements. My friend, Mr. Watson Cheyne, showed the bacillus, prepared by Ehrlich's process, in May last at the Royal Medical and Chirurgical Society, under a quarter-inch object glass. I have myself repeatedly examined

¹ *British Medical Journal*, Oct. 14th, 1882, p. 736.

² *British Medical Journal*, Oct. 14th, 1882, page 735.