into a handsome total—handsome for those who have to receive the fees or inflict the persecution, not so pleasant for those who have to pay the one and bear the other.

To sum up my objections to the swearing system. Over and above

its mere inutility :—

1st. It establishes a double standard of veracity, and thereby weakens the general sense of the sacredness of this virtue in ordinary cases, i.e., where no oath is taken, and thus by demoralizing society, acts prejudically even on the evidence which is given in courts of law.

and. It creates a practical impunity for false witnesses, by throwing off the responsibility of punishing them from a human to a divine tribunal. Thereby it calls into existence a vast amount of false evidence and trumped up actions and defences, that otherwise would

not be attempted.

3rd. It diminishes with the average run of jurymen and with imbecile or careless judges, the sense of the necessity or vigilance as to the value and intrinsic probability of the evidence adduced. If an allegation be sworn to, the timid feel they have no right to question The lazy or incompetent shelter themselves behind the oath from the obligation of tracking home the falsehoods. It helps a corrupt judge to pretend a belief in what he knows to be false.

4th. It aggravates the expense, and delay, and difficulty of lawsuits, thereby making justice in many cases unattainable, and inducing men to submit to the most flagrant wrongs rather than run the risk of looking for their rights, or defending themselves from

unscrupulous, malicious, or mercenary attacks.

For these reasons I think this sacred cow of the legal Brahmins ought to be led to the shambles at the first opportunity.

IV.—Consolidation of Sanitary and Medico-legal Offices, and Abolition of Coroners' Courts. By E. D. Mapother, M.D.

[Read, Tuesday, 12th May, 1868]

I PROPOSE to comment very briefly on the provisions made by the State for the prevention of disease, the collection of mortuary statistics, and for the conduct of medico-legal enquiries. They seem to me to be less perfectly organized and less successful than those

of many continental and American states.

The local officer to whom sanitary inspection is entrusted is the officer of health under the Towns Act, 1847. In England there are Q2 such officers in the provinces, and 48 in the metropolis under a special act. The areas and populations vary from over half-a-million at Liverpool to a village of 214 people, and the salaries from £1,000 at that great town to nil in many districts. It is, however, the central department which is of real advantage in England There is a medical officer of the Privy Council to advise that body, over which at present presides so earnest and well-informed a sanitarian as

Lord Robert Montagu. The medical officer has several medical and engineering assistants, who on the outbreak of an epidemic, or striking increase of death-rate, investigate and remedy the local circumstances which lead to them Mr. Simon's nine annual reports contain an invaluable record of samitary work in England.

In Ireland only two towns, Dublin and Londonderry, have appointed health officers. In all other towns there is no qualified person responsible for the prevention of disease, nor is there any central authority, for the Poor Law Commission has to do with sanitary matters in rural districts only. Our townspeople may therefore suffer the evils which bad or deficient sewerage, polluted water, overcrowded graveyards, or unheeded nuisances inflict, and yet there is no competent authority to expose and compel the removal of these evils. The Public Health Act, 1866, undoubtedly gives power to abate the causes of disease, but it is merely permissive, and by no means clear or well-arranged, and the same may be said of many other sanitary and medical statutes.

The registration of deaths in England is much more accurate than in Ireland, because of the penalty of £10 on undertakers, clergymen, and others concerned in the burial of a body, unless the cause of death has been testified by the medical attendant, or to the coroner. Medical aid is thus secured for infants and infirm persons who might be neglected if burial without registration was possible. In the Irish Act of 1863 no such provision was made, and hence the confessedly worthless returns. About two years ago our President, Mr. Justice O'Hagan, on the authority of the registration department, stated that over one-third of the deaths were not recorded; and the Irish Registrar-General, in a recent report, returns eight districts as being under 10 per cent. per annum, or about half the inevitable death rate. Yet, even in England through neglect of the non-medical registrars, 17 per cent. of the causes of deaths are not certified, and causes are often assigned of which the practitioner who signs the certificate has no knowledge. Thus, in a populous town in England with which I am acquainted, the chief practitioner employs as an assistant a person whom about two years ago he hired as his groom, and who has never been since out of this town, to attend medical lec-This assistant attends all the poorer patients, and the practitioner signs the certificates of causes of death of persons whom neither he nor any qualified practitioner has seen. Another case was lately exposed, in which a practitioner left, during a three weeks' absence, signed tickets to be filled in by an unqualified person. The certificate of death has for such reasons no weight, and neither the Chancellor nor the Bank of England will receive it. The certificate of the cause of death should be sent direct to the Registrar, as it may be destroyed if it reveals any unpleasant fact, and the medical attendant may be dismissed for his candour.

