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THE
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Original Communications.

ADDRESS OF THE PRESIDENT OF THE ONTARIO
MEDICAL ASSOCIATION.*

By R. W. BRUCE SMITH, M.D.,

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CONFORMITY with the custom that attaches to the position which, by your partiality, I have held during the past year makes it requisite that I should address you on this occasion. If I were to consult my own wishes, I would not consume any of your valuable time. I cannot, however, disregard the usage that is coeval with the existence of such an organization, composed of medical men from every portion of our fair province.

My first impulse is to express to the association the high appreciation I feel for the honor conferred upon me in being selected to preside over this meeting. I can only repeat the statement that I made at the time of my installation in this position last year, namely, that I realized that the honor was intended more particularly for the part of the rural section of

*Delivered at the meeting held in Toronto, June, 1895.

which I was then a resident than as a recognition of any service I had rendered in promoting the interests of the association. Although I have very frequently, during the year, wished that some one more richly endowed with the wisdom which more advanced age and experience confers had been chosen, I can assure you that the many evidences of confidence and acts of courtesy I have received in the discharge of my pleasant duties will long remain a precious memory. As one of the youngest ever chosen to fill this position, I have continually felt the necessity for guidance and dependence upon those whose more mature years and professional experience so well qualified them to advise and direct. To those who have so generously assisted me in the discharge of my duties my sincere thanks are most heartily tendered. The work necessary in preparation for such a meeting as this is full of interest and instruction. It has, necessarily, given me a broader and clearer insight into the forces and motives which underlie our professional work, and I have been more impressed than ever with the strength and importance of the Ontario Medical Association, and the important place it holds in maintaining the present standing and determining the future development of the medical profession in this province. The interest which has been manifested in every meeting of the association since its formation is convincing evidence of the fact that the worth of such an organization is appreciated. Our annual meetings have fostered the devotion to scientific investigation and engendered a mutual respect and good feeling among the members. The bill of fare set before you at this meeting reflects great credit on the committee, whose members have been untiring in their efforts to provide a programme at least equal to any other in the history of the association. The special committee in charge of the arrangements has, as its report indicates, left nothing to be desired. My grateful appreciation of the labors of these workers cannot be adequately expressed.

Many of those who have preceded me in this position have, in their annual addresses, been called upon to pay a tribute of respect to the memory of some past president of the association. It is a melancholy fact that many of those who have been honored with this office have ceased from their labors and are at rest. He who two years ago presided, with characteristic grace, over the deliberations of this association is missing from our gathering to-day. I refer to the late Dr. R. W. Hillary, of Aurora, who died in October last. Known, as the deceased was, to many members of our association as a worthy and upright man, and an honor to the ranks of the profession he adorned, no words of mine are needed to add lustre to his memory.

In the early years of this association, when much of its future success depended upon the foundation upon which the organization rested, we

were favored with the services of a most energetic secretary, whose zeal might be described as almost boundless. The name of Dr. J. E. White will not soon be forgotten, as one to whose earnestness for the welfare of this association much of its present strength is indebted. His very sudden death, a few months ago, was deeply regretted by the large circle of friends his geniality had won for him.

The influence which is exerted by such a meeting as this is manifold. To the profession at large it gives unmistakable evidence of an ever-increasing interest in everything pertaining to scientific progress, and such a gathering never fails to exercise an important influence on the elevation of professional character, as well as on the advancement of professional attainments. Much of the charm of these meetings is the prospect of greeting those we have known before. One of the important functions of this association, while discussing the products of experience in the great fields of surgery and medicine, is to prove a meeting place where friend meets friend, and, if necessary, buries the asperities which, through no fault of his own, may have interfered with their cordiality. It is only a few years ago since the lives of doctors were all much the same, and the development of their ideas, feelings, and sentiments took place through much the same environment and experience, and, in failure or success, they came in contact with the world at large through much the same points of contact. The change has been, particularly in Canada, very gradual; but now many doctors lead most different lives, and are developed under the most diverse and different conditions. The specialist, in his well-appointed office, with his definite time for labor, and his hours of undisturbed rest, to be employed as his tastes and inclinations may direct, can hardly enter into the feelings of those who hold themselves in readiness to answer a summons at any hour of the twenty-four. The laryngologist, his life spent in a darkened room, his vision limited to the length of his reflecting mirror and his view confined to the illuminated spot, resembling in size the gold piece which will be the reward of his skill and dexterity, is not likely, as time goes on, to fully understand the trials and triumphs of the man in general practice, who passes from stone front to shanty, from alley to suburb, through mud and snow, and who is likely to turn, without a moment's notice, from measles and whooping-cough to gout and broken bones. It must not be forgotten that both are doctors, doing their work within the limits which personal preference or chance may have thrown them. This entire difference of condition and surroundings must surely have its effect upon the feelings and sentiments and character of the future man of medicine—and there will be doctors and doctors. The professional character of to-day finds that its feelings and its sentiments have been largely developed under the old-time similarity of

work, and there is already indisputable evidence that the present phase of professional life finds itself somewhat ill at ease with many of the ideas and customs of the old *régime*. It is for such a gathering as this to bind together all the diversifying elements and combine in our programme all the phases of professional work. We come together once a year to see each other, to hear each other, and to know each other in our different lines of work, and to become familiar with that personal tone and character which can only be done by personal contact. The Ontario Medical Association, established, as it was, fourteen years ago, for the cultivation of the science of medicine and surgery, the advancement of the character and honor of the medical profession, and the promotion of unity and harmony among its members, has enjoyed a most successful career, and the gathering to-day may be taken as a pleasing augury for increasing prosperity. It has outgrown its infancy, and entered upon adolescence with bright expectations of vigorous maturity.

The temple of medicine is constructed with slow and calm deliberation, and many stones laid in the first flush of a fancied new discovery have had to be rejected when thoroughly tested by subsequent clinical experience. Time and experience are alone able to demonstrate the soundness or frailty of our workmanship. What is characteristic of these modern days, so far as medicine is concerned, is the high place we assign to the study of the origin of disease. Of one thing we may be sure, and that is that we are learning that it is better to avoid the causes of disease than to remove their effects, and that good hygiene is preferable to therapeutics. We must be chary, however, of going to an extreme likely to encourage skepticism. The antidotal treatment of fevers now receives more attention than is paid to the so-called antipyretic nostrums, many of which, on account of their heart-depressing effects, have been relegated to obscurity. During the past year the question of serum-therapy has become of such transcendent importance that some predict we are now on the threshold of one of the most beneficent discoveries since Jenner's immortal victory. From the introduction of the germ theory, associated with the names of Lister, Tyndall, and Pasteur, names familiar wherever the rays of modern civilization have penetrated, has come the science of bacteriology. From this study of microbic pathology modern medicine is evolving what at present promises to be one of her supreme triumphs. Never in the history of medicine was there such hopefulness that, in the light now breaking, there may be seen the sure and certain pathway by which immunity from the so-called zymotic diseases may be achieved. If serum-therapy demonstrates its usefulness in this way, it will justly be regarded as one of the most brilliant triumphs of the genius of man. True, we cannot always be certain whether the light on the horizon is the sign of dawn, or merely a "Will-o'-the-wisp" to lead us into realms of still greater

uncertainty. The clearer light which we are now looking for with hopeful expectancy will, perchance, scatter the shadows which other heralded panaceas have created.

The influence on the nervous system from the administration of desiccated thyroid glands has, during the past year, led to some very interesting observations on the effect of thyroid feeding in some forms of insanity. Some very instructive cases have been published by Bruce, of Edinburgh, in which some of the results have been as gratifying as they have been astonishing. The effect in some of the cases has kindled a hope that we may be about to see the fulfilment of the result anticipated and expressed by Clouston, when he said: "I think we shall some day be able to inoculate a septic poison and get a safe and manageable counter-irritant and fever, and so get the 'alterative' effect of such things, and the reaction and stimulus to nutrition that follows febrile attacks." Certainly, psychological literature is full of the records of cases which made good recoveries after suffering from exanthemata, carbuncles, erysipelas, and inflammations generally. If the effects of thyroid feeding prove of lasting benefit, there is certainly an excellent field in which to prove its usefulness.

Professional interest has recently been considerably awakened in the subject of auto-intoxication. Putrefactive processes in the intestinal canal and the development of physiological and pathological alkaloids play an important part in many diseased processes until lately unknown or misunderstood. The pathological chemist has vied with the bacteriologist in demonstrating to us the efficacy of intestinal antiseptics.

In the field of surgery the growth and development of the science of bacteriology has practically worked such a revolution that to-day no young practitioner is regarded as thoroughly equipped for surgical work who is not something of an expert bacteriologist. Surgical pathology was never more zealously or successfully cultivated. Therapeutic surgery is, along the line of antiseptics, making rapid advancement, and rendering more sure the work of the knife. Operative surgery is adding one brilliant success to another, and commands the admiration of the world to a degree never before attained.

Perhaps none too soon are we able to detect, as we most assuredly are, the strong conservatism in the surgery of the female pelvic organs. Man's pelvic extremity is now perhaps in greater danger than woman's. It remains to be seen whether recent suggestions for the cure of the enlarged prostate will prove as successful in results as they now appear heroic. Brain surgery is claiming large attention, and a degree of progress is being attained which is, year by year, adding to the triumphs of the art. In whatever direction the surgeon may look to-day the prospect is gratifying, and, with due regard to the caution gleaned from experience, he may justly be animated to strive for still wider achievements.

The relation which medical men bear to the community, and the special nature of their life-work, is, I believe, becoming better understood and esteemed by the public. There is now every reason, founded on unmistakable evidence, for believing that greater interest is manifested by the laity in medical work, and in some instances in Canada we have seen tangible expression of that feeling displayed in donations for the furtherance of bacteriological research. Such instances show that the public does not altogether lose sight of the efforts made to remove or avoid the causes of disease by endeavoring to understand their origin. "Immunity from disease" is a theme for which the public has ever an attentive ear. We must not grow weary in well-doing, but remember that our first and paramount duty is to teach man to know himself—teach him all the laws of health, and set before him the consequences that are sure to follow their violation. Teach him what we now are certainly assured of regarding the hereditary nature of disease, and exhort him to avoid everything likely to encourage premature decay either to himself or his offspring. Let us be captains and generals—take the position of guides and directors. Point out the way to health and happiness, and urge man to walk therein. Teach man, if he is a moral leper, his body will be leprous; if he is a glutton, his earthly house will be filled with refuse and become unhealthy and decay early; if he is a libertine and sensualist, that his unholy indulgences will surely show in a rotten and polluted body; if he is a drunkard, his form is sure to reel and stagger, and his body to undergo degeneration, ending in early decay. Whatever he is internally will, by a law of correspondence, act outwardly, and show itself in his body either for good or for evil. It is our duty to stand by man in all his waywardness, and, although our warnings be unheeded, we must be ever ready to extend a helping hand and endeavor to restore the decaying parts. Armed with the best appliances and materials for our work, we may by their judicious and prompt use be instrumental in restoring this wonderful mechanism—the human body—to its pristine beauty and usefulness, and feel somewhat deserving of the Homeric commendation :

"A wise physician skilled our wounds to heal
Is more than armies to the public weal."

The very radical amendments to the Ontario Medical Act proposed during the last session of the legislature would, if adopted, have placed our profession in a most undesirable position. While some assert that the pruning knife might with advantage be applied to lop off a few twigs from a tree which none deny has borne good fruit, there are fortunately few who would encourage applying the axe to the root of a system whose very existence is a protection to the public and a safeguard to the profession.

The recent attack upon the Medical Council may, however, be productive of more than one useful lesson. Many who supported the pro-

posed amendments were probably induced to take that course more from reading the severe criticism bestowed by correspondence in the public press upon the Medical Council than from the influence which a certain few specially interested individuals could have exerted. The Medical Council to-day enjoys the confidence of the profession to a greater extent than ever, and the increased territorial representation will probably silence the fear that the general practitioners throughout the province have not the influence in the council to which they are justly entitled. The power of the Medical Council to discipline any practitioner found guilty of disgraceful or unprofessional conduct, and to erase (subject to appeal to the courts) the name of such from the register, must continue to be exercised, but the necessity for applying such punishment will, I trust, soon become a rare occurrence. Let the great body of the profession pronounce with no uncertain voice, through the local and county societies, that all irregular methods of seeking or obtaining practice and notoriety is unprofessional, derogatory to the interests of the profession, and injurious to those of the public. Let all our medical associations exclude men who do such wrongs from all lists of members, and let the excluded know why they are so excluded. The tone of the profession will then begin to improve, and men who enter it saturated with "the spirit of trade" will become alarmed and will be led to think ; and, above all, let the united voice of the profession express the opinion that a broader preliminary education shall be deemed to be essential for every man to enjoy before he enters upon the special study of medicine. We may then with some confidence feel assured that the professional spirit will grow and acquire a force which will relegate "the trade spirit" to its proper place—which is secondary to the professional—and then the Discipline Committee, unfortunately now a necessity, will be seldom called together. The Royal College of Surgeons, England, has only been compelled to discipline out of its large membership ten during the past six years. May we not strive to emulate that record?

The clause of the Ontario Medical Act allowing medical practitioners in the different territorial divisions to form a tariff of fees has been repealed. There are now three courses open for adoption :

- (1) Let the Medical Council arrange a tariff for the whole province.
- (2) Let the practitioners of each county meet together and form a tariff.
- (3) Let us do without any medical tariff, as some of the United States are at present.

There is much to be said in support of each of these courses. Personally, I am inclined to favor medical men of each county forming an organization, in order to agree upon their own tariff of fees. Some county societies have been in existence for many years, and are doing good work. The fact that those counties in which regular medical societies are sus-

tained always send the largest representation to our Provincial and Dominion association indicates the influence of local organizations in fostering and developing a true professional spirit. If the members of this association will return from this meeting imbued with the determination that a live county organization shall be maintained, and if to these meetings, held quarterly, are brought and discussed some of the interesting cases that have recently engaged the attention of the members, the result would be most marked, and instead of having one or two clinical centres each county would have its own specialists in every department of medicine. The existence of these local societies would no doubt lessen the existence of envying jealousies and heart-burnings, fault-finding and traducings. Then we might hope that each member would be so engaged in the effort to improve himself, and elevate his own position in the profession, that he would have no time in which to study his neighbor's faults, much less to accurately scrutinize and publicly herald his seeming defects. As it is now, the slightest imperfection of a professional brother is sometimes magnified into such Gargantuan proportions as to completely obscure any really good qualities or attainments that he might actually possess, and thus the entire profession is injured in the estimation of the public by the rivalries, bickerings, and jealousies that exist among its members. The greatest of all teachers left us, briefly summarized in "the Golden Rule," the best of all codes of ethics, and the sooner the members of our profession are banded together more firmly in fraternal spirit, the more nearly will we be able to accomplish our great mission in life. Do not imagine that I am dreaming of a professional Utopia, "where every prospect pleases" and even man's not vile. There will be in every Eden a serpent. There seemingly must be those who with the outward semblance of honesty cover dishonorable characters; but we can through local organizations make the manifestation of such dishonesty unpopular. We can educate the public to a belief in the reality of our professions and the nobility of our art. There are enough physicians in this province, to whom their profession is dear, to render the prospect for the future assuringly hopeful. In no way can the standard of our profession be better elevated than by the organization of local societies where the co-laborers can be brought together, and thus learn to sympathize with and respect each other. The strongest hope lies in the fact that, throughout the general profession in this province, there is an increasing love for advancement along the lines made perfect by careful study. It is evident that if the right administration of remedies implies a knowledge which study alone can give, and also a knowledge of the meaning of symptoms, the educated man alone can treat disease, and the ignorant must fall into obscurity, quackery will die a natural death, and the millennium of medicine will be at hand.

DISCUSSION IN SURGERY—DELAYED UNION IN FRACTURES.*

BY GEORGE A. PETERS, M.B., F.R.C.S. ENG.,

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IN assigning as the subject of the "Discussion in Surgery" the question of "Delayed Union in Fractures," your Committee on Papers had in view the fact that while rapid and brilliant advances have recently been made in the more attractive fields of abdominal, pelvic, and brain surgery, our knowledge of the repair of injuries in bones, and the best methods of treatment to bring about such repair in a rapid manner and with a satisfactory result, is little in advance of the times of Pott, Liston, and Syme. It can scarcely be that we have reached the ultimate degree of perfection in the treatment of these cases, because we occasionally—though, fortunately, not frequently—see results following fractures which are not satisfactory, either as regards the appearance of the limb, or as regards its utility, and in a few cases we may fail to get any union of the injured bones whatever. The latter result, viz., non-union, does not occur, according to Hamilton, Liston, Malgaigne, Norris, and other authorities, more than once in five hundred cases. Dennis claims to have seen 10,000 cases in which not one case of non-union ultimately occurred, though several required operation. But cases of the condition now under discussion, viz., delayed union, are much more common. We apply the term "delayed union," then, to those cases in which the fragments of the bone remain unattached to one another several weeks beyond the time usually requisite to bring about perfect restoration of the continuity of the broken bone. Very often without any extraordinary treatment union ultimately takes place in these cases, and they are thus rescued from classification in the deplorable list of ununited fractures ; but such a narrow limit marks the boundary between the two classes that, in consideration of the one, we find ourselves necessarily overlapping the domain of the other.

Fortunately for us, and for our patients, in the vast majority of cases, union of fractured bones takes place in a perfectly normal manner. But this leads us to enquire into the reason why, in the exceptional cases, a

*Delivered at the meeting of the Ontario Medical Association, June, 1895.

contrary condition prevails. Recent investigations, so far as I am acquainted with them, throw no additional light on the subject, and the causes given in all our text-books are those to which we must still give our adherence. The limited time at my disposal prevents my dealing with etiology, except as it may be incidentally mentioned in speaking of treatment, but I would beg to draw the attention of the association to the fact that there have been reported cases of delayed union, and even of non-union, of broken bones occurring in young, strong, healthy subjects, without any constitutional taint, where the fragments were in good apposition, and the treatment correct in every particular. Porter, Packard, and others have recorded such cases. In other words, delayed union sometimes occurs in cases in which *a priori* reasoning would lead us to expect rapid and perfect healing. The knowledge of this should make medical men careful not to let fall unguarded remarks in the hearing of patients so suffering, for many of them are only too ready to enter suits for malpractice.

Having in view this fact, and remembering that such apparently trivial and often unavoidable circumstances as the intervention of a fragment of bone, a strand of fascia, or a torn muscle, may determine delay, or non-union, is it any marvel that one is never called upon to treat a fracture presenting any unusual or unfavorable features without seeing in it a possible—even though not probable—source of trouble, chagrin, or vexatious, and perhaps ruinous, litigation?

The ultimate result of any fracture in which, from any cause, constitutional or local, union is delayed must be one of three:

(1) Either spontaneously, or as the result of treatment, osteoplastic activity is at last set up and perfect union takes place, with full restoration of function, and a normal comely appearance.