The present medical certificate, which, though not a compulsory document, practitioners desire to fill for statistical ends, testifies to a fact which the medical man has rarely positive knowledge of—namely, the time of death. Indeed instances have occurred in

Dublin in which certificates of death were obtained from medical attendants in apparently hopeless cases, for the purpose of obtaining burial money and policies, when the individuals were afterwards proved to be living. Certificates should only be given "super usum corporis," and for false returns the medical man might be held accountable. The form has no space for the previous residence of those who die in public institutions, nor for the employment, and thus important sanitary and statistical data are omitted, and in the Irish certificate there is no note taken of the preceding disease. The registration of the birth of still-born children seems desirable, in view of the increasing crimes of infanticide and concealment of birth.

County coroners in England and Ireland are elected by parliamentary voters, in the latter country the poll continuing two days, a mode which was adopted when the office was as dignified as that of sheriff, but many duties and emoluments having been taken away, its importance is much lessened. The expenses of contested elections often exceed the value of many years' receipts; and the subsequent litigation of that lately held at Middlesex will surely do so. The choice of officers of justice should never be made in such a way, as the degraded state of the office of judge in the United States proves. In boroughs the town council appoint the coroners, and in Scotland the analogous officer, or procurator-fiscal, is usually a skilled solici-The medical and legal journals often join issue as to the respective eligibility of their clients for this position, but if the comprehensive office which I advocate was established, many or all of the present medical coroners would be suitable for these appointments, and coronerships might be abolished, the judicial duties being discharged by the stipendiary magistrates and constabulary officers. X

The imperfect investigations conducted in coroners' courts have been exposed by Professor Taylor. In "The Queen versus Hopley." an inquest was held over two days, but no inspection of the body was made. The verdict was "disease of the heart" Some suspicion arising, the body was exhumed, and it was found that death was caused by violence, the thigh being severely crushed. person who committed the murder was tried and convicted. The following instance occurred in the county of Roscommon a few years ago. The neighbours were summoned by the wife and sister-in-law of a farmer to view his dead body, the throat being cut and a bloody razor placed alongside. At the inquest no medical evidence was called for, and "suicide" was the verdict. A month after, the servant girl swore that while the man was asleep, the wife and her sister had smothered him with a bed, and had inflicted the wound on the dead body. On exhumation the wound was found to be very slight—no large vessel having been divided. The women were convicted and executed, having on the scaffold confessed to the murder. If the servant maid had remained silent, the heinous crime

^{*} July 22nd The Committee on Grand Jury Presentments has advised that coroners should be appointed by the Grand Jury or Magistracy, the salary being fixed by average of previous years. The Chairman (The O'Connor Don) recommended that the duties of coroners should be performed by the Stipendiary Magistrates, or by two Justices of the Peace.

would never have been suspected. Many other recent instances of erroneous and imperfect enquiries might be adduced. The expense of medical evidence, and of post mortem examinations, often cause them to be dispensed with; in New York they are indispensable. As it is optional with coroners to hold inquests or not, the profitable number may often be a weighty consideration with them, and there is no authority in the State to which they can be said to be respon-Very incompetent persons are often chosen to give medical evidence on account of friendship or such motives; and it is said by Dr. Rumsey, that in England such difficult and capitally important investigations as the detection of poison are sometimes entrusted to persons quite unskilled in chemistry. It was for such reasons that Dr. Lankester advocated the appointment of special medical assessors, whose duties would be analogous to those performed for fourteen years by Dr. George Porter by consent of the Dublin coroners. The arrangement was reliable, as the skilled and trained witness readily ascertained the cause of death, and crime was not likely to escape detection. Practitioners who see a few coroners' cases cannot be expected to possess the necessary scientific and forensic knowledge; and many of the ablest physicians do not keep up that familiarity with the healthy and diseased appearances of the human body which is usually required to determine the cause of death.