(2) Union may occur under similar conditions, but with a shortened, bent, or unsightly limb as the result.

(3) Union by bone may refuse to take place, a false joint forms, or fibrous union takes place with greater or less impairment of utility.

THE PREVENTIVE TREATMENT OF DELAYED UNION.

While one cannot doubt that such constitutional dyscrasiæ as scurvy, syphilis, debility, and anæmia, arising from any cause, have an unfavorable influence over repair in bones, I think it cannot be successfully denied that in the vast majority of cases in which union does not take place kindly there is some distinctly local cause for the perverse condition. Such local causes may be in relation to:

(1) The nature and extent of the injury.

(2) Imperfection of apposition of fragments at time of reduction.

(3) Some failure in the working of the retaining apparatus, or other flaw in the after-treatment.

In regard to the nature of the wound nothing perhaps is in itself so conducive to non-union as actual loss of bone substance, as in some gunshot wounds. Apart from this, the chief reason why compound fractures are more unfavorable than simple is that incidentally germs of suppuration will, in all probability, be carried into the wound and set up their baneful action. If it were possible in such cases to prevent suppuration, the mere fact of a wound of the skin communicating with the fracture would not, to any appreciable extent, delay union of the bones.

While it would be presumption on my part to attempt to give a systematic account of the treatment of fractures to this audience, and would be entirely out of place in this paper, yet I find it incumbent upon me to express some opinion upon the setting and general conduct of such cases as from their nature or character are liable to become instances of delayed union.

In passing, I may interject the opinion that when the local conditions are such as to excite the apprehensions of the surgeon as to the ultimate result, he should, where possible, secure his own safety in case of litigation by consultation with a fellow practitioner as to the line of treatment to be adopted, as well as in reference to the prognosis given to the patient. Another advantage of having skilled aid is that an anæsthetic may then be given, if found necessary. And here I beg to enter a plea for the more general use of anæsthesia in the setting of all, except the simplest, cases of fracture. In compound fractures, in fractures where there is great entanglement of the fragments in the soft parts, and where spasmodic muscular contractions are present, the surgeon is greatly hampered in making a diagnosis of the character of the fracture and in bringing the parts into correct apposition by the cries and expostulations of the agonized patient. Under such trying circumstances, the surgeon is too apt to content himself with an unsatisfying examination and an imperfect reduction, in the ill-founded hope that extension, or the restraining action of the splints, or the moulding power of the muscles will bring the parts into good apposition when the spasm has passed off.

Under anæsthesia, however, the surgeon can usually satisfy himself as to the character and direction of the fracture; he can tell whether the fragments are or are not in correct relation to one another; and he feels no hesitation in putting the limb below the seat of the fracture through those very extensive movements which are sometimes necessary to disentangle the lower fragment from the muscles or fascia, or, what is still more difficult, to draw the soft parts off the sharp point of the upper fragment, which sometimes pierces muscles, fascia, and even skin.

In compound fractures the surgeon may, if necessary, take advantage of the wound to explore with the surgically clean finger, and, where found necessary, the wound should be enlarged so as to allow room for the manipulations or incisions necessary to extricate the fragments from the soft parts and to bring them properly together.

If facilities are at hand for doing so with strict asepsis, I think it is justifiable to cut down upon the seat of injury in the case of simple fractures, if it be found that perfect reduction cannot be achieved by any manipulative process. I am of opinion that the instances where so-called subcutaneous division of an obstructing band of fascia or muscle is justifiable are extremely few, and certainly, if such band is in the line of important vessels or nerves, an open operation is infinitely preferable, as being safer and more accurate.

The question of wiring, pinning, or securing with screws is an important one, but I think it will be conceded that, if the fragments are once brought into accurate apposition with one another, the tendency to redispacement is not very great, and that a properly fitted splint is sufficient guarantee of permanence in the majority of cases. Of course, in fractures of the olecranon, the patella, and the lower jaw, some metallic restraint is in good position almost an essential in order to get bony union, but in the case of long bones, where the conformation of the part is favorable to the use of splints, any more intimate retentive apparatus is seldom required.

Having set the fracture and applied retentive apparatus, we must now inquire how in any given case the surgeon in charge can ascertain whether the normal processes which result in the welding together of the fragments are going on or not. All are agreed that meddling surgery, like meddling midwifery, is bad. It certainly is injudicious and unjustifiable to remove the splints at frequent intervals, and test by flexions and rotations the degree of union that has taken place. Undoubtedly great harm may result from such interference. In fact, such meddling curiosity has, in itself, frequently been a cause of non-union. On the contrary, it is unwise to set a fracture once for all at the time of injury, and then never remove the splints until it is expected they may be left off permanently. It is difficult to state in a general way what rule should be followed in regard to this matter. Much will depend on the nature and seat of the injury. To be as definite as the general character of the question will allow, I consider that it is good treatment to loosen the splints and examine the seat of the fracture within the first forty-eight hours. (If there is burning pain in the skin under the splint, over bony prominences, or elsewhere, this should be looked to as soon as complained of, otherwise a slough may occur.) It is true that there will not be much diminution of the initial swelling, and the tenderness will be great at this exami-

nation, but muscular spasm will have passed off. Any gross deviation from the normal length or continuity of the bone may be detected, and the necessary readjustment made more easily than at a later period. Throughout the whole course of the treatment thereafter, it appears to me a wise measure to remove the splints every four, five, or six days, according to circumstances, so as to expose the seat of the fracture for a few moments, at least, to the sunlight and air, and to subject the skin and muscles to a light friction and massage in order to prevent what has been very aptly called "local scurvy." Now I wish particularly to state that this must be done without permitting any movement whatever of the fragments upon one another, and I would most strongly deprecate any idea of "testing" the degree of union by bending or rotating the limb. Such testing can do no good whatever, it rarely gives any reliable information to the surgeon, and it may be productive of very great harm.

If, while handling the limb, the surgeon feels distinctly a large formation of callus, it is to a certain degree reassuring, but its absence or small amount does not by any means prove that union is not progressing, for we know that the better and closer the apposition of the fragments the less is the amount of callus produced.

I believe, of course, in passive motion, but, if passive motion cannot be done without risking the union of the bones, then I say wait, and take chances on the movement of adjacent joints. Usually, when the bones are firm one can gradually restore the utility of the joints; but if you fail to get union of the bones, what becomes of the joint? You then have that worst of all combinations—a stiff joint with an ununited fracture in its immediate neighborhood.

In the treatment of fractures due regard must be had to the element of time, and the surgeon should devote his whole skill and attention to the proper treatment of the case, and scrupulously avoid all "testing" of the strength of the union until such a length of time has elapsed that he may reasonably expect that union will be perfect. If it should unfortunately happen that union has not taken place, the surgeon will experience a great disappointment, and the unwelcome news will come as a great shock to the patient, but the former will have nothing to reproach himself for, and the shock to the latter would not have been lessened by two or three weeks of disquieting apprehensions resulting from the suspicion of the unsatisfactory progress of his case that would have been excited by repeated testings.

But there are also some cases in which, even after the full time has been allowed for treatment, and where union is apparently firm, it is found that the callus is soft and yielding, and that it has not become fully ossified. In the case of bones of the upper limb, no ill result may follow

the use of a limb in this condition. The moulding power of the muscles, and that admirable adaptive power of nature which tends to the restoration of injured parts to their original form, may serve to keep the limb from warping, or may restore it gradually to its natural shape if it has become bent. But in the lower limb, which has to bear the weight of the body, a very disfiguring degree of bending may take place in a short time. This teaches us that we should make careful note of the shape and length of the limb when the splints are removed, and the patient is allowed a limited use of the limb. The limb should also be inspected a short time after the weight has been put on it, and, if it is found to be yielding, the splints should be reapplied in such a manner that elastic pressure may be used to bring the fragments again into a straight line.

If, however, after the lapse of five, eight, ten, or twelve weeks, depending on the bone affected, the surgeon should find on examination that union has not occurred, what course of action is he to adopt? It is well not to get into a panic in such cases, because, as has been pointed out, union is sometimes delayed a few weeks beyond the usual time without any obvious reason, and then equally without obvious reason reparative action sets in and a satisfactory result ensues. But if the watched-for and longed-for result does not arrive, the surgeon feels that he must do something. Some fifty years ago Sir William Fergusson declared that he would do almost any reasonable thing rather than cut down upon the seat of fracture as White of Manchester had done, and though we are, with good reason, less afraid of making wounds than they were in Fergusson's day, yet the boldest of us will scarcely dare claim that there is no danger in such an operation. In the earlier stages of delayed union, at all events, milder measures may be adopted. Constitutional measures should not be neglected, though I need not enter into details regarding this point.

In regard to local treatment almost any method which is effective in exciting inflammatory action at the seat of fracture will be effectual, provided distinctly that the ends of the bones are in apposition. Perhaps the most effectual and most readily applied measure is by rubbing the ends forcibly together. There, too, I would strongly advise anæsthesia, though some authorities hold that it is not necessary. If the attempt to excite reaction is made at all, let it be vigorous and energetic. No make-believe rubbing of the ends will be of any service. The limb should be flexed, extended, and circumducted at nearly a right angle to the normal axis of the limb, and these movements should be made with a force and vigor amounting almost to violence. In that way, if the bones were not in apposition before, they may be brought together by wearing away the bands or fibres, or the new tissue that may have formed between the bones.

After such treatment the retentive apparatus must be reapplied, and Thomas recommends tight bandaging above the fracture so as to increase the swelling and congestion at the part. Some recommend plaster of Paris splint, but if the fracture is in such a situation that any other form of splint can be applied in such a way as to secure perfect immobility, while, at the same time, leaving the seat of the fracture exposed to the light and air, that is the form of splint to be recommended. If, however, it is found on moving the bones freely that they do not grate against one another, such manipulations will probably be unproductive of good, and the proper course will be to cut down upon the part and proceed to such cutting measures as will serve to bring the bone surfaces together. Moreover, the seat of the fracture may be in such a situation that violent manipulations might endanger the integrity of adjacent vessels or nerves, as, for example, in the middle third of the humerus, where the musculospiral nerve lies in immediate contact with the bone. Here an open operation is greatly to be preferred. For similar reasons, I think the subcutaneous drilling and irritation of the ends by the methods of Dieffenbach and Brainard are to be condemned. I do not deny that benefit often results from such drillings, but I think they should be done with the ends of the bones exposed by incision. Every surgeon of experience knows the perverse tendency of drills to slip from the object against which one thinks he is directing them, and to plunge blindly into adjacent parts, perhaps with disastrous consequences.

TREATMENT OF CASES OF LONG STANDING, OR SO CALLED NON-UNION.

In cases of long standing it is often difficult to know whether to advise operation or not. Sir W. Fergusson relates a case in which a man had such a useful arm, though it was the subject of a false joint, that he passed a searching examination as a recruit and was accepted for the army, and I have in my mind at the present moment a case in which there is ununited fracture of both bones of the forearm, with such slight impairment of function, that the man is able to earn his living as one of the crew of a steam thrasher.

Each case must be decided upon its own merits. Much depends upon the age of the patient, the bone affected, and the utility of the limb. For example, an ununited fracture of the upper end of the fibula may be perfectly innocuous, and even in case of the humerus there may be almost no impairment of function whatever.

In the endeavor to be as definite as possible, I would say that in the case of a young man, otherwise in good health, with an ununited fracture of the upper extremity, and almost perfect utility of the limb, though I would not *urges* operation, I should be willing to undertake it after fully

explaining the risks, dangers, and uncertainties of the results. If the arm were useless, or comparatively so, I should certainly advise the operation, even in a middle-aged or elderly man. In advanced years, however, with fair utility of limb, I should be inclined to refrain from interference.

In the lower limb I think we should be more aggressive, and should always attempt to get bony union by operative procedure. Even here, however, by means of a close-fitting leather or rawhide casing, the limb may often be made to support the body and perform its functions surprisingly well, and cases are recorded in which union ultimately took place after such an appliance had been worn for more than a year. The operative procedure in a case of old-standing is very different from that which is appropriate to a more recent case. In the former any treatment would be inadequate which stopped short of a free open incision with the removal of the false joint, the pointed or rounded ends with closed medullary canal which have resulted from a rarefactive osteitis, or the fibrous bands which remain as the abortive results of the attempt at the formation of callus. It is obvious that such an operation must result in a shortening of the bone. This makes little difference in the humerus, and it can be compensated for in the case of the femur, but, in the case of ununited fracture of one bone of the forearm or leg, it may necessitate the removal of a section of its unbroken companion, so as to make both bones of the same length. This, of course, adds very materially to the gravity of the operation, and must be allowed due weight in the consideration of the advisability of recommending any operation at all. After such operation the bones may be held in position by wiring, or by means of screws. Time will not permit, however, of my going into details as to the mechanical treatment.

In this paper, Mr. President and gentlemen, it will have been observed, perhaps with disfavor, that I have not given any lists of causes or lines of treatment. I have not quoted authorities, though I have consulted them extensively in preparing the paper; I have not brought forward a single new thing; but I have tried to outline in a brief and imperfect way what I consider to be the best way to avoid delayed union in the treatment of fractures, and the measures best adapted to restoration of osteoplastic activity when delay has occurred.

CHRONIC SEMINAL VESICULITIS.*

BY EDMUND E. KING, M.D. TOR., L.R.C.P. LOND.,

Surgeon to St. Michael's Hospital; Physician to House of Providence and Home for Incurables; Pathologist, Toronto General Hospital.

IN a paper so short as this must needs be, to deliver in ten minutes, it is impossible to go very deeply into the pathology of seminal vesiculitis. The disease is a common one, and, following, as it so frequently does, gonorrhœa, we naturally expect that the acute stage will be overlooked by many of us, and the symptoms, according to traditional teaching, attributed to the spread of the inflammation to the prostate and neck of the bladder.

In my opinion, we have described the symptoms produced by the spreading backward of gonorrhœal inflammation as due to cystitis, prostatitis, abscess of the prostate, etc., etc., while in reality they have, in the great majority, been results of seminal vesiculitis; and when the over-distended vesicles have evacuated themselves, we have been satisfied that, for example, the prostatic abscess has burst and resolution begun. This disease presents three stages—acute, subacute, and chronic. I do not intend this morning to refer to any but the chronic cases, and illustrate them by three or four successfully diagnosed and treated cases, in which sufficient time has elapsed to justify the use of the word “cure.” Other cases under treatment at the present time are fully meeting the expectations, and will likely be reported in due course.

The anatomy. The seminal vesicles are sacs, situated along the outer border of the base of the bladder, folded on themselves, and present an irregular, inverted U-shaped tube or sac, with the blind end and neck of the sac very close to each other. The vesicle is about two inches long as it lies—twisted—attached to the base of the bladder, and in close communication with the rectum, only separated by the loose areolar tissue. The length of the sac when straightened out is about six inches, the width of the sac varying in size according to its collapsed or distended condition.

* Read before the Ontario Medical Association, Toronto, June, 1895.

Jordan Lloyd (*British Medical Journal*, April 20, 1889) asserts that they are the analogues of the Fallopian tubes. (This is true anatomically, but not histologically.) The seminal vesicle opens into the vas deferens, just at the border of the prostate, forming the ejaculatory duct which penetrates the prostate gland, and opens by a valve-like slit in the prostatic sinus, one on either side of the verumontanum.

The vas deferens, which on rectal examination is often mistaken for the seminal vesicle, is the communicating canal from the testicle to the penis. This canal, eighteen to twenty-four inches long, dilates into the ampullæ about four inches from its union with the seminal vesicles, and lies along the base of the bladder, nearer to the middle line than the vesicles, and may readily be mistaken for them. In health, it is almost impossible to differentiate these organs, although in the distended and diseased conditions they are quite readily made out.

The function. The function of the seminal vesicles is not clearly defined. That it secretes an albuminous fluid which dilutes the testicular secretion, that it acts as a reservoir for the semen, is admitted by most authorities, yet disputed by some, these latter holding that the vas deferens dilating into the ampulla can and *does* retain the semen, and that the mixing of the two fluids takes place at the time of emission. We have not time to discuss this subject in the present paper.

The symptoms. The seminal vesicles being the anatomical analogues of the Fallopian tubes, it is clear that seminal vesiculitis and salpingitis are analogous diseases. They are rarely or never primary diseases, but are secondary to some inflammatory trouble, and, in a large percentage of the cases, it is a common factor—gonorrhœa—that produces both.

We will here pass over the acute and subacute cases, and direct our attention simply to the chronic ones. The patient will complain of symptoms similar to those produced by stone, or prostatitis—frequency of urination, accompanied by pain either in the neck of the bladder or head of the penis. Some pain, of a greater or lesser intensity, on evacuating the bowels, especially if the movement is hard and accompanied by straining. A discharge from the penis after defæcation. A sense of bearing down and desire to strain on micturating. Erection may be frequent and painful—priapism—and of such severity that it alone is sufficient to cause the patient to seek advice, while, on the other hand, it may be ephemeral, and, on an attempt at coition, simply fail at the start. The increased frequency of micturition at night or after exertion or long walks is very marked. Throbbing and a burning sensation is frequently felt in the rectum. A slight discharge occurs from the meatus in the morning, and occasionally a copious discharge, without any apparent or exciting cause. (In acute cases this is a symptom that is classed by the patient and some

physicians as a relapsing clap.) These symptoms are easily explained as a result of a posterior urethritis, while the improbability of the infection spreading through the capsule of the prostate or into the tissue around the bladder is apparent when such easy access is open to the vesicles.

The diagnosis. In most cases coming under notice it is quite likely that the symptom will direct in the order of examination. After you have excluded those diseases whose diagnosis is made out without actual examination, turn your attention to the rectum, and palpate the prostate and vesicles.

The vesicles should be examined while the bladder is full, the patient standing on his feet, with his body bent at a right angle across the arm of your office chair. It is not necessary that an enema be previously used, as this would empty the bladder and prevent thorough examination. It is frequently necessary to press with the disengaged hand against the pubes while the finger is in the rectum, to carefully map out the distended vesicles. The finger must be carried well up, the ball of it pressing forward toward the bladder, and the vesicles or dilated vas mapped out with its lateral movement. The patient is directed to urinate in two vessels; the first will contain whatever fluid has been squeezed out of the vesicles, and should always be examined by the microscope; the second vessel will contain clear normal urine, if there is no inflammation existing in the bladder.

The literature and teaching. The authorities have, as a rule, either ignored the condition or treated it in such a casual manner that their readers have never seen the importance of the subject. Gouley, in his treatise on "Diseases of the Urinary Apparatus," devotes one whole chapter to the subject-heading of gonocystitis, or phlegmasia of the seminal vesicles. In Morrow's "System of Genito-Urinary Diseases," etc., Paul Thorndyke, of Boston, contributes the chapter on this disease, but in the older authorities Van Buren and Keyes, Bumstead and Taylor, dismiss the subject with a very few words, and nothing on treatment but rest. Milton dismisses the subject in a few lines, and of treatment he says: "I can say nothing worth the reader's attention," p. 229, ed. 1887.