In all large Scotch towns there is a police surgeon, and he is required to see every body which has met with sudden death—another practitioner being called in if a post mortem is necessary. This seems a good arrangement, and works well in the detection of crime. In England the coroners were paid a guinea and a half for every case, and the salaries have been arranged at that rate; in some districts the office is worth many hundreds yearly. In Ireland borough coroners are paid one and a half guineas for 86 cases, and county coroners for 67. Sixpence per mile travelled to the place is likewise allowed. Surely payment by defined salary as in England, would be far preferable. At a general meeting of coroners, held last February, a minimun salary of £100 was demanded; which is not likely to be granted in Drumahair district in Leitrim, for instance, where five inquests were held in 1866, the emolument from which would be now £7 108.

Medical evidence in law courts upon hygienic, pathological, or psychological questions is every day losing weight, mainly because witnesses range on both sides to debate technicalities, or advance opinions which even the judge cannot estimate. If the medical witness were a mere relater of facts no error could arise; but as without hearing the whole evidence he is often pressed for an opinion, no certainty of just conclusion is provided. Again, medical men are retained to prompt counsel in cross-examination, and assuming the position of an advocate, strive to break down their medical brethren. This proceeding is often rendered ludicrous by the misconceptions and mispronunciations of medical terms by the counsel thus coached up. It must be acknowledged, also, that in cases of railway accident, practitioners will be found to give certificates and make assertions in the witness-box which can scarcely be said to be founded

on honest conviction. Such trafficking in testimony disgraces our calling. The railway regulation bill just carried through the House of Lords by the Duke of Richmond, contains the following admirable clause, which, if passed, will give for the first time to a judge the power to aid himself with the special knowledge of an independent medical man.

"18. Whenever any person injured by an accident on a railway claims compensation on account of the injury, any judge of the court in which proceedings to recover such compensation are taken, or any person who by consent of the parties or otherwise has power to fix the amount of compensation, may order that the person injured be examined by some duly qualified medical practitioner, named in the order, and not being a witness on either side, and may make such order with respect to the cost of such examination as he may think fit."

This provision will, however, be useless, unless there be available in assize towns well-trained medical assessors. In the Admiralty Court the judge is aided by nautical assessors, and in the same way able chemists and medical jurists, whose only desire would be the elucidation of the truth, should be employed; and, considering the injustice now perpetrated, expense would be saved. These officers might be specially appointed by the judges in common; or indeed the medical supervisors just now to be proposed might perform these While the assessor would, through the judge, put pertinent questions to the witnesses, he would have to submit himself to examination by the counsel for both sides when he had recorded his opinion in writing. The appointment of assessors has been recommended by the Law Amendment Society, the Social Science Association, the British Medical Association, and some of the most eminent jurisconsults It is very needful also in actions for malpractice that independent medical assessors should try the justice of the action. To have uninformed persons decide such cases is against the principle of English liberty that one should be tried by his peers.

Medical witnesses at present sometimes go unpaid if they do not bargain beforehand, and if they refuse evidence they are hable to action if the suit be lost by their default. Reference to precedents and authorities should be permitted to the assessor, which is often denied at present to the medical skilled witness, on the senseless

plea that the author quoted from is not sworn!

If it appears from the foregoing that the registration, sanitary, and medico-legal functions of the State are imperfectly performed, the following proposal for the concentration of these functions in one officer should be dispassionately considered by the Government and all those concerned. The following changes would be in the first instance needed: 1. Superintendence of birth and death registration should be transferred to the new officers, the clerks of unions being fitly compensated. 2. The office of coroner should be subdivided, its legal function transferred to the stipendiary magistracy, or constabulary officers, either without juries, as in Scotland, or with them; and those coroners who are medical men would be eligible for the new office of Medical Supervisor. In districts where the coroners were not medical men, their office might be continued dur-

ing their lifetime, if the Treasury would be unwilling to grant compensation on the average emoluments for seven previous years

There are at present 93 coroners in Ireland, of whom 18, or less than one-fifth, are medical. In England, out of 331 coroners, 63 are medical men, 57 have no profession, and the remainder are attorneys. The new office may be discussed under the following heads:

TERM.—"City or County Medical Supervisor" would be comprehensive and distinctive, but perhaps the term City or County Physician, a title under which duties somewhat analogous to those about to be proposed are fulfilled in America, would be more intelligible. The "circuit physician" and "proto-medicus," under the Prussian and Austrian governments are analogous.

The appointment might be made by the local authority (that is town council or Poor Law guardians), or by those of neighbouring districts, nominating three candidates, between whom the Chief Secretary, with the advice of the Privy Council Physician, might decide. As fitness and not creed, party, or favor with the powerful should qualify, the office should not be at the disposal of either authority; and it is just the place which a competitive contest should decide.

DISTRICT.—In Ireland 93 coroners are found sufficient, and a lesser number of medical supervisors would be required. One only might be appointed for the large cities of Dublin (pop. 254,808), Belfast (pop. 123,479), and Cork (pop. 93,389), and for the smaller counties, such as Louth (90,713), and Longford (71,694), and two or three for the largest counties. The districts should be made conterminous with those of other administrative departments.

The following would be his duties:—(i.) To act as superintendent registrar—that is, to receive and classify the returns from the Registrars of Deaths, Births, and Marriages, and to examine into every death the cause of which was not certified within 36 hours after its occurrence. The "Medicins des Mortes" in Paris fulfil a similar function.

- (2.) In case the cause of death was not natural, he should give evidence before the magistrate or constabulary officer who was appointed to discharge the judicial duties heretofore assigned to the coroner. In this way secret murders and deaths of infants and old people by neglect would not escape detection. Under his supervision published returns might be made out more in detail; thus, instead of 7 dispensary death-rates in Dublin, 14 might be made known, or the returns from tenements and dwellings below £10 yearly value and those from fashionable mansions might be distinguished. Death-returns, combining the mortality in the neighbourhoods of Fitzwilliam-square and of Townsend-street, can give no reliable data for sanitary reform; nor those which group the deaths in provincial towns with those of many square miles of the country around. With the aid of the proposed officers, a census might be made triennially—that taken every ten years in this land of emigration is worthless.
- (3.) To act as medical officer of health, especially making himself familiar with the natural, social, and sanitary characteristics of his

district. Food and drug analyses to check adulteration, might be also undertaken by him, as well as the inspection of chemical factories. He could also give aid in the detection and prosecution of quacks. The visiting of ships near ports, for the purpose of ascertaining the presence of infectious diseases, is usually paid for by a half guinea fee by local authorities, and a fee of one guinea is charged for signing bilts of health for ships leaving the port. In important ports, such as Southampton, he could act with advantage as officer under the quarantine laws, or inspector of seamen and ship stores under the Shipping Act, 1867.

(4.) To act as witnesses at all enquires into the causes of death, and as experts or medical assessors to the chairmen at quarter sessions and the judges at assize, in the way I have before described. Inquests in England average 22,000, and trials for "offences against the person," 1,200 yearly, so that these duties are very important. A zealous and able man night add much to medical science by the opportunities of making post mortem examinations which would be thus available. These should be conducted in the dead houses of hospitals where students would profit, and not in public houses or livery stables which at present are usually the coroners' courts.

(5.) To act as burnal inspectors — The injurious effects of intramural burial became so notorious by the reports of the Board of Health in England, that Mr. Grainger, the eminent physiologist, and Dr. Holland, a well known sanitary inquirer, were appointed as inspectors under the Home Office, to examine into the state of existing graveyards and into the suitability of proposed sites for new ones. As a result of their labours, over 4,000 churchyards which from their proximity to dwellings and water sources were most pernicious. have been closed or regulated, and no new ones which were not advantageously placed with regard to access, soil, and prevailing winds have been sanctioned. A million and a half has been spent during the past fifteen years in establishing new cemeteries. A Scotch Act gives power to any two members of a parochial board, or ten ratepayers, to demand sanitary investigation of any burial ground. In Ireland many graveyards are within towns, over-crowded and not decently arranged or protected, and some of them have been shown to pollute neighbouring wells; yet no systematic inquiry has taken place, and the only legal remedy is by an expensive application to the Privy Council, where medical witnesses may contest—none of those who are to decide having medical or hygienic knowledge.

(6.) To act as factory certifying surgeons.—The Factory Commissioners of 1833 proved that much mortality and many diseases and deformities specific to this kind of labour, were owing to want of regulation of these establishments. Inspectors (of whom Dr. Baker was the most zealous and able) were appointed, and now, although the number of workers has doubled, peculiar unhealthiness has disappeared. Under the Factory Acts, inspectors may appoint certifying surgeons who, for a certain fee, shall certify as to the age and health of persons about to be employed as operatives, and shall inquire into the cause of accidents in factories. The district physician should also be the inspector under the new Workshops' Regulation

Act, which if fully carried out will be productive of great and widely spread benefit. The Children's Employment Commission, of which Dr. Grainger was an active member, collected much information to show that many trades, carried on both in workshops and the workers' homes, especially in Ireland, required regulation analogous

to that provided by the Factory Acts.