Sir Henry Thompson appears to be on the right line when he says of prostatic abscesses: "Abscesses supposed to be prostatic are not infrequently external to the prostate and not within the envelope of the organ; and are, in fact, peri-prostatic." He has omitted any explanation of the symptoms or of defining the exact location of such abscess. Jordan Lloyd, of Birmingham, has contributed two very interesting and complete monographs on the subject (*British Medical Journal*, April 20, 1889; *Lancet*, October 31, 1891); Fuller, of New York, in an elaborate monograph read before the Genito-Urinary Association of America, in 1893,

and one before the New York Academy of Medicine; Gardner Allen, of Boston, in a monograph before the Boston Medical Society, etc., etc.

John K., æt. 44, from Western Ontario. Neurasthenic. History of gonorrhœa twenty years ago; also syphilis, and a moderate varicocele on left side. The patient complained of pain at the end of penis, at the neck of the bladder, at the completion of micturition. Frequency at night; would have to arise four or five times each night. The movement of the bowels was accompanied with a painful, burning sensation just within the anus, and also a discharge from the meatus. This was more marked if he was constipated. He had been examined for stone, and the bladder washed frequently for the symptoms of apparent cystitis. The patient was referred to me by Dr. W. P. Caven in October, 1894. After taking note of the history and examining the urine, one long shred was observed floating around. This, when placed under the microscope, showed numbers of dead spermatozoa and some small pus cells. The urethra was free from coarctation, and the bladder examination revealed nothing. The prostate was next examined and found somewhat enlarged, about twice its normal size, and soft, but the seminal vesicles were found to be very much swollen and boggy, excessively tender, and, by a massage and specially-directed pressure, fluid was squeezed out, of sufficient quantity to drip from the meatus. The first ounce of urine passed after the manipulation contained over two drachms of *débris*, chiefly mass and pus and dead spermatozoa. The pain was, evidently, very severe, for the patient was much exhausted after the examination. I advised a continuance of the stripping process, and deep injections of silver nitrate, but his own physician in the West did not thoroughly take in the directions, and the treatment was very indifferently carried out. He passed out of my notice until February of this year, when he again presented himself for treatment, having, in the meantime, been at Battle Creek, and treated by some electric urethral method, with no good result. I insisted on carrying out the treatment myself. In March I began systematic stripping of the vesicles, followed by nitrate of silver injections every fourth day. He rapidly improved. The frequency of micturition subsided to once each night; pain on bowel movement disappeared, and all the other symptoms vanished. He had only ten applications, and I operated on the varicocele at the same time, with cure. On May 27 last I examined him, and, after stripping the vesicle, not a shred nor particle of *débris* was found in the urine.

Mr. F., Stratford. Has a very severe varicocele. Five years ago had first gonorrhœa, which he says was cured. In January, 1893, the patient says that a relapse occurred, although I would say another infection took place. Used treatment with apparent benefit; yet in October, 1893, while at the World's Fair, the symptom increased, and he took bals.

copaiba and ol. santal. Up to this time no symptom other than those attributable to gonorrhœa appeared; but in January, 1894, a sense of fullness and pain in the lower part of the rectum was noticed, followed quickly by a frequency of micturition. The pain was also referred to the end of the penis while micturating, and very severe at neck of bladder immediately after the act. Stone was suspected, and he was sounded with negative result. The symptom increased in severity and frequency, and a viscid discharge was apparent after movement of the bowels. His physician suspected ulceration of the neck of the bladder, and irrigations were used without effect. He was sent to me, and, on making a rectal examination, the true state of the case was made out. The vesicles were much enlarged, swollen, and distended. Very tender on slight pressure and almost unbearable on pressure severe enough to strip the vesicles. The quantity of discharge was one and a half drachms the first time, and three drachms the second, after which it gradually diminished, and is now perfectly cured.

Both of the above cases had a varicocele, and in each I operated with perfect results. There can be no connection between one and the other though. In the first case the sexual desire was blunted, a loss of confidence, and failure to complete the act. In the second case erections were very frequent and annoying, but there is no history of impairment. The third case was one of more than passing interest, and was sent to me on account of a very large prostate and the accompanying symptoms.

Mr. C., æt. 70; hale, hearty, and vigorous. Had symptoms of frequent and painful micturition for past ten years; during the past four months arising ten and twelve times each night. The passage of a catheter was frequently very difficult and always attended with great pain. Twice, once two months before I saw him, and once a year before that, he had complete retention. There was a history of gonorrhœa some fifty years ago. On examining the prostate it was found very much enlarged, but soft and boggy. The vesicles and ampullæ of the vas were much swollen and tender. It did not strike me as a suitable case for operation—at any rate just then—and I advised a course of massage and stripping. The advice was followed out, and for two months I regularly massaged the prostate and stripped the vesicles—a marked improvement being noticed in all the symptoms. The prostate now, for months after treatment, has ceased, is very little larger than normal, and the vesicles are barely discernible. The frequency has decreased to twice, and occasionally three times, per night.

Treatment. Dr. Eugene Fuller, of New York, deserves the credit of bringing this subject more fully to the attention of the profession and defining the method of treatment; but the process originated with Reliquet,

who reported the matter in the *Gazette de Hôpital*, 1879. Gouley also advised emptying the vesicles, but with much more frequency. The method that I have adopted is almost identical with that of Fuller, and the success has been gratifying. I order the patient to have a free movement of the bowels on the morning of the day I see him, either by a purgative administered the night previous, or by enema in the morning. He is to see me while the bladder is full, if possible; in some of these cases only an hour, while in others four or five hours, may elapse between micturitions. Then have the patient standing up and bend the body at a right angle over the chair arm. The first finger, or more preferably the first and second fingers are well soaped and greased and carried into the rectum with the ball of the finger toward the base of the bladder, and exercise pressure with lateral movement over the swollen and tender vesicles. It will frequently require considerable upward pressure to reach above the upper border of the vesicles, and with short fingers it is not possible. If you cannot reach above, it will not prevent you from emptying the vesicles. On account of their shape—that of an inverted U—the manipulating of the closed end of the sac will force the contents around the loop of the U, but, of course, the upper part will not receive the benefit of the pressure. After these lateral movements have been carried on for two or three minutes, the pressure should then be directed to the process of stripping—that is, pressure from above downward to express the contents through the ejaculatory duct to the urethra. As I said in one of the histories, it is frequently sufficient to cause fluid to flow freely from the urethra during the manipulation. Instruments have been devised by Glen, of Nashville, and others, to reach higher up the rectum, and allow of perfect stripping, but no instrument is as sensitive or as accurate as the finger tips, and I am dubious about their usefulness. The patient is now directed to urinate in two vessels, for the purpose of allowing the surgeon to appreciate the diminution of discharge, and thus measure the degree of success attained.

It has been my habit to inject twenty to forty minims, with the deep urethral syringe, of various strengths of silver nitrate, from five to twenty grains to the ounce, commencing with the weaker one. Just how much value these are in the cure I am not quite satisfied. I am not sure whether the manipulations have caused the valve-like slit of the ejaculatory duct to remain open and allow any fluid to enter the vesicles; but, from the sensations complained of by the patient for an hour or two in two cases, I believe that sometimes the fluid enters the vesicles. The frequency of these séances should not be oftener than every fourth day, and, after the first four, the interval might, with benefit, be increased to a week. The frequent manipulations may easily excite an acute inflammation, with serious consequences. Allan, of Boston, reports a case of bad results

following too frequent manipulation. It is not necessary to have your patient lie up, but rather beneficial to have him around.

The conclusions I would draw from the foregoing are :

- (1) That seminal vesiculitis is an analogous disease with salpingitis.
- (2) That it is of very frequent occurrence.
- (3) That it is the so-called cystitis, prostatitis, and prostatic abscess that follows gonorrhoea.
- (4) That, with proper treatment, it is a curable disease.
- (5) That it is easily recognized per rectum.

61 QUEEN STREET EAST.

A VISIT TO THE SARANAC LAKE SANITARIUM.

BY J. E. GRAHAM, M.D., M.R.C.P. LOND.,

Professor of Medicine and Clinical Medicine, University of Toronto; Physician to the Toronto General Hospital, and St. Michael's Hospital.

NOW that so much attention is being paid to the management of tuberculosis, your readers may be interested in a brief sketch of the Saranac Lake Sanitarium.

A party of four, Mr. Gage, Mr. Miller, the architect, Dr. Powell, and the writer paid a short visit to Saranac in the early part of June. The Adirondacks are easily reached after a few hours' pleasant journey from Montreal. Unfortunately, on the day of our visit the thermometer registered 90° in the shade, and our impressions may have been influenced thereby. I must confess, however, to a preference for our own Muskoka as a summer resort. The temperature of the Adirondack region in the winter ranges about the same as in Muskoka. The sanitarium is made up of a central administration building, a pavilion, an infirmary, and a number of cottages. The latter vary in size, some accommodating two, some four, and one as many as ten patients. The dining-room and kitchen are in the central building.

The cottage which seems most in favor is one for four patients. It is built of wood on stone foundation, and contains five rooms, one a large general sitting-room and four bedchambers, which open directly off the sitting-room. Free circulation of air is allowed by large open transoms, and in some instances by a large space existing between the upper line of the wall and the ceiling. In the latter way the cottage is made to resemble a bungalow made up really of one large chamber separated in rooms by partitions eight or nine feet high. The newer cottages, beautifully furnished, are bright and cheerful; some are heated by hot water, and others by stoves. Those more recently erected will shortly be provided with bathrooms and water closets.

I fancy that life in these cottages might be made delightful if the occupants were genial companions of the same social position. In any case,

the patients spend the greater part of the day in the open air, or in the pavilion, so that the nights only are spent in the cottages. The pavilion is a large building enclosed on every side by sliding glass windows, which can be easily opened or closed, thus protecting the interior from the cold winds, while at the same time free access of fresh air is permitted. Heat is provided by a large coal stove, but steam or hot water would be preferable. Patients in the pavilion are practically in the open air, and during the winter time they may be often seen playing billiards while wearing their overcoats and gloves.

A cottage is set apart for the infirmary, which is made up of a large sitting-room and six bedrooms. When from any cause a patient requires to remain in bed, he or she is sent to the infirmary, and remains there until the acute attack has passed off. A trained nurse, the only one in the sanitarium, has charge of the hospital. The inmates in the cottages are able to look after themselves.

All the patients in the cottages must necessarily go to the central dining-room for their meals, both in summer and winter. They are provided with waterproofs and overshoes, so that the weather is to a great extent disregarded. I heard the same remarks in this respect at Saranac as I heard emphasized by Dr. Dettweiler, at Falkenstein, during my visit to that sanitarium three years ago, viz., that the weather has very little effect upon those who constantly breathe fresh air. Dr. Hance informed me that pneumonia is very rare, indeed, in the sanitarium, there having been but three cases in five years. Catarrhal affections are certainly not more frequent than in the ordinary communities.

We had the pleasure of dining with the patients in the large central dining-room. The meal was made up of varied, substantial, and well-prepared food, and reminded me very much of that at Falkenstein and Laysin. Patients are allowed light refreshments in their cottages, as milk, beef tea, etc.

The ordinary well-known remedies for tuberculosis—cod-liver oil and creasote—are used in suitable cases, and tuberculin is administered to a few.

The main features of the treatment are life in the open air, good, liberal feeding, and an amount and variety of exercise suited to each case. Douches and massage are also given. In the summer time many of the patients sleep in tents, but none in the open air.

The complete freedom of the air from contamination by tubercular bacilli is an important point. I was told that, in a great number of experiments, similar to those of Dr. George Cornet's, dust scraped from the floor, walls, and furniture, mixed with water, was injected under the skin of guinea-pigs.

It is altogether probable that the air of the sanitarium is much more free from bacilli than that of the ordinary dwelling. This fact is of great value, as it proves that, under proper regulations, the disease may be rendered quite innocuous, so far as the attendants on the patients are concerned.

The success of treatment may be roughly given as follows :

Twenty-five per cent. cured.

Twenty-five per cent. much benefited.

Twenty-five per cent. slightly benefited.

Twenty-five per cent. unimproved.



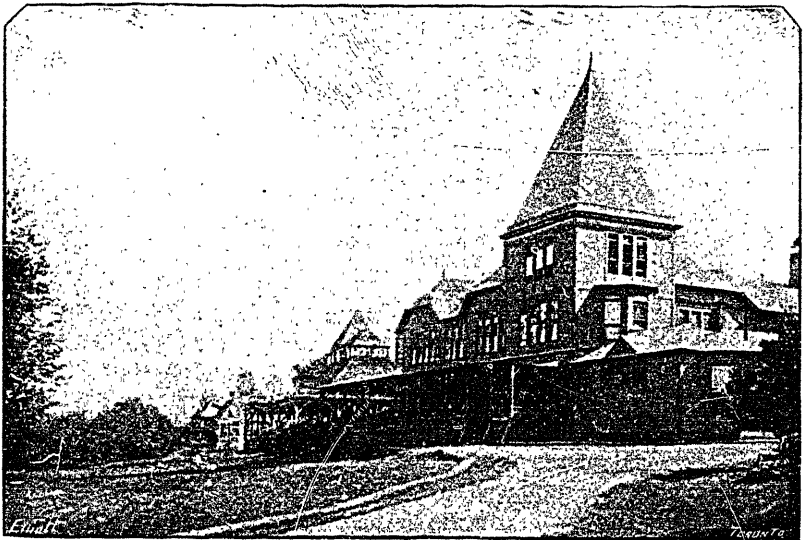
By the word "cured" is meant a return to the former health and a complete absence of bacilli from the sputa. Relapses may occur in any of the cases.

These statistics agree very closely with those published by Dr. Dettweiler, of Falkenstein, who found twenty per cent. of his patients living and in fair health ten years after they left the hospital.

One of the most important buildings in connection with the sanitarium is the laboratory, which is situated in the village, near Dr. Trudeau's residence, about a mile and a half from the cottages. Although not large, it is probably the best arranged and most complete for its purpose of any on this continent. It is certainly the cleanest and kept in the best

order of any which I have visited. Very little odor, or even closeness, could be detected in the animal room. One cannot go through this building and be shown some of the work done without feeling that here discoveries may ultimately be made which will be of the greatest importance to the human race.

The sanitarium as a whole, the common-sense methods of treatment based on our present knowledge of tuberculosis, the patient enthusiasm of Dr. Trudeau and the other medical men in charge, as they continue quietly their investigations from year to year, all impress one with the importance of the institution and of the great good which is likely to flow from it.



The history of the sanitarium is full of interest. Dr. Trudeau commenced work about twenty years ago by the erection of a small central building and two cottages. There is now accommodation for over eighty patients. The buildings have been erected by voluntary contributions, and the sanitarium is supported in the same way.

The moderate charge of five dollars a week is paid by each patient, or by the society or municipality which sends him. The cost of maintenance is seven dollars a week. The sanitarium is thus intended for the comparatively poor, and is a purely benevolent institution.

Wealthy patients live in cottages or hotels in other parts of the Adirondacks. I was surprised to find so large a number of the latter class in this

region. Many of the liberal donations to the sanitarium have been made by wealthy people who, having spent months in the neighborhood, were able to judge of the excellent work done. One of the largest was a gift of \$17,000, the cost of the laboratory, and some of the cottages were built by single individuals.

One of my objects in writing the present article is to endeavor to awaken a greater interest in this matter among members of our own profession. Owing to the generosity of two of our citizens, Mr. Gage and Mr. Massey, and to the encouragement given by both the Dominion and Ontario governments, as well as by the two great railway companies, we are now in a position to state that the building of an institution in this province similar to that of Saranac lake within a year or so may be confidently relied upon. I am quite convinced that we shall find in Muskoka situations equally as good as those in the Adirondacks. Now that we can regard the establishment of such a sanitarium with certainty, its growth and development will depend largely upon the interest taken in it by the profession.

One of the first requisites will be a physician of ability, energy, and judgment, one who has had an excellent training, and who is willing to devote his life to the care of patients in the hospital and to the study of the disease.

One cannot visit the Saranac sanitarium without noticing the important part Dr. Trudeau has had in its success. The importance of such an institution is not altogether in the number of patients treated, which is necessarily limited. The educational influence which it will exert on the profession and public will be of the greatest value. Our ideas both as to the pathology and management of tuberculosis are now undergoing great changes, and there is still much to learn. An institution, therefore, near at hand and always open to the inspection of the profession cannot fail to exercise an important influence in our ideas of the care and management of patients throughout the province suffering from the disease. We are really beginning under much more favorable circumstances than Dr. Trudeau, and if we can only attain to his measure of success we shall be satisfied.

In conclusion, I hereby express the thanks of our party to Dr. Trudeau and Dr. Hance for their kindness and courtesy during our short visit.

The accompanying pictures of the main building, pavilion, and cottages were taken from photographs which Dr. Powell made when there.

EXPERIMENTS ON MOTILITY IN BACTERIA.

BY HIBBERT HILL, M.B.

A SERIES of experiments undertaken to determine the relation between the possession of motility by bacteria and their ability to penetrate wet cotton has given the following results :

(1) Motile bacteria penetrate wet cotton in any direction readily ; the rate of passage varying for different species with the relative activity of their motility.

(2) Non-motile bacteria pass *downward* through wet cotton readily.

(3) Non-motile forms *may* pass *upward* through wet cotton, but such passage is very slow—from some days to two or three weeks.

(4) Aerobic forms which are also motile may utilize their motility to resist gravitation ; so remaining at or near the surface of a liquid medium exposed to oxygen.

The method of investigation was as follows :

(1) U-tubes of glass were made, filled with ordinary bouillon, plugged, sterilized, and tested in the usual manner. Inoculations made into one arm from either motile or non-motile bacteria yielded free growth in the second arm in a very short time.

(2) Similar U-tubes were then made ; ordinary surgical absorbent cotton was introduced into one arm and packed into the lower end, just above the commencement of the bend. Bouillon was then poured into one arm, and aspirated through the cotton into the other, so as to fill both arms and saturate the cotton thoroughly. After the usual plugging, sterilizing, and testing,

(a) Inoculation of non-motile forms into an arm containing cotton resulted in free growth on the other arm soon after.

(b) Inoculation of non-motile forms into an arm not containing cotton required some considerable time before growth was discernible above the cotton in the second arm.

(3) Straight tubes, stopped at the lower end with rubber corks, were filled with bouillon ; surgical absorbent cotton was thrust half-way down the tube into the bouillon. Inoculations into the bouillon above the

cotton with *non-motile* forms resulted in the deposition on the cork below the cotton of a large amount of the growth obtained. With motile forms, however, the chief growth occurred *above* the cotton, which served as a sharp line of demarcation between a dense opacity above and comparative clearness below.

(4) Test tubes prepared, and cottoned, as already described, on one side only or on both sides, showed marked growth on both sides in a short time when inoculated in either arm with a motile species.

(5) Test tubes, prepared as in No. 4, were inoculated in one arm with an aerobic motile species. A thumb was placed over the mouth of the second arm, and sterile bouillon poured into the first until it was filled. The cotton plug was reinserted and the top sealed with wax. On removing the thumb from the second arm no flowing of the bouillon could now take place. In such cases the growth which developed was almost entirely in the second arm, above the cotton.

(6) Tubes prepared as in No. 5, but inoculated in the arm exposed to the air, showed very little growth in the sealed arm, but, of course, quite free growth on the inoculated side.

(7) In both 6 and 7, on removing the wax, thus allowing once more free access of oxygen to both sides, the amount of growth on each side became rapidly equal.

These experiments might be made of practical use in demonstrating the results of motility in class work, and in distinguishing certain allied species which differ in the activity of their motion. It is intended to continue work in this direction, and to attempt an answer to some of the numerous problems suggested by the results so far obtained. The particulars of the various experiments will be published later.

SPECIAL NOTE.

A new method of differentiating bacillus typhi abd. and bacillus coli communis, based on the relative activity of their motility:

At the suggestion of Dr. H. D. Pease, Fellow in Pathology at Johns Hopkins, one of the results of the foregoing experiments was applied to the differentiation of bacillus typhi abd. and bacillus coli communis. Test tubes were prepared as already described, special care being taken to ensure that the length and tightness of the cotton to be traversed was the same in all cases. Four tubes were inoculated with bacillus typhi abd., four with bacillus coli communis. The tubes were incubated at 37° C. for fifteen hours. On examination, the second arm of all the tests inoculated with bacillus typhi abd. were found cloudy, those of the bacillus coli communis being clear. The inoculated arms of all the tubes showed free growth. Secondary inoculations were made from all the second arms, with the result

that those from bacillus typhi abd. developed, the others proving sterile. A second experiment with similarly prepared and inoculated tubes gave growths from secondary inoculations from the second arms of two tubes of bacillus typhi abd. in twelve hours.

The glass tubing used was $\frac{3}{8}$ inch in diameter. The attempt was made to obtain a greater uniformity of results by packing a definite weight of cotton ($\frac{1}{2}$ gram) into a definite length ($1\frac{1}{2}$ inches) of such a tube.

Clinical Notes.

EAR COMPLICATIONS IN LA GRIPPE.*

BY E. J. BERNSTEIN, M.D.,
BALTIMORE, MD.

IF the experience of other aurists has been as mine, this present epidemic has been unusually prolific of serious secondary disease in the ear, some of which have assumed very curious types, and with me one I had rarely seen before. It is a secondary mastoiditis and purulent otitis media. Ordinarily there are two classes of cases, the one presenting symptoms of naso-pharyngeal catarrh, the other representing the disease itself, localized in the ear. It is a subdivision of this latter which calls for some remarks.—symptoms simulating acute gastric catarrh to such a degree that only after several days of suffering would the aural complications be brought to light. The chief characteristic of ear symptoms in influenza, contrasted with other acute infectious diseases, is the intense hyperæmia entirely disproportionate to the conditions usually seen. This congestion is also the indirect cause of the complications observed, first, because in the weakened walls of the blood vessels it tends to rupture and hæmorrhage, secondly, because it lights up afresh any inflammation already healed; and thirdly, it renders the mucous membrane highly susceptible to the reception of any other conveyers of disease. Otitis media acuta suppurativa generally begins with sticking, tearing, or boring pains in the ear, spreading out over the frontal and occipital region. In children the pain is more intense than in adults, though in the latter it seems almost unbearable. Usually the pain exacerbates towards night, and in the morning the patient may become quiet and sleep several hours; either bodily or mental exertion increases pain. In very intense inflammation, slight conjunctivitis, œdema of the lids, and photophobia are present before the rupture of the drum. High fever, nausea, unconsciousness, and convulsions are concomitants, and of such a degree as often to lead one to suspect meningitis, or beginning exanthemata, with cerebral symptoms. Should we

*Abstract of a paper read at a meeting of the Maryland Clinical Society, March 29th.

neglect to examine the ear often, we are only made cognizant of the aural character of the malady by the purulent discharge when the violent character of the illness subsides, showing the cerebral symptoms to have been caused by acute otitis media. When the mastoid is involved, we have great pain and tenderness upon pressure, and the posterior and superior walls of the meatus are hyperæmic. The peculiar set of symptoms to which I wish to call your attention will be best shown by the history of a typical case. The patient has had an attack of la grippe, more or less severe. During the height of the disease, or while convalescing, typical symptoms of acute gastric catarrh supervene—headache, nausea, foul breath, furred tongue, and great discomfort. Pain in the head and stomach are naturally severe, and exacerbate with approach of night. After several of such days, the ear begins to discharge and patient mends. The attention is directed to the ears, and great tenderness over the mastoid and tragus are found. The case may now progress favorably as regards pain, or the latter, after a short remission, may again become severe, and we then have a regular mastoiditis. As to the treatment, I need hardly say that when this is directed to the ear, the gastric symptoms promptly give way to medicines which were before powerless. The usual treatment for acute otitis media is to be followed. I should call attention, however, to careful syringing. The all-rubber bulb syringe is far preferable to the piston syringe. I have also found hydrogen dioxide of great help in cleansing the ear, as it gets into portions of the tympanic cavity, unattainable by syringing, unless you use the Hartman's cannula. In mastoiditis, I make use of cold applications or an ointment of belladonna, camphor, and mercury, and only use Wilde's incision when the inflammation does not succumb to these remedies.

Progress of Medicine.

OBSTETRICS

IN CHARGE OF

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ASSISTED BY

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PHENOCOLL IN PREGNANT WOMEN.

M. Titone, of Palermo (*Rif. Med.*, November 24, 1894), in view of the well-known ecbolic action of quinine, was led to try phenocoll in pregnant women suffering from malaria. The results were such as to satisfy him that while the drug is efficient as a remedy for malaria, it has no action on the uterus. He gave it in doses of $1\frac{1}{2}$ gramme, divided into four cachets, to be taken according to the Roman method, that is to say five, four, three, and two hours before a febrile paroxysm is due. The drug was given in this way till the attacks ceased, and in all the cases pregnancy went on to term without any of the uterine contractions, foetal movements, or slight hæmorrhages due to partial detachment of the placenta, such as are observed when quinine is administered to pregnant women. The author gives details of four illustrative cases, but he has used the drug in many more with equally beneficial results.—*British Medical Journal*.

DEATH FROM AND AFTER POST-PARTUM HÆMORRHAGE.

Tarnier (*Journal des Sages Femmes*, February 1, 1895) teaches that flooding after the application of the forceps must always be expected, since the instrument is usually employed because of uterine inertia, a source of hæmorrhage. The danger comes when the placenta is expelled. Tarnier, when called to apply the forceps for a colleague in private, used to leave before the delivery of the placenta. In consequence, he was very often called back. He makes these observations in respect to a robust woman who suffered from uterine inertia, and was delivered by forceps. There

was considerable flooding, but not so much as to lead to expectation of bad results. The patient went to sleep, but awoke a few hours later, and complained that she was suffocating. There had been no fresh hæmorrhage. She very soon died. At the post-mortem examination, miliary tubercle was found disseminated in abundance over the lungs, pleura, liver, and spleen. There was no evidence of insufficient blood in the system, no embolism, and no blood retained in the uterine cavity. The previous flooding, quite insufficient to harm a sound constitution, proved enough to kill this patient. Yet, externally, she looked healthy. We must be slow, says Tarnier, to find fault with a colleague for losing a patient after flooding. Had the above case occurred in private, and no necropsy held, the obstetrician would certainly have incurred more blame than he deserved.—*British Medical Journal*.

THE MANAGEMENT OF LABOR COMPLICATED BY HEART DISEASE.

It appears from a statistical study of labor in women with heart disease that the mortality is very high. There are some writers who place it at 50 per cent. But this is not my experience, nor is it the experience of some of my friends in active practice to whom I have spoken on the subject. It has been my fortune to see a number of these cases, and among them some of the severest type, several of them with a fatal issue within six months after confinement, but so far I have been lucky enough not to lose a parturient or puerperal patient from this complication. I recall one woman with valvular disease—both insufficiency and stenosis of the left auriculo-ventricular orifice—who sat bolt upright in bed, day and night, for weeks before delivery, with labored breathing and with a face as blue as indigo; another patient with congenital heart disease of both mitral and tricuspid valves, a primipara at the age of 44, with advanced kidney disease to boot; a third with disease of the aortic orifice and an enormous aneurism of the arch of the aorta; a fourth with mitral disease of long standing, albuminuria, profound anæmia, and an exceedingly rapid, weak pulse; and a number of other cases not so striking, of which I have unfortunately preserved no exact record. Some of these women caused me the greatest anxiety, and I cannot help thinking that their recovery was due to a treatment sound in principle and carried out with sufficient energy and attention to details. The management of these cases which has proved successful in my hands so far, and to which I shall adhere as long as it yields good results, may be briefly outlined as follows:

In addition to the care every pregnant woman should receive in the matters of diet, regulation of the bowels, exposure to cold, and limitation of exercise, etc., the pregnant woman with heart disease should have iron

and strychnia; and one of the heart tonics, digitalis or strophanthus, should be administered in larger doses than would be given to the same patient were she not pregnant.

The urine should be examined more frequently and more critically than it usually is in pregnancy.

Pregnancy, as a rule, should be terminated prematurely. This not only secures an easier labor, but it avoids the strain upon the heart that increases with every day in the last month of gestation.

Finally, when labor begins, digitalis and strychnia should be administered in large doses hypodermatically until the os is the size of a dollar; then, in case of head-first labors, forceps should be applied and the child extracted as rapidly as possible, without regard to the integrity of the maternal tissues and without anæsthesia. In several cases I have deeply incised the cervix on all four sides to facilitate delivery.

This plan is of double advantage to the woman. It shortens the labor and saves her all the fatigue of voluntary muscular effort in the second stage, and it insures a hæmorrhage from lacerations along the birth canal when the child is born—the best safeguard against engorgement of the lungs and overstrain of the heart after childbirth.

Meanwhile, there should be placed in easy reach a hypodermatic syringe charged with nitroglycerin solution and some pearls of nitrate of amy, the quickest-acting stimulants at our command; and when the placenta is expressed no ergot should be given, nor should other means be taken to prevent post-partum bleeding, which, within bounds, should rather be encouraged.

As soon as practicable, a large pad above the umbilicus and a tight binder should be applied to compensate for the sudden diminution of intra-abdominal pressure.—*Barton Cooke Hirst, M.D., in American Journal of Obstetrics.*

PÆDIATRICS AND ORTHOPÆDICS

IN CHARGE OF

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THE TREATMENT OF EMPYEMA IN CHILDREN, BASED ON AN ANALYSIS OF EIGHTY-SIX CASES.

In *Archives of Pediatrics* for March, 1895, Edmund Cantley, M.D., publishes an analysis of eighty-six cases of empyema in children, occurring in St. Bartholomew's Hospital during the last ten years. The average age was four and a half years. Total mortality, 14, or 16.6 per cent.

The cases are divided into four groups, according to the treatment adopted.

	TREATMENT.	NO. OF CASES.	RECOVERED.	DIED.	MORTALITY.
I.	Nil	4	3	1	25%
II.	Aspiration	12	12	0	0
III.	Incision	35	28	7	20%
IV.	Resection	33	27	6	18.2

Conclusions and remarks :

(1) An empyema may be reabsorbed, especially if the pneumococcus is the originating cause.

It is, however, bad treatment to leave the case to nature, on account of the risk of rupture internally through the lung, or externally through the chest wall.

Whenever pus is diagnosed in the pleural cavity it should be evacuated.

(2) The objects of treatment are (a) to remove the pus, (b) to prevent reaccumulation, (c) to procure complete re-expansion of the lung, (d) to leave behind no deformity.

(3) Aspiration is at best a temporary and unreliable mode of treatment. A thick fluid blocks the cannula. Even in the most formidable cases some fluid is sure to be left behind, and will act as a source of irritation. If carried out too rapidly there is danger of rupture of the lung, and consequent pyo-pneumothorax, or of œdema of both lungs. It is, however, useful in cases of urgency, in cases of sero-purulent effusions, and as a temporary expedient in double effusions. Cases recover completely under this mode of treatment, but the risks are out of proportion to the advantages gained. If used, siphon aspiration is better than the use of the bottle.

(4) Simple incision and drainage is better than resection of a rib, or part of a rib. It is very exceptiona in children not to be able to drain efficiently through an intercostal space. Recovery does not appear to be more rapid under treatment by resection, and the shock is more severe. Certainly in the present series of cases the mortality from resection in children under three is enormous, as compared with the mortality among those treated by simple incision.

(5) When the medullar cavity of a rib is laid open there is greater danger of pyæmia.

(6) The risk of hæmorrhage is very small under either mode of treatment.

(7) It is unnecessary to explore the cavity and break down adhesions. In some cases it may be distinctly injurious.

(8) The chances of a radical cure are certainly no better under treatment by resection. In the present series four were sent out with a sinus, as compared with one of those treated by simple incision.

(9) There is greater liability to imperfect expansion of the lung and contraction of the side in cases treated by aspiration or resection, or left to nature, than if incision and drainage be adopted.

(10) Resection should be reserved for the rare cases in which the ribs are closely approximated, or as a secondary means to ensure closure of the sinus. It may be used as an accessory measure if drainage is found insufficient, subsequent to the simple operation.

(11) The tube should not be more than two inches long; it is not necessary to insert a long tube, as the mode of cure is not by granulation from the bottom, but by expansion of the lung, ascent of the diaphragm, and contraction of the side. It should be removed as soon as the discharge becomes scanty and serous, sometimes even as early as the third day; otherwise it acts as a source of irritation, keeping up the discharge, prolonging the illness, and militating against a successful cure.

HYGIENE AND PUBLIC HEALTH

IN CHARGE OF

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AND

E. HERBERT ADAMS, M.D., D.D.S.,

COLONY FOR EPILEPTICS.

Pennsylvania is asking her legislature to appropriate \$300,000 for the establishment of a colony for epileptics.—*North American Medical Review.*

SMALLPOX.

From the 22nd of November last to the 5th of February, 1895, there were reported to the Supervising Surgeon-General of the Marine Hospital Service at Washington 1,256 cases of smallpox in the United States, and 350 deaths, nearly 28 per cent. The reports came from the following States: Connecticut, District of Columbia, Illinois, Indiana, Michigan, Missouri, New Jersey, New York, Ohio, Pennsylvania, Vermont, Virginia, and Wisconsin. This report does not mean that all the States not here named were free from smallpox.

HYGIENIC VALUE OF PERFUMES.

Dr. Andres, of Philadelphia, a few years ago made the interesting discovery that the ozone in the atmosphere, the element which is the great purifier, was mainly supplied from blooming flowers, and for this reason blooming plants were healthful in dwelling houses, as well as attractive. Some interesting experiments with the odors of flowers have been made in the old world, and it is found that many species of microbes are easily destroyed by various odors. The odor of cloves has been known to destroy these minute creatures in twenty-five minutes ; cinnamon will kill some species in twelve minutes ; thyme, in thirty-five. In forty-five minutes the common wild verbena is found effective, while the odor of some

geranium flowers has destroyed various forms of microbes in fifty minutes. The essence of cinnamon is said to destroy the typhoid fever microbe in twelve minutes, and is recorded as the most effective of all odors as an antiseptic. It is now believed that flowers which are found in Egyptian mummies were placed there more for their antiseptic properties than as mere ornaments or elements in sentimental work.—*Physician and Surgeon*.

VENEREAL DISEASES IN THE ENGLISH NAVY.

Judging by the report of the Director-General of the Medical Department of the English Navy for the past year, venereal disease is playing sad havoc in the service. There occurred during the year no less than 9,321 cases of syphilis and gonorrhœa; 3,106 of primary syphilis; 1,593 of secondary syphilis; and 4,622 of gonorrhœa and its sequelæ. The number invalided for these diseases was 198, and there were five deaths. 4,923 of the cases came under observation at the home station. The ratio of primary syphilitic patients amounted to 51.66 per 1,000, as compared with 74.28 in the previous year. The time that the venereal patients were incapacitated from duty amounted in the aggregate to no less than 282,171 working days. Apart from its moral aspect, the subject is one demanding the most profound consideration. With the figures given before us, it is difficult to understand why less attention should be directed to the prevention of venereal diseases than is given to that of transmissible diseases.—*Medical News*.

DIMINISHING BIRTH RATES.

During recent years the birth rate per thousand population has been diminishing in proportion to population in most civilized countries, as will be seen by the following table:

COUNTRY.	1880.	1890.
United States.....	36.0	30.7
England and Wales.....	34.2	30.2
Scotland.....	33.6	30.3
Ireland.....	24.7	22.3
France.....	24.5	21.8
Belgium.....	31.1	28.7
German Empire.....	37.6	34.7
Austria.....	38.0	36.7
Switzerland.....	29.6	26.6
Denmark.....	31.8	30.6
Norway.....	30.7	30.0
Netherlands.....	35.5	32.9

—*Medical Record*.

THE MEDICAL CARE OF CHILDREN.

In his presidential address at the opening meeting of the Dublin University Biological Association, Mr. Henry C. Drury spoke of the importance of this subject, as manifested by the great infant mortality in large towns and cities. Taking for comparison the general mortality of the population at the high figure of 25 per 1,000, the mortality among infants in the first year of life reaches the fearful figure of 200 in every 1,000 born (Henoch). No doubt much of this is quite inevitable, but no doubt, also, an enormous proportion is due to preventable causes. Two principal factors influence this great death-roll: one, the natural development of the child's body, tending to evoke pathological changes in the nervous system, glands, skeleton, etc.; the other, the condition of the child's surroundings—want of care, foul air, bad feeding, cold, hunger, inherited diseases, illegitimacy. The author believes, however, that much of this mortality is preventable by judicious medical treatment, and by the better education of mothers and daughters.—*Western Medical Reporter*.

THE WEATHER AND THE GRIP.

Humidity seems to be the important element in producing or aggravating the disease, for there is a corresponding increase of deaths with increasing humidity; but the fatality is most marked when the humidity is at its maximum and there is a sudden fall of temperature, which is clearly shown on April 21, when the death-rate was highest, with a record of over 250 in twenty-four hours. The death-rate is also high on the day following a sudden fall in temperature, as shown on April 1 and 30.

All through the epidemic the chart shows an increasing death-rate, with high or increasing humidity. The higher the humidity and the more sudden the fall of temperature, the greater the number of deaths. And it is also observed that when the temperature and humidity drop at the same time there is a sudden decrease in the death-rate; this will be seen on March 26, April 3, 4, 5, and 26.