The City or County Physician should be debarred from private practice, so as never to be the rival of the local practitioner, but his friendly adviser, who would relieve him of many unpleasant duties and responsibilities, without ever taking advantage of the introductions which his public duties would confer. Besides, the constant claims of private practice would call him away from the punctual discharge of his public duties, and if dependent on the favour of patients, it requires much self-denial to take the place of complainant against them in sanitary cases. On the contrary, connexion with the hospital or scientific departments of a medical school in a large city would be useful in keeping him au courant with the progress of his science, and he might fill the office of visiting Physician to the District Lunatic Asylum, as the duties are only occasional, or still more readily act as Chancellor's visitor to lunatics.

OTHER EMPLOYMENTS.—He would be probably employed as medical referee to assurance companies, as being the most highly informed and reliable officer in the district, who would neither injure the company or the insurer by a careless examination. His statistical habits would induce him to note cases, which in life insurance is most important, as will be acknowledged by all who have been called into court in these cases. He should be the referee under Gladstone's Assurance and Annuity Act; but to judge from the

success of that measure it would not be a profitable post.

As TO EDUCATION.—Forall new appointments special and full study of hygiene, or the application of the laws of natural philosophy, chemistry, physiology (including the use of the microscope), pathology (including vital statistics), and of mental disease, should be insisted on. It is to be regretted that these studies are not adopted by medical men generally, as by means of social science reports, parliamentary blue books, and the abstracts of them which newspapers publish, the public will become better informed and more interested in these subjects. It may happen that for want of special acquirements, the most successful practitioner of the district would not be best fitted for such scientific duties. After a certain date none should be appointed to the office save those who by special education and examination had proved their aptitude. The Royal College of Surgeons in Ireland anticipated any other institution in the United Kingdom by twenty years in the foundation of a chair of Hygiene.

As the State is always far less liberal to the medical than to other professions, I propose a low rate of remuneration. For obvious reasons, payment by a fixed sum would be greatly to be preferred. What would judges or county chairmen say if it were proposed to pay them by cases? The rate of £100 yearly for every 50,000 inhabitants of the district would be reasonable, travelling expenses being

of course allowed. This would be less than id. per head yearly. The combined fees in each case of coroner (one and a-half guinea), medical witness (one guinea for evidence, two guineas for post mortem, and averaging 20 guineas for analyses, two guineas per day if summoned), and two pence per entry as superintendent registrar, would probably average this rate, so that the sanitary and medico-legal duties, now so neglected, would be performed without increased cost to the community. When the pauperizing tendency of deaths among the remunerative members of society by preventible disease, and the cost of their interment is calculated, expenses towards checking disease are really economical. The decisions of a competent medical assessor would prevent much costly litigation. Many thousands yearly are spent in England in salaries of Burial, Chemical, Factory, and other medical inspectors. Insurance fees and hospital or professorial duties in cities would considerably increase the emoluments.

These offices would likewise constitute a co-ordinated machinery for the scientific study of epidemics among men and animals. The invaluable observations, as regards the nature and prevention of zymotics, which medical men commissioned to study the cattle plague recorded, should have stimulated the government to a liberal encouragement of such investigations. Yet, after having granted many thousands of pounds for the study of the cattle plague, not as many hundreds were apportioned for the investigation of cholera, although we were on the threshold of the discovery of the cause of

that pestilence.

If a central government department of health were established, or a Privy Council medical adviser for each of the three kingdoms, all those important statistical, topographical, and meteorological facts which concern the well-being of the nation should be collected from the medical supervisors and yearly published, and if a laboratory and chemical assistant were given to each of these medical advisers, such important questions as the detection of poisons, or analysis of water supply, might be reliably and economically conducted. The increased chances of the detection of crime would be a powerful deterrent. I was about to venture on some suggestions for a Bill to enact the changes I have urged, but as there are acts by the score bearing on the subject, and as full enquiry is needed beforehand, I prefer to join with the British Medical Association in calling for a royal commission to investigate the manner in which sanitary and medico-legal functions are discharged in this and other countries.

V.—Marriage Settlements; their Social and Economic Effects. By James MacDonnell, Esq., Barrister-at-Law.

[Read, Tuesday, 26th May, 1868.]

In the upper and middle ranks of society in this country the custom of settling estates is so common, that one seldom meets a person who is the absolute owner of all the property from which his income is