It does not follow that excessively cold weather increases the death-rate unless there be a high humidity. On the other hand, it is clearly shown that with cold weather and low humidity the death-rate is greatly reduced.—*Weather Bureau of New York*.

BOVINE TUBERCULOSIS.

Considerable activity is being manifested by the public health authorities in some of the Eastern States in renewed attempts to exterminate tuberculosis in cattle. In New York, recently, thirty tuberculous cows

belonging to a choice herd were killed at Elmira, but criticism is made that the commissioners take such action only upon the request of owners—usually of costly cattle for the protection of the remainder—and that no systematic inspection is made of the common dairy herds, which furnish the milk supply, and which are generally kept under conditions that favor the development of the disease. In Massachusetts such a systematic inspection has been begun, with the avowed purpose of examining every cow, bull, and calf, beginning at Cape Cod and extending westward until the whole state has been covered; the tuberculin test is employed, and every animal that shows the characteristic reaction is to be slaughtered forthwith. On the recommendation of its sanitary committee the Philadelphia City Board of Health has also adopted the tuberculin test, and, after sixty days' notice, any milk producer supplying the city who fails to furnish a clean bill of health for his dairy—based upon the results of this test—will be liable to have his milk supply rejected as suspicious and its sale prohibited.—*The Journal of the American Medical Association.*

Editorials.

THE CLIMATE OF MUSKOKA AND TUBERCULOSIS.

AN article written by Dr. Graham appears in our present number giving an account of a visit to Saranac Lake Sanitarium, and advocating the claims of the Muskoka region as well fitted, both in situation and climate, for the cure of consumption.

We are already quite convinced that in the summer months as great a measure of success can be obtained in Muskoka in the cure of tuberculosis as in any climate of the world.

From the experience of the Saranac Lake Sanitarium in the winter time, we hope that in Muskoka results will be obtained in a properly managed sanitarium in the winter which will surpass those already observed in the summer.

THE PROPOSED CONSUMPTIVE SANITARIUM.

THE establishment of a Dominion sanitarium for the treatment of persons suffering from phthisis has been recommended by many people, professional and otherwise, during the past few months. Many western towns in the neighborhood of the Rocky Mountains have been mentioned as suitable places for such an institution, including Kamloops, Medicine Hat, Banff, Calgary, Fort McLeod, etc. Dr. Furrer, formerly of Toronto, who has lived in Kamloops for a number of years, strongly advises the selection of that town, as he considers that Kamloops has by far the best climate along the line of the C.P.R., and he quotes the opinion of many well-known authors to the same effect. Dr. Lambert, of the same town, supports Dr. Furrer in a very enthusiastic way, and contends that Kamloops has a climate which is more suitable for consumptives than Egypt, or any place on the Mediterranean, or any district of the American continent. It is, of course, not pretended that persons in the last stages of phthisis will derive any special benefit by residence in Kamloops but it is positively stated that many patients, undoubtedly suffering from incipient phthisis, have been practically cured after going to Kamloops, and many others in the later stages have had their lives much prolonged.

THE ONTARIO MEDICAL COUNCIL.

THE recent meeting of the Council was, for many reasons, a very important one. A certain number of members of the "Defence Association" had, for the first time, an opportunity of presenting their views on *the floor of the house*. During the last three years we have had a curious condition of things in medical politics in Ontario. There have been two distinct parties—the ins and the outs—the Council and the Defence Association. In the olden days of the Council's history there were various diversions and division of opinions, and occasionally stormy times. The attacks of the outs gradually consolidated the ins, until the Council recently became the most happy family that we have seen in modern times. In their hours of trial they hung on each other's necks in the most loving style, and their occasional "love feasts" were touching beyond description. At the same time, the Defence body were a decided unit in holding the opinion that every act of the Council was wrong. At present we scarcely know how to classify the various parties which exist; but the following will probably be nearly correct: Old Guard, Defence men, Independents.

It would be very difficult for an ordinary onlooker to get up within himself any extraordinary amount of enthusiasm over the proceedings of the June meeting; but we are not inclined to endorse all the adverse criticisms which it has called forth. The first day's work showed that there was no diminution of the bitter personal animosity existing between the Old Guard and the Defence men. The former, with a singular want of tact and good judgment, deliberately endeavored to squeeze the prominent Defence men out of positions on the main committees. It was so foolish and impolitic to keep such men as Drs. Sangster, McLaughlin, and Armour off the important committees, and the Independents showed such a decided disinclination to support the effort, that the Old Guard yielded—but in a most awkward sort of a style. The Independents, together with a few sensible and moderate men from each of the other parties, are evidently going to be the salt of the Council in the future.

Although we agree with those who deplore the methods employed in some of the debates, the unbusiness-like manner of carrying on the regular work of the session, the enormous waste of time involved in long and frequently very empty speeches, the fisticuff threats of certain muscular and fiery orators, and a few other trifling eccentricities which might well have been dispensed with, we think that, on the whole, much good work was accomplished. There is much new good blood. There is likely to be much less wirepulling in the future than there has been in the past. Many important questions were well threshed out. The radical reformers

who were going to revolutionize everything, and show how the Council could be run on nothing, failed to fully materialize ; but, at the same time, their efforts brought forth certain investigations which were sadly needed. We like much the disposition which was shown by so many to totally ignore partyism, and carefully study every subject which came up from a thoroughly independent standpoint.

OFFICERS OF THE COUNCIL.

ACCORDING to an unwritten rule of the Ontario Medical Council, a one-year term for the presidency and vice-presidency has become the recognized custom. Under exceptional circumstances this rule has not been observed, but any deviation from this custom is rare. It is exceedingly important that the president should, at least, know the ordinary rules of parliamentary procedure, and be prompt and firm in giving and adhering to his rulings on points of order. Too much time was wasted in discussions on these matters at the recent meeting. The president was sadly handicapped by the antagonism which existed between certain parties, which seemed to make certain of the members very captious in their manners, and hard to manage. On the whole, the presidents of the Council in the past have done their work conscientiously and well, barring certain errors of judgment which have sometimes been manifested.

The salaried officers of the Council, who, as a matter of fact, are supposed to retain their positions during good behavior, or until they resign, are, perhaps, of still more importance. Probably, all things considered, the most important officer in the Council is the registrar. During the last three or four years, there has been an occasional whisper in the air to the effect that Dr. Pyne would either be removed or have his salary reduced in the near future. Judging from the proceedings of the recent meeting, Dr. Pyne commands the respect and confidence of the vast majority of the members of the Council. We have no hesitation in saying that we believe he is thoroughly entitled to such respect and confidence ; and, we may add, we think it would be exceedingly difficult, if not impossible, to put another man in his position who would equally well fulfil all the requirements at the present juncture. As to the other question referred to, we have only to say—if you have a good officer, you had better give him a decent salary.

The recent prolonged illness of Dr. W. T. Aikins, the treasurer, has caused deep sadness among his numerous friends in all parts of Canada. Recent reports, however, indicate a great improvement, with good pros-

pects of complete restoration to health in the near future. We are exceedingly rejoiced at the kind treatment that was accorded to him at the recent meeting, and, in connection therewith, have much pleasure in quoting portions of the words of Dr. McLaughlin, who seconded the motion for his reappointment, which was moved by Dr. Britton: "I know Dr. Aikins better personally, perhaps, than any man in this room; I lived with him, have been his student, and an intimate friend and companion for the last thirty-five years, and I know Dr. Aikins to be a man utterly beyond reproach and beyond suspicion; and a more conscientious officer this Council never had and never will have. I thoroughly concur in the motion that has been made; I am anxious to see Dr. Aikins treasurer again; he has been treasurer since the inception of this Council, and I hope he will remain treasurer as long as he is able to discharge the duties of the office."

THE BRITISH MEDICAL ASSOCIATION.

IT is expected that the coming meeting of the British Medical Association will be the largest that the society has known. It will be held in London, Tuesday, Wednesday, Thursday, and Friday, July 30, 31, and August 1st and 2nd. The address in medicine will be delivered by Sir William Broadbent; the address in surgery, by Mr. Jonathan Hutchinson; the address in physiology, by Dr. Edward Albert Schafer. The scientific business of the meeting will be conducted in fifteen sections.

In addition to the various papers to be presented, the following subjects have been selected for discussion: Diphtheria and its treatment by the antitoxin; acute lobar or croupous pneumonia; acute rheumatism; diagnosis and treatment of fractures of the upper third of the femur; surgical treatment of cysts, etc., of the thyroid gland and accessory thyroids; anti-septic precautions in private midwifery practice; early diagnosis of malignant disease of the uterus, and the treatment by partial or total excision; regulation of the slaughter of animals for human food; hospital isolation, house quarantine and disinfection; treatment of melancholia; insanity in relation to criminal responsibility; epilepsy, and its relation to insanity; mechanics of the cardiac cycle; art in its relation to anatomy; development and structure of the placenta; topographical anatomy of the abdomen; neuritis; vaccinia and variola; pernicious anæmia; lymphadenoma; rare cases of recurrent ophthalmia; diagnosis of orbital growths; revision of the Pharmacopœia; etiology of mucous polypi of the nose; infectious nature of lacunar tonsillitis; early radical operation in malignant disease of the larynx; pruritus; diet in diseases of the skin; intra-professional etiquette; advertising; unqualified assistants etc., etc.

Correspondence.

To the Editor of THE CANADIAN PRACTITIONER :

DEAR SIR,—After some years' absence from your city, it is somewhat gratifying to note that Toronto has not been unmindful of opportunities, and has kept in the front rank of all that pertains to thorough medical education. While lacking the almost inexhaustible material of some of the denser centres of population, the amount of clinical material at the disposal of the various teaching faculties is more than a little surprising to those whose knowledge of Toronto dates back some ten or twelve years. In a professional sense we may speak of the new Toronto, as compared with the restricted advantages, scarcity of material, and necessarily limited practical teaching which characterized that period—limitations which compelled many to supplement their course by practical work elsewhere. But with the advantages of to-day no student (except he contemplate special work) need seek outside of Toronto that information required to thoroughly fit him for professional life. But while we view these achievements with patriotic pride, is there not an additional step to be taken by placing these facilities before those who have hitherto been deprived of them? I refer to the establishing by the faculties of the four principal city hospitals of a short post-graduate course. This suggestion is the result of conversations which I have had with medical men in different parts of the province during my recent visit to Ontario. There exists a class of practitioners who, while they regret the deficiencies of their early training, are alive to the appreciation of modern advancement, but are so environed by domestic or financial conditions that even a six weeks' course in New York is beyond the limit of the possible. To this class a short practical course in Toronto, where education, business, and recreation might hold high carnival, would recommend itself. These men do not desire to become experts in lens extraction or hysterectomy, but to witness such work as comes under the rôle of the general practitioner, and to enable them, when face to face with the gravest lesions—which are necessarily first seen by the general practitioner—to at least give the patient an aseptic wound (if any), and a reasonable expectation of life, even though manipulative skill and appliances be deficient.

So far as could be gathered from those practitioners with whom this subject was discussed, the desire is for a course eminently practical, without spread-eagleism or oratorical display, and not to exceed two weeks in duration. The subjects to receive special attention—modern surgery, with stress laid upon asepticism; methods of diagnosis, including bacteriological examination of sputum and exudations; the use of laryngoscope and ophthalmoscope. The evenings might be spent in social medical conference, or in discussing matters pertaining to public health, not forgetting the social diversions which the various public bodies of our capital might see fit to offer.

The case is stated; I leave to those more qualified the consideration in detail.

ERNEST M. HALL.

Vancouver, B.C., June 4, 1895.

To the Editor of THE CANADIAN PRACTITIONER:

DEAR SIR,—A copy of the accompanying circular has been sent to every manufacturer of electro-therapeutic apparatus whose address is known.

The American Electro-Therapeutic Association will meet in Toronto on September 3rd, 1895, and its Standing Committee on Electrodes is endeavoring to secure before that date the universal adoption of uniform connections, a standard gauge of screw throughout construction, and efficient, durable, simple, and interchangeable electrodes.

In matters of such importance to the ever-increasing number of practitioners who employ electricity, your hearty co-operation is earnestly requested.

CHARLES R. DICKSON, Chairman.

DEAR SIR,—The above committee of our association has been directed to write you, along with the other manufacturers of electrical apparatus, to engage your co-operation in securing the general adoption of:

I. Uniform connections and interchangeable electrodes:

- (1) Universal rheophore tip.
- (2) Universal aperture for same.
- (3) Universal attachment for electrolysis needles, etc.

II. Standard gauge of screw throughout construction, should screws be required.

N.B.—The adoption of a "society screw" for microscopes has been of mutual advantage to the makers of these instruments and their customers. It has led to increased sale, while it has also facilitated repair. The same advantages would follow the adoption of the above recommendation.

The committee was also instructed to request manufacturers to submit to it the various forms of electrodes now on the market, to test the same, and to report at the meeting of the society to be held in Toronto during September, 1895. Will you also kindly send the usual circulars, describing the special advantages of your instruments, which may be forwarded to the following members of the committee:

Gynæcological Electrodes, Dr. Lucy Hall Brown, 158 Montague street, Brooklyn, N.Y.

Neurological Electrodes, Dr. C. Eugene Riggs, The Endicott Arcade Building, St. Paul, Minn.

Surgical Electrodes and others not specified, with samples of rheophore tips, sockets, and other connections, Dr. Charles R. Dickson, 159 Bloor Street East, Toronto, Canada.

Trusting to hear from you at your earliest convenience,

I am, yours truly,

CHARLES R. DICKSON, Chairman.

The Ontario Medical Council.

TWENTY-NINTH ANNUAL SESSION.

THE twenty-ninth session of the Council of the College of Physicians and Surgeons of Ontario was opened Tuesday, June 11, at 2 p.m., in the Medical Council building. This was the first meeting of the council elected in 1894.

Dr. R. A. Pyne, registrar, called the meeting to order. These members were present: Doctors Armour, Barrick, Bray, Britton, Brock, Campbell, Dickson, Emory, Fowler, Geikie, Graham, Hanly, Harris, Henderson, Henry, Logan, Luton, Machell, Moore, Moorehouse, McLaughlin, Reddick, Rogers, Roome, Rosebrugh, Sangster, Shaw, Thorburn, Thornton, and Williams.

The first business was the election of officers. Dr. W. T. Harris, Brantford, was elected president, Dr. A. F. Rogers, Ottawa, vice-president, both without opposition. The next office to be filled was that of registrar. Dr. Bray proposed the name of Dr. R. A. Pyne. Dr. Armour moved in amendment that the matter be allowed to stand. He said that there would be a strong attempt made, and, he trusted, a successful one, to have salaries reduced. It would not be fair to appoint Dr. Pyne at this stage, and, after he had accepted the position, reduce his salary. The president ruled the amendment out of order on the ground that the constitution provided that the officers should be elected at this stage. A warm discussion followed, after which the amendment was withdrawn. The main motion was then put. All the members but two voted for Dr. Pyne's reappointment. Dr. W. T. Aikins was elected treasurer. Mr. B. B. Osler, Q.C., was elected solicitor. Two names were proposed for the position of stenographer—Mr. Alex. Downey and Dr. J. N. E. Brown. Mr. Downey was elected on a vote of 22 to 8.

Dr. Armour moved that Doctors Williams, Reddick, Roome, Barrick, Britton, Fowler, Logan, Sangster, and the mover constitute a committee to strike the standing committees.

Dr. Bray moved in amendment that these names be substituted: Doctors Logan, Moore, Dickson, Geikie, Roome, Henry, Moorehouse, Brock

Fowler, Thorburn, Williams, and the mover. The amendment was carried, 21 to 8.

After a delay of an hour, the committee reported that they had struck the standing committees as follows :

Registration Committee—Drs. Barrick, Campbell, Dickson, Rosebrugh, and Shaw.

Rules and Regulations Committee—Drs. Emory, Hanly, Luton, Roome, and Sangster.

Finance—Drs. Bray, Brock, Henderson, Machell, and Thorburn.

Printing—Drs. Emory, Henry, Luton, Moore, and Reddick.

Education—Drs. Bray, Britton, Fowler, Graham, Geikie, Logan, Moore, Moorehouse, and Williams.

Property—Drs. Barrick, Henderson, Machell, Thorburn, and Thornton.

Complaints—Drs. Armour, Henry, McLaughlin, Moorehouse, and Sangster.

Dr. Sangster opposed the adoption of the report. He said that if such a report was carried it would simply mean a declaration of war against those gentlemen who had been elected as Defence members. Not one of them had been appointed to an important committee. If the council intended to rush such a report through they might do so, but the profession would know how to resent such an act. After considerable discussion the motion was withdrawn, and the council went into committee of the whole to consider each committee separately. Dr. Sangster drew the attention of the council to the fact that the constitution provided that there should be seven members on the Committee of Registration. The striking committee had nominated but five members. He wanted to know why the full complement had not been appointed on this committee. No one appeared able to answer the question. The names of Dr. Hanly and Roome were then added to the committee.

Dr. Sangster moved that Dr. Armour's name be substituted for that of Dr. Thorburn's on the Finance Committee. Dr. McLaughlin said that it was most important that Dr. Armour should have a place on this committee. He had been making a study of the finances of the council, and had certain reforms he wished to press. Dr. Machell offered to withdraw in Dr. Armour's favor, and leave Dr. Thorburn on the committee. Dr. Machell's suggestion was adopted.

Dr. McLaughlin moved that the name of Dr. Sangster be placed on the Education Committee.

Dr. Rogers said that he had never known a new member to be appointed to this committee.

Dr. Williams offered to withdraw in favor of Dr. Sangster.

Dr. Bray said that he had been on the committee since he had been a member of the council. It had been said that he was opposed to certain members of the council and their policy. He wished them to understand that he held views of his own which were probably as strong as those opposed to him, but in order that the council should be united he wished to hold out the olive branch, and though he had been on the Education Committee for fifteen years, and had always felt a great interest in the working of this committee, he would move that his name be struck out and that of Dr. Sangster substituted. The motion carried, after which Dr. Bray, amid applause, walked down the aisle and shook hands with Dr. Sangster.

The Committee on Rules and Regulations was changed. It stands—Drs. Emory, Armour, Roome, and Reddick.

Dr. Bray was placed on the Committee of Complaints in place of Dr. Sangster. The other committees were allowed to stand. The report, as amended in committee of the whole, was then adopted by the council.

NOTICES OF MOTION.

Dr. Williams gave notice of motion that at the Thursday morning session the council should resolve itself into committee of the whole to consider the subject of medical tariff.

Dr. Armour gave notice of motion that he will at the next meeting of the council move that a committee be appointed to investigate the financial resources and expenditure of the council, and to report the results, recommending such means as may be deemed desirable to bring the expenditure within the revenue.

Dr. Thornton gave notice of motion that he will move to-day that this building, being altogether beyond the requirements of the council, and the limitations prescribed by the Ontario Medical Act, and being also annually and increasingly a source of great financial loss to the college, it be at once offered for sale by competitive tender, and that in the event of a sale being effected an effort be made to lease from the purchaser for a lengthened period the rooms occupied at present by the council at a reasonable income.

Dr. Sangster gave notice of motion that the matriculation requirements of this council now in force shall cease to be on and after the 1st of October, 1896, subsequently to which every person desirous of being received by this council as a matriculant shall present to the registrar an official certificate of having passed the departmental senior leaving examination.

Dr. Bray gave notice that he will move that the first order of business at the afternoon session of this council on Thursday be the consideration of the report of the Discipline Committee *re* one E. A. A. B. Rose.

Dr. Sangster gave notice of motion to amend by-law No. 22, referring to the duties of the registrar in keeping the register correctly.

WEDNESDAY, JUNE 12.

The registrar read the annual report of the treasurer, which stated that the receipts for the year ending June 11 had been \$45,201, and the expenditures for the same period, \$44,186. The report was referred to the Finance Committee.

AN INVESTIGATION.

Dr. Armour moved that a committee be appointed to investigate the financial resources and expenditures of the council, and to report the results, recommending such means as may be deemed desirable to bring the expenditure within the revenue. In moving the resolution, he said that the receipts of the council were chiefly obtained from registration, examination fees, and fines. During the past three years the revenue collected from these sources had amounted to \$40,981, or about \$13,660 per year. There was reason to believe that this revenue would continue. He thought it would be advisable to reduce the annual expenditure so as to bring it well within this amount. The chief items of expenditure in the past had been fees to examiners, salaries to officers, printing charges, and real estate charges. There was room for lessening each of these charges, but if the printing and real estate expenditures were brought within reasonable bounds, such as the necessities of the service required, the need for reducing the other items might be obviated. The receipts from the sources mentioned had averaged \$13,660. The average expenditure for the same period, omitting the charges on the building and real estate, had only been \$10,960, leaving an annual surplus, a moiety of which should supply the necessary building accommodation. Notwithstanding this, the total expenditure had greatly exceeded the total receipts. He wished the matter thoroughly threshed out.

Dr. Britton moved, in amendment, that the matter be referred to the Finance Committee.

Dr. Roome raised a point of order. He held that the original motion would have to be voted upon, and, if carried, then the matter might go on to the Finance Committee, but not otherwise.

President Harris ruled the amendment in order. The amendment carried.

MATRICULATION.

Dr. Sangster moved this resolution: "That the matriculation requirements of this council now in force shall cease to be on and after the 1st of October, 1896, subsequently to which every person desirous of being received by this council as a matriculant shall present to the registrar an

official certificate of having passed the departmental senior leaving examination." He said that the profession was overcrowded in Ontario, and that unless drastic measures were taken immediately the profession would be brought into disrepute, and would soon be ruined. The great majority of members of the profession in Ontario were not more than making a bare living at the present time, while year after year hundreds of young men were being turned loose as full-fledged medical men. Something had to be done. If the present standard for qualifying was not raised within five years, the membership of the profession would be doubled. The public mind was ripe for a raising of the standard. The Local Legislature would second rather than oppose the scheme. He would like to see a degree in arts made necessary, although his resolution had not gone that far. He did not want the resolution sent on to a committee and then buried, as he understood certain resolutions had been dealt with in the past. Concluding, he said: "If this resolution is to be knifed, let it be done in open council and in broad daylight."

Dr. Campbell moved that the resolution should be referred to the Committee on Education. Carried.

RECIPROCITY IN MEDICINE.

Dr. Logan moved that in view of the general interest taken in the subject of Dominion medical registration by the medical profession of our country, this council recognizes the desirability of establishing Dominion medical registration so soon as the various provinces can comply with the conditions of the Ontario Medical Act.

Dr. Rogers seconded the motion. He said that it was a matter of regret that the medical men of Quebec had failed to have their law changed. Under their law graduates in medicine from certain medical colleges in Quebec were permitted to practise without any further examination. Under this state of affairs it would be impossible to have reciprocity.

Dr. Williams could see no reciprocity in the scheme proposed. Under the plan mentioned it was a case of Ontario dictating all terms. He thought that to constitute any reciprocity it would be necessary for medical men from all provinces to meet together and come to terms. It was absurd for Ontario to set up her standard and then pose as being very liberal when she asked the other provinces to come in and accept her terms.

Dr. Reddick would like to see Dominion registration, but he did not think the proposed resolution would bring it about. The Ontario Council must be prepared to give and take.

Dr. Rogers said that in 1893 representatives from all provinces had met at Ottawa and agreed that the standard for Dominion registration should be the Ontario Act. The representatives from Ontario had not held up a

club and made the demand. The decision was arrived at by agreement between all the representatives.

Dr. Bray said that at the meeting referred to the representatives from Manitoba and British Columbia had opposed reciprocity. They held that doctors were a drug on the market in Ontario, and that if there was reciprocity medical men from Ontario would overrun their territory.

Dr. Fowler said that the universities of Quebec would never consent to give up their present privileges. They now had the power to grant degrees in medicine, and would not give them up without a struggle. The colleges in Ontario were very sorry that they had given up their privileges in this respect. He thought that the only way to secure reciprocity would be by coming to some agreement with the universities.

Dr. Logan asked if the members were prepared to make any concessions to the other provinces. (Cries of "No, no.") Continuing, he said that they should in that case be prepared to defend their law and advocate it.

The motion was finally referred to the Registration Committee.

THE MEDICAL BUILDING.

Dr. Thornton moved that this building, being altogether beyond the requirements of the council and the limitations prescribed by the Ontario Medical Act, and being also annually and increasingly a source of great financial loss to the college, be at once offered for sale by competitive tender, and that in the event of a sale being effected an effort be made to lease from the purchaser for a lengthened period the rooms occupied at present by the council at a reasonable income. He said that in some of the constituencies this subject had received more consideration than in others. There was no denying the fact that there was a great deal of dissatisfaction throughout the country with matters as they stood. When the building was erected, all murmurs were stifled with the statement that it would prove a source of revenue, and that the profession would have a respectable home. In his address last year the president said that no member of the council had been defeated because he had voted for the construction of the building. The reason was that it was expected a revenue would be derived. No one would now deny that the building had been a source of very serious loss. There was a deficit of over \$20,000. He wished the members to look the matter calmly in the face. For the last year, after allowing \$2,000 for the use of the building by the council, there was yet a deficit of over \$5,000, and this deficit was constantly increasing. What did the council intend doing? In going into a property speculation the council had gone quite outside its duty. The members had no business to pose as real estate experts; that was not

their business. His constituents had demanded that he should bring the matter before the council. If the profession should be called upon at any future time to make good the deficit, he could promise that they would refuse to do it.

Dr. Thorburn thought the motion out of order. The matter should be left to the Finance Committee.

Dr. Williams said that there might be more than one opinion as to the wisdom that governed when it was decided to erect the building. One thing was certain. The men who composed the council at the time acted as they thought best. Dr. Armour had moved for a full investigation as to the financial standing of the council, and until that committee reported he thought it would not be well to discuss such a subject as the selling of the building. He moved that the matter should be referred to the Finance Committee for a report.

Dr. Geikie said there was a bright side to the question. Hard times were over; business was brightening up, and the building would prove a good investment yet.

Dr. McLaughlin said that the building had been erected for speculative purposes, in direct violation of the Ontario Medical Act. He quoted from the Act to show that the council were prohibited from purchasing property. Calamity after calamity had befallen the council since the building had gone up. In 1889 there was a deficit of \$3,076; in 1890 it was \$2,428; in 1891, \$2,726; in 1892, \$3,412; in 1893, \$2,872; in 1894, \$3,531; and last year, worst of all, \$4,203. He said the matter should be dealt with in a business-like manner, and the building sold.

Dr. Geikie said that if the membership fees had been paid the deficits would have been greatly decreased.

The matter was then referred to the Finance Committee.

THE EXPENSES.

Dr. Sangster moved that by-law No. 22 be amended so as to provide that the expenses to be paid members of the council shall not exceed one first-class railroad ticket and \$10 a day. He said that the members could not proceed to economize with good grace unless they proceeded to cut down their own emoluments. In addition to drawing their \$10 per day and their railway expenses, members were at present drawing \$3.50 per day for hotel expenses. He would like to see all indemnity dropped for a few years until the finances of the council were in a better condition. Members were in the habit of charging for full-fare tickets both ways, instead of charging only for a return ticket. He thought all members should be above such small matters.

President Harris ruled the motion out of order, and refused permission for further discussion.

NOTICES OF MOTION.

These notices of motion were given :

Dr Henry : That the Discipline Committee be requested to use their best efforts to have the law simplified by which offenders against the Medical Act can be dealt with, with a view to economy.

Dr. Henry : That the registration fee for matriculation in future be fixed at \$50, instead of \$20, as at present.

Dr. Henry : That in future all students be required to make a declaration before receiving their licenses to practice that they will not engage in lodge or contract work of any kind.

Dr. Brock : That the registrar report the names of all members in arrears, and the amount up to and including the year 1892.

Dr. Sangster : That he would introduce a by-law to amend by-law 22. The council then adjourned.

THURSDAY, JUNE 13.

Dr. Sangster introduced a by-law providing that members of the council shall not draw more than \$10 per day, and the cost of one first-class ticket to the place of residence.

Dr. Williams pointed out that if the by-law passed no provision would be made for members who had to travel by night in Pullman cars.

Dr. Roome said that the fairest method of dealing with the question would be to allow mileage.

Dr. Geikie suggested that it be added that members who lived at a distance should be allowed to take some refreshment on the way, and that they be not allowed to charge more than ten cents for the same. (Laughter.)

Dr. McLaughlin said that Dr. Geikie was the last man who should talk of ten-cent lunches, since he had been in the habit in the past of taking his porridge at home, and charging \$3.50 a day for it. (Laughter.)

Dr. Sangster opposed the mileage system. There were medical men who were members of parliament, and who travelled on passes. This he thought degrading. The mileage system would double the cost of expenses.

Dr. Roome said that he was a member of parliament, and that he had passes upon some roads. Whether or not he travelled to the meetings of the Medical Council on these passes was nobody's business. He did not think that the medical profession of Canada would like to see their representatives travel as emigrants. (Hear, hear.)

Dr. Sangster said that the reason he had moved in the matter was that certain members in the past had drawn full allowance for more time than they had put in.

Dr. Rogers denied this statement, and called upon Dr. Sangster for proof.

Dr. Sangster read from the registrar's returns, alleging that Dr. Rogers had drawn full expenses upon several occasions for more days than he had served.

Dr. Williams thought that dirty linen should be washed outside the council chamber.

Dr. Armour thought the discussion perfectly in order. Dr. Rogers had challenged Dr. Sangster, and had received his answer.

At this point Dr. Rogers sprang to his feet, and said that he would settle the matter outside with Dr. Armour if he insisted in proceeding with the matter further. At this point the chairman stepped in and insisted that the discussion should stop. The matter was referred to a special committee.

MEDICAL CHARGES.

Dr. Williams moved that medical tariffs should be established upon a legal basis. He said that the section of the Act relating to tariff had been abrogated at the last session of parliament, and that at present medical men had no legal tariff. This had been brought about by the Patrons. The objection that had been raised by the Patrons was that medical men fixed their own fees. This had been abolished, and it was now for the council to prepare a scheme which would give them a legal tariff. The point was that such tariff would have to be submitted to some unprejudiced outside body, such as the County Court, the Governor in Council, or other body. He was of the opinion that the Medical Council would be the proper body to fix the tariff, but, owing to the cry which had been raised against the profession by the Patron body in the country, he did not think this practicable at present. He thought it might be advisable for a year or two to do without a tariff, and allow each member of the profession to fix his own charges in the meantime. He said that after public opinion had quieted down he thought there would be no difficulty in having the Local Legislature pass a proper tariff. He had good reason to believe this. The matter was allowed to stand.

DR. ROSE DISQUALIFIED.

The case against Dr. E. A. A. B. Rose, Portland, Leeds county, Ontario, was next taken up. The charges against Dr. Rose were: (1) That he had procured his registration as a member of the College of Physicians and Surgeons of Ontario in 1872 by false and fraudulent representations.

(2) That he had been guilty of infamous and disgraceful conduct by causing to be printed in August, 1892, certain pamphlets setting forth the details of certain diseases, particularly cancer, and representing that he could cure them, knowing this to be false.

(3) That he had entered into an agreement with a certain patent medicine company to advertise their business and pills for money.

(4) That he allowed his name to be used by the company in advertisements printed in a number of newspapers in 1892, recommending the above-named patent medicine.

Dr. Rose was tried before the Discipline Committee last Monday. The committee found that charge No. 1 had not been sustained by the evidence. Charge No. 2 was found to have been proven. Charge No. 3 was found not proved. Charge No. 4 was found to have been proven. The committee also found that Dr. Rose had stated to one Thomas K. Scovill that he was a graduate of McGill College, which statement had been proven false.

A letter was read from Dr. Rose promising that if matters were allowed to stand as they were, without the council taking further action, he would guarantee to do nothing in violation of the rules of the council in future.

Mr. Leighton McCarthy, who appeared at the trial as counsel for the prosecution, and Mr. Lavell, counsel for Dr. Rose, appeared before the council and argued the case.

Mr. Lavell said he admitted that charge 2 had been proven. The pamphlet had been printed, and when it was printed Dr. Rose believed that every word contained therein was true. He had since destroyed the pamphlet, and since objection had been taken to his course he had complied in every way with the rules. The charges were three years old. Since that date the doctor had been acting in the most professional manner. He trusted that so severe a penalty as striking his client's name from the rolls would not be resorted to.

Mr. Leighton McCarthy pointed out that Dr. Rose had written a letter to the patent medicine company, stating that he had been cured of disease, and recommending the pills. He had afterwards received \$25 from the company.

After argument, Dr. Moorehouse moved that the pledges made by counsel for Dr. Rose be accepted, and that action should be suspended for the present. He said that there were many medical men in good standing that he knew who had practised quackery to as great an extent.

Dr. Rogers pointed out that Dr. Rose was in good standing, and that the charge which had been called into question, his right to registration, had not been proved. If the name of Dr. Rose was struck off, he doubted if the courts would sustain the decision of the council. He advised that the matter should be allowed to stand, and Dr. Rose, who was in a dying condition, be allowed to go upon suspended sentence until such time as he should offend again.

Dr. Britton moved in amendment that Dr. Rose be struck off the rolls. After considerable discussion, the main motion was withdrawn, and the

council, by unanimous vote, decided to strike Dr. E. A. A. B. Rose off the rolls.

LODGE PRACTICE.

Dr. Pyne read this letter from the secretary of the West Toronto Medical Association :

“At the regular meeting of the association, held April 10, 1895, this resolution was unanimously carried :

“That the West Toronto Medical Association request the Ontario Medical Council to send a question to every registered man in the province, asking him to state whether he is in favor of doing away with all lodge and contract practice. Answers to be returned, giving reasons, yes or no. The question to be asked through their organ, the *Ontario Medical Journal*; and that the president and secretary of this association take steps to have this request carried out.”

The communication was referred to the Committee on Education.

THE DISCIPLINE COMMITTEE.

Dr. Rogers nominated Doctors Bray, Logan, and Moore to form the Discipline Committee for the current year.

Dr. Sangster objected to the name of Dr. Moore. He said that no university representative should be allowed to sit on this committee. It would not be long before graduates of the universities, in the usual current of events, would be before the committee and their professional lives at stake. He did not think it proper that a representative of the universities should, therefore, sit in judgment upon such cases. The names as proposed were allowed to stand.

WHO ARE IN ARREARS?

Dr. Brock moved that the registrar be required to furnish a statement showing the names and amount that medical men are in arrears for dues and fees. The motion passed.

CASES PROSECUTED.

Detective Wasson sent in his annual report, which stated that he had prosecuted, for breaches of the Medical Act, during the year in fifty-nine cases, and had secured convictions in twenty-nine cases. The fines had amounted to \$1,215, and the expenses \$1,004.

NOTICES OF MOTION.

The following notices of motion were given :

Dr. Fowler: “That passing the departmental matriculation in arts, attending subsequently a session in arts, and passing the required exami-

nations at the end of the first session in arts in any recognized university, shall entitle such student to be registered by the Medical Council on paying the required fees."

Dr. Rogers: "That a by-law be adopted levying an annual assessment and for the collection of all arrears of assessments."

Dr. Brock: "That this council take into consideration the question of the examination of all nurses who are now, or may be hereafter, students at the various training schools for nurses in connection with the hospitals of this province."

Friday, June 14th.

EXAMINATIONS FOR NURSES.

Dr. Brock moved that this council take into consideration the question of the examination of all nurses who are now, or may be hereafter, students at the various training schools for nurses in connection with the hospitals of this province.

After a brief discussion the motion was withdrawn.

Dr. Rosebrugh read the report of the Registration Committee, which stated that the council had no power to grant D. A. McKillop permission to practise until September, 1896; that the request of W. D. McNab to be allowed to practise until September could not be granted; that Gustav Trompetter be instructed that he must comply with clause eleven of the medical curriculum before he can register as a member of the council; that the resolution of Dr. Logan referring to medical reciprocity between the several provinces be adopted as soon as provincial legislation which would be mutually acceptable can be secured, and that the Executive Committee of the council be empowered to consult with all authorized representatives of the profession in the other provinces with this end in view. The report was adopted.

Report will be concluded next month.

Meetings of Medical Societies.

THE fifteenth annual meeting of the Ontario Medical Association was held in the Medical Council building, Toronto, June 5 and 6.

The President, Dr. R. W. Bruce Smith, of Hamilton, occupied the chair.

This year's meeting was one of the best in the history of the association. The attendance of 230 members stamps this as one of the most progressive of the state or provincial associations.

DELAYED UNION IN FRACTURES

was the title of the first paper, read by Dr. Geo. A. Peters, of Toronto, which appears on page 487.

Dr. McKinnon said these cases were not so numerous since plaster of Paris dressings had come into general use. On account of the shrinkage of the splint and of the limb a readjustment should be made, the splint being slit down so that it could be tightened, if necessary.

He then gave the history of a case of delayed union where plaster of Paris had been used, but, through lack of care, union had not taken place. A stiff cardboard splint was applied, and perfect union occurred five months after the injury.

Dr. Shepherd, of Montreal, agreed that anæsthetics should be used if perfect reduction could not be made without them. As a preventive measure, immobilization should be ensured. In cases of delayed union he was in perfect accord with the treatment advocated by Dr. Peters.

Dr. T. K. Holmes thought it wise to remove the dressings from a fractured limb occasionally, to see that circulation to the fractured part was perfect; if circulation were free, delayed union was not so likely to occur.

Dr. Grasett said the surgeon was more or less at fault in many cases where delayed union occurred. Often care enough was not taken to secure a perfect coaptation.

Dr. Cameron disagreed with the statement that delayed unions occurred as the fault of the surgeon. He said also that imperfect immobilization was not incompatible with perfect union. Neither the ribs nor the clavicle could be perfectly immobilized, yet union would take place.

Dr. Gibson reported an old suppurative case in which the ends of the bones were sawed, perfect union resulting.

Dr. Marr reported the history of a case which had passed through the hands of several surgeons, where re-immobilization was tried with success.

Dr. Powell recommended that the surgeon should make a photograph of the actual appearance of the limb, and that the surgeon should own the fixation apparatus.

Dr. F. J. Shepherd, of Montreal, read an interesting paper on

THE SURGICAL TREATMENT OF CERTAIN FORMS OF BRONCHOCELE.

He said that since the perfection of antiseptic methods removal of cystic bronchoceles was comparatively easy. His experience was small, having operated upon only fifteen. He had had no deaths. In several cases the tumor reached from the hyoid bone to the clavicle. They were more favorable when one side was affected. These enlargements were, as a rule, cystic and encapsulated, containing a dark yellow fluid, containing cholesterin, round cells with fatty globules. Dark coffee-ground material was also to be seen, due to hæmorrhage. The solid tumors were colloid in character. Various methods of treatment had been adopted—*injection*, *scraping out*, *draining and packing*. But *enucleation* was the best method. Some of them were removed with considerable difficulty, due to subsidiary cysts on the posterior wall, or hæmorrhage, or the friability of the cyst wall. In one case he had cut the internal jugular. The deeper vessels were often troublesome. The method he employed was to make his incision directly over the tumor, empty cyst of contents, and then shell out. He preferred chloroform to ether as an anæsthetic in these operations.

The reader then gave the history of several of his most interesting cases.

The afternoon session was opened by the President, Dr. R. W. Bruce Smith, delivering the annual address, which appears on page 479.

THE PRIMARY REPAIR OF GENITAL LESIONS OF CHILDBIRTH.

Dr. K. N. Fenwick read a paper with this title. It dealt more particularly with perineal and cervical tears. These tears would sometimes occur in spite of the most careful attention. Examination should always be made by sight, as well as touch, to ascertain the condition of the genital tract after labor. If left alone, these lesions would never repair so well as if properly stitched under thorough asepsis; and the results of unrepaired tears were often serious. By immediately being attended to, the danger of septic infection was infinitely lessened, and the work of the gynæcologist curtailed. Authorities quoted by the essayist recommended non-interference with cervical tears, but his opinion was, in view of subse-

quent dangers, to immediately adjust the edges by sutures. Dr. Fenwick recited his method of repairing these tears. He says: "To operate on a recent tear, it will be found easier to place the patient on her left side, irrigate with bichloride solution (1-8,000), pass a tampon into the vagina so as to prevent blood flowing from the uterus over the wound; then, with a curved needle held in a needle-holder, pass a silkworm-gut suture deep through the tear. Beginning at the vaginal part, we pass as many sutures as are necessary until we reach the anal part of the wound. We must be careful to catch up the torn fibres of the levator ani, whether the lesion is central or into one or the other sulcus. If the tear is into the recto-vaginal septum, that must be carefully adjusted first by, at least two sutures, which will restore the torn sphincter ani, and then adjust the rest of the wound as in the less severe cases." He says the cervical operation is simple, requiring neither assistant, anæsthetic, nor even a speculum.

In discussing the paper, Dr. H. T. Machell said that it had been the accepted rule for years to immediately repair perineal tears; why not as well tears in the vaginal walls? He agreed that systematic examination of the patient should be made after labor. A perineal tear may be stitched with a common darning-needle in two minutes. One ought to carry a curved needle to stitch tears in the vaginal wall. Catgut was probably the best suture to use. Of late silkworm gut has been employed, but difficulty is sometimes experienced in removing the stitches. He thought the sooner cervical lacerations were repaired the better, except where there were small tears, which he would leave alone.

Dr. A. A. Macdonald referred to the ease with which these tears could be detected. All agreed that lacerations of the perinæum should be repaired at once; not so regarding cervical lacerations. His opinion was that immediate repair should only be done when the tear was extensive, with hæmorrhage. It was comparatively easy to detect a tear, but not so easy one that should be stitched; very often there was a series of tears, and it was difficult to find a place to put the stitch in. For his part, he preferred both an assistant and an anæsthetic when operating on these cases. He thought, too, the time had gone by for doing operations with darning-needles and without assistance. He spoke advisedly, because he commenced practice in the country, where he was obliged to do things alone. So, in sewing up the perinæum, he favored anæsthesia. He was more afraid of a kicking patient than of an anæsthetic. If the patient were much exhausted, he would not recommend immediate cervical repairs. He drew attention to the fact that a tear which seemed quite extensive at first would after a few days become so small as not to require attention.

Dr. Adam Wright said he believed in repair of the perinæum, with as great care as possible, at once. He remembered of only one case where, ten days after labor, union of the granulating surfaces took place. He had tried all sorts of needles, and had decided that the straight needle was best; and he had found nothing better than the darning-needle, which he always carried. Regarding tears higher up, he preferred, in view of the danger of septic trouble, not to insert the fingers any more than was absolutely necessary.

Dr. Temple said that he did not agree that the position on the side was the best for the patient to assume, but on the back; for then the torn parts could be more readily brought together. When on the side the introduction of the lower needle was easy enough, but the upper was not introduced so easily. This was his experience. He preferred the long curved needle, so as to secure in the bite the contracted muscular tissue. He did not believe in stitching small cervical tears; even those half an inch in extent at the time of delivery in forty-eight hours afterward would dwindle down to the sixteenth of an inch. By leaving them alone he considered there was a minimum chance of sepsis.

Dr. Fenwick, replying, said, regarding cervical repairs, if the artery to the cervix were torn, stitching up was a matter of necessity. In other cases it was a matter of election. He maintained that examination should always be made, but with perfectly clean hands. Many cases in which the perinæum was badly torn were not visible externally.

NARCOTIC ADDICTION.

Dr. Stephen Lett read a paper with this title. He said that the ever-increasing prevalence of this evil, so seriously disturbing physical, mental, and moral life, demanded more scientific treatment than has been given it. The use of drugs only created a double addiction. Skilful treatment in a well-regulated institution, with the help of the patient, free from organic disease, would result in cure. Taking opium as a typical narcotic, the essayist outlined the various forms of treatment extant. The Levantine method, where the use of the drug was cut off abruptly, caused the patient indescribable agony and irreparably scarred the nervous system. The Erlenmeyer method consisted in withdrawing the drug in ten days, giving bromides *ad libitum*, and restraining the patient forcibly. This was a rude method, too, entailing great suffering on the patient. The Laehr-Burkardt method very gradually and methodically withdrew the drug, at the same time sustaining the patient by tonics, good nutrition, and hygienic environment, using suitable hypnotics. When one-tenth of a grain every twenty-four hours was reached, all opiate was abandoned. At this point

the patient passes through a crisis, though the symptoms would be infinitely less marked than in the other methods. Diarrhœa, vomiting, sneezing, and insomnia were the principal symptoms. The Lett method is a modification of the last, gradually reducing the amount to an infinitesimal dose, based on a knowledge of the exceeding sensitiveness of the nervous system to the smallest reduction of the drug. He reduces the amount till he reaches $\frac{1}{10000}$ of a grain. The break can then be made without a crisis.

Dr. Trimble asked if hypnotic suggestion had been tried.

Dr. Dickson asked whether a reduction of one-half a grain per day would be too rapid or not. He also asked what hypnotics were used.

Dr. W. H. Harris asked as to the cause of the prevalence of the morphia habit. Was the medical profession responsible?

Dr. J. Noble asked as to the value of strychnia.

Dr. D. Clark said the use of narcotics had become a serious matter. He thought it very unwise for the general practitioner to let the patient know he was taking morphia. It might be withdrawn in ten days or two weeks. The vitality of the person who has used it for years would be low, and its sudden withdrawal would be serious. He had seen deaths follow its too sudden withdrawal.

Dr. Lett said that hypnotic suggestion was absolutely worthless. If a patient were taking eight grains a day, he would not withdraw it as fast as one-half a grain at a time. If the patient were taking thirty or forty grains a day, he would reduce one grain every three days at first, and, when the patient got down to half the amount he had been habitually taking, he would reduce one grain in six days. He would take at least a month to get the patient off the last grain. He had found good results from the use of trional as a hypnotic.

Dr. Spohn asked as to the advisability of giving stimulants when cutting off the morphia.

Dr. Dickson asked as to the value of chloride of gold.

Dr. Bromley asked if the drug should be given at all to quiet down the restlessness of the crisis.

Dr. Lett said that under no conditions whatever should alcoholic liquors be given. If a stimulant was absolutely necessary, sparteine, hypodermically, might be given. There was not much bichloride of gold in that so-called treatment. The principal drugs in the treatment were strychnine and atropine. As to returning to the opium in the crisis, if the crisis occurred after breaking from a small dose—say, one-tenth of a grain—other sedatives should be employed, if necessary. But, if the drug were cut off at a higher point, he would make the patient comfortable by restoring the opium.

Dr. N. H. Beemer read a paper on

PUERPERAL INSANITY.*

Dr. Hodge read a paper on

THE USE OF THE STOMACH TUBE.

He described the method of introducing the tube. He then spoke of its various uses: examination of the stomachic contents; the distension of the viscus to ascertain whether dilatation were present; and to wash out the stomach—a very important treatment for various gastric affections. The essayist then referred to the various conditions in which the tube was manifestly helpful. He related several typical cases in which lavage had resulted in an almost sudden disappearance of symptoms. In most cases he advocated its daily use for some time. After its use a few times, the patient would be able to pass the tube himself.

Dr. McPhedran said that the tube was a necessity for treatment, but was of more especial use in diagnosis. In nervous females the better plan was to pass the tube without informing them what was going to be done. He referred to a case supposed to be malignant stricture of the œsophagus on account of inability to pass tube, but he found with a little persistence and gentle pressure that he could pass it through, and was able to withdraw it without its being gripped.

Dr. Macaulum related a case where he had used the tube, withdrawing an ordinary basin full of pure gastric juice.

Dr. Noble said in his experience it was very hard to induce his patients to try the treatment.

Dr. Hunter referred to a hysterical patient who was unable to swallow food, but upon presenting the tube for her to swallow she was completely cured.

Dr. Doolittle recommended the use of glycerine as a lubricant.

INTELLIGENT USE OF RECTAL INJECTIONS, WITH IMPROVEMENT OF
ORDINARY ENEMA SYRINGE.†

This paper, written by Dr. Burrows, Lindsay, was read by title.

A CASE OF MORPHEA.

Dr. A. McPhedran presented a patient with the above disease. After outlining the patient's family and personal history, he pointed out that the attack commenced by the appearance of a leucodermic spot on the forehead, oval in shape, which spread downward and then upward. In two or three months a ridge formed on top of the scalp, and complete alopecia occurred over the part. Since Dr. McPhedran had seen him, the affected part had not increased in size. Atrophy had, however, taken place,

* Will appear in the August issue.

† Will appear in a subsequent issue.

a furrow taking the place of the ridge. The hair was beginning to reappear, and the thickening was rapidly disappearing, leaving a slightly yellowish discoloration. He then described the pathology of the disease.

Dr. J. T. Fotheringham presented a patient suffering from pseudo-hypertrophic muscular paralysis. Patient's father was intemperate. Two brothers suffer similarly. His maternal grandfather suffered in the same way. Just previous to puberty there was an exacerbation of symptoms, which remitted for eight or nine years following. The calves of the legs measure more than the hips by an inch, and the gluteal muscles seem atrophied. Hypertrophy of the deltoids and atrophy of the pectorals seen in advanced cases are wanting. Mentality is unimpaired. Reaction of degeneration not present. Patellar reflex gone and no ankle clonus present. In sitting down drops into the chair suddenly. The attempt to rise from kneeling is the characteristic "climbing upon his legs." The essayist then discussed the etiology, prognosis, and treatment. Regarding the pathology some authorities claim that the disorder is a primary myopathy, and do not believe chronic anterior poliomyelitis to be a starting point. Osler gives to a group of cases, including this, the name given by Erb—primary muscular dystrophy, including two types, the classification being based mainly upon the order, the invasion, and the distribution of the affected muscles. The apparent hypertrophy is said to be due to an increase in the amount of interstitial fat, and to proliferation of interstitial connective tissue and sarcolemma, the contractile elements of the muscle being reduced in amount, frequently appearing fissured lengthwise.

SURGICAL SECTION.

Dr. Welford, of Woodstock, second vice-president, occupied the chair; Dr. J. C. Mitchell, of Enniskillen, acting as secretary.

Dr. Howitt, of Guelph, read a paper on

AN OPERATIVE PROCEDURE FOR SPINA BIFIDA.

The doctor came to the conclusion, previous to his first operation, that

(1) A most important function of the cerebro-spinal fluid is to regulate tension of blood supply to the nerves.

(2) That spinal membranes, and, therefore, walls of spina bifida, resemble the peritoneum in being able, on irritation, to form adhesions. This proves that the communication between sac and cord may be closed, not over skin, but immediately at pedicle of cyst.

(3) It is quite natural to understand that the delicate sac of a spinal hernia, when it impinges against the skin, receives sufficient resistance to cause it to extend laterally between the skin and superficial fascia. Thus a large sessile spina bifida may have so small and imperfect a communica-

tion that the tumors may be drained without materially disturbing the tension of the cord. This accounts for occasional cases by tapping, irritating injections, and other equally unscientific modes of treatment.

(4) That the amount of bone deficiency and implication of nervous tissue can be determined, not by the size of the tumor, but by the general condition of the patient and the extent of paralysis below. The parts of the cord in the sac are functionally destroyed, and removal will not increase the paresis.

(5) Spina bifida is frequently accompanied by other congenital deformities, such as talipes, sphincter paresis, hydrocephalus, and paraplegia. The last named is always, and hydrocephalus generally, incompatible with viability. Hence, from the first, quite a number of the cases are beyond the possibility of a cure.

(6) That no operation will successfully stand repeated trials by different operators, unless in its performance a profession is made to prevent disturbance of the tension of the cord.

(7) The higher the tumor is placed on the spine, the more delicate are the walls of its sac, the greater the irritation to it by the movements of the child, and the more difficult it is, other things being equal, to treat.

The doctor then gave the salient points of his procedure, concluding by reading notes of seven cases treated by the method. Four of the patients are alive and well to-day, one made complete recovery, but died later of meningitis, another had hydrocephalus at time of operation and died in a month, and only one case of death could be attributed to the operation.

Dr. Ross, of Huntsville, reported a case on which he had operated. The patient was a child aged eight. Another physician had aspirated, with little or no relief. The tumor was about the size of a pigeon's egg. After dissecting down to the sac he put a heavy catgut ligature around the tumor, but did not tighten it till he had incised the tumor to see if there was any portion of the cord included. To be doubly sure, the patient was allowed to come out of the anæsthetic condition and have the reflexes examined before the sac was removed.

Dr. Howitt closed the discussion.

TUMORS OF THE BLADDER.*

This was the title of a paper by Dr. F. Grasett, of Toronto.

Dr. Groves referred to the great difficulty in diagnosing tumors of the bladder. He agreed the procedure followed by Dr. Grasett was the correct one.

Dr. E. E. King spoke of the value of the cystoscope in these cases, especially in making an early diagnosis. He related the history of a case in which its great value was shown.

*Will appear in a subsequent issue.

AN OPERATION FOR HARE LIP.

A paper with this title was presented by Dr. Groves, of Fergus. He first criticized the paring-off process recommended in the books, by saying that where malformation by defect exists it was not justifiable to sacrifice any tissue. The method he has employed for some nineteen years he expresses thus: The two defects to be overcome are a notch on the lower border and a thinness of the lip at the line of union. To correct the former, he transfixes the lip on each side with a narrow blade and cuts horizontally across so as to form flaps, which, when brought together, leave a projection instead of a notch. Next an incision is made on each side to a depth of a little more than half the thickness of the lip along the junction of the skin and mucous membrane, extending from the raw edge below to the apex of the fissure. In making these incisions, the knife should not be held perpendicular to the surface of the lip, but inclined at an angle, so that the deepest part of the incision may be further from the fissure than the superficial part. The two flaps are now turned back and two hare-lip pins introduced, one about the junction of the upper and middle thirds of the wound, and exactly at the bottom of it; the other across the angle of the flaps, at a depth of a little more than half the thickness of the lip. The ordinary figure of eight will bring the cut surfaces together; but for the best results, it is necessary to bring the edges of the skin and mucous membrane into exact apposition by a sufficient number of superficial sutures. The same principle he applies to the treatment of vesico-vaginal and recto-vaginal fistulæ.

Dr. Bingham described the ordinary flap method, which he preferred to the use of the pins.

Dr. Peters said he did not like the use of the pins, but favored rather Dr. Bingham's plan.

Dr. Powell said that the pin should not be left in more than twenty-four hours. The harm came from its abuse, not its right use. But he considered that with the use of silkworm gut or horsehair the pin was not needed.

SOME REMARKS ON THE OPERATION FOR CLEFT PALATE.*

Dr. G. R. McDonagh read a paper on this subject, in which he described most of the important details of the operation, particularly in reference to those cases in which more or less of the hard palate was involved.

*Will appear in a subsequent issue.

RESULTS OF FINAL EXAMINATIONS, 1895.

UNIVERSITY OF QUEEN'S COLLEGE.

M.D. and C.M.—G. A. Abbott, Kingston ; A. J. Ames, Codrington ; G. H. Berry, Seeley's Bay ; T. J. Butler, Deseronto ; R. A. Craft, Deseronto ; J. G. Cranston, Arnprior ; Jennie Drennan, Kingston ; T. H. Farrell, Kingston ; H. P. Fleming, Ottawa ; F. C. Hagar, Gananoque ; N. R. Henderson, Kingston ; A. W. Jones, Watertown, N.Y. ; R. J. L. Kyle, Morcwood ; W. O. R. Lofthouse, Kingston, Jamaica ; E. H. Marselis, Bpuck's Hill ; W. H. Merriman, Latimer ; J. A. McBroom, Washburn ; H. S. McDonald, B.A., Kingston ; A. McEwen, Hulbert ; H. A. McKeown, Belleville ; A. Robinson, Kingston ; G. A. Stewart, Glenside ; H. A. Tillman, Kingston, Jamaica ; W. C. Whittaker, North Williamsburg.

House Surgeons, Kingston General Hospital.—J. C. Gibson, M.A., Kingston ; H. G. Murray, Kingston ; E. W. Teeple, Watertown, N.Y. ; A. A. Metcalfe, Almonte.

University Medallists.—W. C. Whittaker, Williamsburg ; T. H. Farrell, B.A., Kingston.

UNIVERSITY OF DALHOUSIE.

M.D. and C.M.—Harry Gray Fairbanks, John Clyde McDonald, Catherine Joanna McKay, Ernest Fraser Moore, Cranswick Burton Munro, George Nelson Murphy, Henry Osmond Simpson.

COLLEGE OF PHYSICIANS AND SURGEONS OF ONTARIO.

W. L. T. Addison, Toronto ; A. W. Aiken, Orangeville ; Mary E. Allen, Fordwich ; N. J. Amyot, St. Thomas ; George W. Brown, Aylmer West ; Sydney B. Bean, Bright ; James Becket, Thamesville ; J. W. Brien, Essex Centre ; G. W. Badgerow, Eglington ; J. H. Cormack, Kingston ; James G. Caven, Toronto ; M. Currie, Picton ; J. A. Cowper, Welland ; R. A. Craft, Chisholm ; C. D. Chapin, Brantford ; W. J. Chapman, Toronto ; W. Douglas, Chatham ; C. A. Drummond, Meaford ; R. A. Downey, Toronto ; Jeanie I. Dow, Fergus ; F. C. Delahey, Pembroke ; George Elliott, Toronto ; A. S. Elliott, Scotch Block ; W. A. Feader, Iroquois ; J. H. Ferguson, Toronto ; T. H. Farrell, Kingston ; H. M. Featherstone, Nelson ; S. E. Fleming, Millbank ; T. F. Flaherty, Thorndale ; J. F.

Gibson, Kingston ; A. Gibson, Orton ; C. W. F. Gorrell, Brockville ; F. C. Hagar, Kingston ; F. C. Harris, Tuscarora ; J. C. Hutchison, Fordwich ; T. B. Hewson, Port Hope ; Jennie Hill, Bond Head ; G. W. Hall, Little Britain ; J. N. Hutchison, London ; W. Hird, Uxbridge ; A. J. Hunter, Toronto ; J. F. James, Strathroy ; C. G. Johnston, Athens ; C. J. Kelly, West Flamboro ; E. T. Kellam, Seaforth ; W. D. Keith, Toronto ; M. O. Klotz, Ottawa ; J. B. Lancaster, Culloden ; A. C. Lambert, Toronto ; A. Langrill, Ohsweken ; J. G. Lamont, Ripley ; W. C. Laidlaw, Toronto ; E. H. Marselis, Bouck's Hill ; A. K. Merritt, Scotland ; A. A. Milligan, Toronto ; J. D. Monteith, Stratford ; Daisy M. Macklin, Stratford ; W. McDonald, Galt ; T. McCrae, Guelph ; F. McLennan, Lechlash ; W. E. McKechnie, Aberdour ; Annie B. McCallum, Gananoque ; H. S. McDonald, Kingston ; J. A. McBroom, Washburn ; J. A. McNiven, Dorchester ; M. McPhail, Sonya ; T. W. G. McKay, Toronto ; W. T. McArthur, Moorefield ; A. E. Northwood, Chatham ; J. I. Pratt, Heathcote ; Rose Pringle, Fergus ; F. Parker, Stratford ; H. G. Pickard, Glamis ; H. M. Paterson, Rodney ; J. H. Ratz, Elmira ; E. K. Richardson, Flesherton ; F. S. Rounthwaite, Collingwood ; H. A. Stevenson, London ; J. Sheahan, Newark ; A. A. Small, Toronto ; D. W. Shier, Cannington ; Maggie Symington, Brighton ; D. R. Simpson, Hamilton ; T. H. Sneath, Midhurst ; E. Seaborn, London ; J. G. M. Sloan, Annan ; H. E. Tremayne, Mimico ; F. L. Vaux, Brockville ; R. J. Walker, Strathroy ; W. C. Whitaker, North Williamsburg ; F. C. Wallbridge, Belleville ; G. S. Young, Stouffville ; J. M. Zumstein, Elcho.

TRINITY MEDICAL COLLEGE.

Final Fellowship Degree.—Certificates of Honor ; 75 per cent. and over on the total.

Candidates who obtained 75 per cent. and over—Frederick Parker, Alex. C. Lambert, James C. Hutchison, Charles A. Drummond, J. G. Lamont, Robert J. Walker, H. George Pickard, Henry McC. Featherstone. 70 per cent. and over—Frederick C. Harris, Henry E. Tremayne, Malcolm McKinnon, Rowland T. S. Gilmore, George Elliott, John H. Ferguson, Vaux Francis Leonard, Robert Wm. Shaw, Joseph D. Monteith, Alexander McKay, Henry C. Pearson, T. H. Sneath. 60 per cent. and over—Christopher G. Johnson, Frank S. Rounthwaite, Donald Albert Cameron, John A. Kerr, Frank McLennan, Daniel W. Shier, James D. McKay, David D. Duggan, Frederick W. Whiting, George W. Brown, Ira A. Tripp, John Albert Cook, Arthur A. Milligan. Passed—Wm. James Burden, Wm. T. Clemes, George F. Pierce, Harry R. Pearce, C. Lambert, B. Stammers, Apollos F. Phillips, Hugh A. Stevenson, James R. Durham. Dr. Sheard's prize in physiology for the first year, H. A. Johnston.

Scholarships.—First year: 1st, \$50, E. Shoemaker; 2nd, \$30, R. G. McConochie; 3rd, \$20, H. A. Johnston. Second year: 1st, \$50, J. S. McEachren; 2nd, \$50, Geo Cairnes.

Medals.—The Gold Medal, Frederick Parker; 1st Silver Medal, Alexander Lambert; 2nd, Jas. C. Hutchison.

TRINITY UNIVERSITY.

Final Examination for M.D., C.M.—Gold medal and certificate of honor—F. Parker.

Silver medal and certificate of honor—J. C. Hutchison.

Certificates of Honor.—J. G. Lamont, A. C. Lambert, F. L. Vaux, F. G. Wallbridge, F. W. Whiting, F. C. Harris.

The following are also in *Class I.*—J. H. Ratz, G. Elliott, Miss M. E. Allen and H. E. Tremayne, equal; J. D. Monteith, C. A. Drummond, D. W. Shier, D. A. Cameron and T. B. Hewson, equal; R. T. S. Gilmore, J. F. Battell.

Class II.—J. N. Hutchison and H. G. Pickard, equal; W. Brown and A. Mackay, equal; H. M. Featherstone, M. M. McKinnon, W. J. Burden, J. A. Cook, H. S. Krug, and R. W. Shaw and T. H. Sneath, equal; F. McLennan, W. T. Clemes, J. A. Kerr, Miss M. Symington, G. W. Brown and J. H. Ferguson, equal; J. A. Trip, J. B. Leeson and D. W. McPherson, equal; R. J. Walker, J. R. Durham and H. Paine, equal; C. G. Johnson, and J. D. McKay and H. E. Wallace, equal; H. C. Pearson, W. G. McKechnie.

Class III.—F. S. Rounthwaite, Miss E. Hurdon, D. D. Duggan, G. W. Hall, F. G. Grosett, and A. A. Milligan and W. B. McKechnie, equal; H. A. Stevenson and J. Menzies, equal; J. W. Routledge, T. W. Kirby, Miss M. MacMillan, and A. F. Phillips and J. F. Drain, equal; J. W. Mehan, Miss D. Macklin, J. A. Malloy, A. W. Aiken, W. D. McNab, Miss R. Pringle.

In the primary the first silver medal was taken by J. S. McEachren, and the second by G. Cairns.

THE WOMEN'S MEDICAL COLLEGE, TORONTO.

Diplomas—Misses M. E. Allen, Fordwich; E. Hurdon, Toronto; D. M. M. Macklin, Stratford; M. L. Macmillan, Toronto; R. Pringle, Fergus; M. P. Symington, Brighton.

Some of the students went up for Trinity College examinations, with the following results:

Degree of M.D., C.M.—Miss M. E. Allen, with first-class honors; Miss M. P. Symington, with second-class honors; Miss S. Hurdon, Miss D. M. Macklin, Miss Margaret L. Macmillan, Miss R. Pringle.

M'GILL UNIVERSITY, MONTREAL.

C. C. Alexander, Fredericton, N.B. ; J. H. Allen, B.A., West Osgoode, Ont. ; D. P. Anderson, B.A., New Liverpool, Que. ; X. L. Anthony, Berwick, N.S. ; J. W. Bailey, B.A., Northfield, Minn. ; J. T. Basken, Dunrobin, Ont. ; E. D. Beatty, Nepean, Que. ; C. W. Bishop, Montreal ; T. H. Blow, South Mountain, Ont. ; R. B. Boucher, Peterboro, Ont. ; C. W. Bouck, Inkerman, Ont. ; H. J. Chapman, Port Elgin, N.B. ; M. E. Commins, B.A., St. Stephen, N.B. ; W. Cowie, B.A., Montreal ; A. Cruikshank, Inverness, Que. ; J. L. Day, B.A., Montreal ; W. L. Ellis, St. John, N.B. ; W. A. Feader, Iroquois, Ont. ; J. W. Flinn, Montreal ; C. H. Fox, Oxley, Ont. ; C. J. St. Gallant, Charlottetown, P.E.I. ; J. H. Gleason, Cowansville, Que. ; J. P. Grant, New Glasgow, N.S. ; A. Gun, Durham, Ont. ; R. Hamilton, Bright, Ont. ; I. L. Hargrave, B.A., Rosedale, Man. ; R. de L. Harwood, Vaudreuil, Que. ; L. Hogg, B.A., London, Ont. ; J. H. Hogle, Montreal ; R. A. Kerry, Montreal ; J. H. King, Chipman, N.B. ; H. T. Knapp, B.A., Sackville, N.B. ; M. Lauterman, Montreal ; A. A. MacLeay, B.A., Danville, Que. ; G. F. May, Montreal ; C. B. Keenan, Ottawa, Ont. ; H. G. Kemp, Brighton, Ont. ; A. R. Kerr, Montreal ; H. S. Kirby, Ottawa, Ont. ; J. H. Laidley, Montreal ; H. Lennon, B.A., Montreal ; J. R. Le Touzel, Goderich, Ont. ; C. D. Lloyd, Lockeport, N.S. ; J. J. F. Macauley, River Dennis, N.S. ; E. E. MacLeod, Vancouver, B.C. ; D. D. McAllister, Belle Isle, N.B. ; E. C. D. McCallum, Maxville, Ont. ; H. K. McDonald, Pictou, N.S. ; J. G. McDougall, New Glasgow, N.S. ; A. A. McLennan, Lancaster, Ont. ; D. A. McLennon, Fournier, Ont. ; D. McPherson, Montreal ; J. D. McRae, Glennevis, Ont. ; N. Hallock, Moose Jaw, Assa. ; M. Maloney, Pembroke, Ont. ; R. Mason, Dalesville, Que. ; E. A. Merkley, Morrisburg ; R. J. Midgley, Woodstock, Ont. ; J. A. Milburn, Peterboro, Ont. ; C. H. Morris, Windsor, N.S. ; L. H. Morse, Bridgetown, N.S. ; D. Patrick, Montreal ; A. R. Pennoyer, Cookshire, Que. ; A. H. Prescott, Queensbury, N.B. ; G. E. Robert, Holyoke, Mass. ; A. T. Robertson, Agassiz, B.C. ; D. M. Robertson, Perth, Ont. ; F. M. Robertson, Chatham, Ont. ; F. E. Rogers, Brighton, Ont. ; J. J. Roy, New Glasgow, N.S. ; E. J. Ryan, St. Kitts, W.I. ; W. T. Scott, Montreal ; J. S. Seaton, St. John, N.B. ; A. A. Skeels, Montreal ; H. Smith, Acadia Mines, N.S. ; R. A. Smith, Durham, Ont. ; O. C. S. Stackhouse, Lachute, Que. ; H. M. Stanfield, Truro, N.S. ; G. R. Sutherland, Hudson, N.S. ; J. E. Thomas, Montreal ; J. A. Thompson, Kinnear's Mills, Que. ; J. A. Tierney, Fallowfield, Ont. ; J. B. Trainor, Kelly's Cross, P.E.I. ; F. R. Wainwright, Montreal ; S. F. A. Wainwright, Montreal ; E. J. Williams, Montreal ; J. H. Merrick, Merrickville, Ont. ; N. McKinnon, Park Hill, Ont. ; G. J. McNally, Upper Kingsclear, N.B. ; R. W. Neill, Aylmer, Ont. ; W. Oliver, B.A., Rockburn,

Ont. ; B. S. Price, King's Co., N.B. ; D. D. Quay, Port Hope, Ont. ; W. G. Reilly, Ottawa, Ont. ; J. E. Robertson, Morrisburg, Ont. ; E. H. Saunders, Woodstock, Ont. ; H. M. Shaw, Berwick, N.S. ; C. W. Vipond, Montreal ; D. F. Walker, Huntingdon, Que. ; J. H. Watson, B.A., Barbadoes, W.I. ; W. W. Wickham, Summerside, P.E.I. ; J. A. Williams, Carleton Place, Ont. ; D. M. Wood, Kenmore, Ont. ; H. K. Wright, Montreal.

THE UNIVERSITY OF TORONTO.

Degree of M.B.—W. L. T. Addison, Toronto ; A. W. Aiken, Toronto ; N. J. Amyot, Toronto ; S. B. Bean, Bright ; J. G. Caven, Toronto ; C. D. Chapin, Brantford ; W. J. Chapman, Toronto ; M. Curry, Picton ; F. C. Delahey, Pembroke ; W. Douglas, Chatham ; Miss J. I. Dow, Fergus ; A. Downing, Woodstock ; R. A. Downey, Toronto ; A. S. Elliott, Scotch Block ; S. E. Fleming, Millbank ; A. Gibson, Orton ; F. G. Grossett, Jamaica ; G. W. Hall, Little Britain ; W. Hird, Uxbridge ; A. J. Hunter, Toronto ; J. N. Hutchison, Toronto ; T. W. Jeffs, Queensborough ; W. D. Keith, Toronto ; E. T. Kellam, Seaforth ; M. O. Klotz, Ottawa ; W. C. Laidlaw, Toronto ; J. R. Lancaster, Culloden ; A. S. Langrill, Oswegan ; L. Lawrason, Dundas ; J. A. Malloy, Brampton ; A. K. Merritt, Scotland ; H. W. Miller, Orillia ; G. E. Millichamp, Toronto ; G. Musson, Toronto ; W. T. McArthur, Moorefield ; F. McConnell, Toronto ; T. McCrea, Guelph ; W. McDonald, Galt ; T. W. G. McKay, Toronto ; W. B. McKechnie, Aberdour ; J. A. McNiven, Dorchester ; M. McPhail, Sonya ; D. W. McPherson, Toronto ; J. K. McQuarrie, Orangeville ; R. T. Noble, Norva ; A. E. Northwood, Chatham ; C. A. Orr, Goderich ; H. Paine, Toronto ; H. McL. Paterson, Rodney ; J. I. Pratt, Heathcote ; J. H. Ratz, Elmira ; E. K. Richardson, Toronto ; J. Sheahan, Newark ; G. D. R. Simpson, Hamilton ; J. G. Sloane, Annan ; A. A. Small, Toronto ; M. B. Smith, Glanford ; W. Thorn, Dunbarton ; A. Webb, Kettleby ; E. A. White, Toronto ; G. S. Young, Stouffville ; J. M. Zumstein, Elcho.

Book Reviews.

MEDICAL NURSING. By the late James Anderson, M.D., F.R.C.P., edited by Ethel F. Lamport, Associate of the Sanitary Institute and the British Institute of Public Health, etc. London: H. K. Lewis, 136 Gower street, W. C. 1894.

"Medical Nursing" is a readable little book of nearly two hundred pages. It is modern in adaptation, and should be largely read by hospital and asylum nurses; and is also sufficiently elementary to be of value for home study for every educated mother of a family.

The physiology of common life is here dealt with in its relation to hygiene and care of the sick. The feeding of the patient and the management of disorders of digestion, circulation, respiration, and of the nervous system are important features. There is also a chapter on the significance of temperature, and another on infection and fevers.

NOTES ON THE NEWER REMEDIES, their therapeutic applications and modes of administration. By David Cerna, M.D., Ph.D.; Demonstrator of Physiology and Lecturer on the History of Medicine in the Medical Department of the University of Texas; formerly Demonstrator of, and Lecturer on, Experimental Therapeutics in the University of Pennsylvania, etc. Second edition, enlarged and revised. Philadelphia: W. B. Saunders, 925 Walnut street, 1895.

In these days, when so many new remedies are discovered, the busy practitioner feels the need of a work of this kind. The list of drugs, mostly unofficial, is fairly complete, but we do not understand why the author has omitted a description of such substances as zinc sulpho-carbolate and strontium iodide. We were also a little surprised at finding in the list nitroglycerine, resorcin, acetanilide, etc., remedies which have been used by the profession generally for the last decade, and all fully described in all the more recent works on therapeutics. A few mistakes in dosage have crept into the work. We might instance the case of creasote-carbonate, where the daily dose given is seven and a half to fifteen drachms, evidently a typographical error. However, the book, taken as a whole, is a good one, and should be well received by the profession. The remedies are conveniently arranged alphabetically, and each drug is very shortly described as to its chemical and physical properties, physiological action, therapeutic application, and modes of administration. Where known, the structural formulæ of the compounds are correctly given. The work concludes with a very useful index of diseases, where the remedies described in the work are classified as to their therapeutic application in different diseases.

INTERNATIONAL CLINICS. A Quarterly of Clinical Lectures on Medicine, Neurology, Surgery, Genito-Urinary Surgery, Gynæcology, Obstetrics, Ophthalmology, Laryngology, Pharyngology, Rhinology, Otology, and Dermatology. By Professors and lecturers in the leading medical colleges of the United States, Germany, France, Great Britain, and Canada. Edited by Judson Daland, M.D. (University of Pennsylvania), Philadelphia, Instructor in Clinical Medicine and Lecturer on Physical Diagnosis in the University of Pennsylvania; Assistant Physician to the Hospital of the University of Pennsylvania; Physician to the Philadelphia Hospital; Fellow of the College of Physicians of Philadelphia. J. Mitchell Bruce, M.D., F.R.C.P., London, England, Physician to, and Lecturer on the Principles and Practice of Medicine in, the Charing Cross Hospital. David W. Finlay, M.D., F.R.C.P., Aberdeen, Scotland, Professor of Practice of Medicine in the University of Aberdeen; Physician to, and Lecturer on Clinical Medicine in, the Aberdeen Royal Infirmary; Consulting Physician to the Royal Hospital for Diseases of the Chest, London. Volume I., Fifth series, 1895. Philadelphia: J. B. Lippincott Company, 1895.

The clinical lectures in this volume are of a superior quality. They are exceedingly practical. It is impossible to review the whole number, but one clinic of very practical use we will refer to, "The Treatment of Lateral Curvature of the Spine," by Dr. Edward H. Bradford, Assistant Professor of Orthopædic Surgery in Harvard Medical School, which is graphically described. The common occurrence of this affection makes its importance more appreciated, while errors of diagnosis are frequent. Dr. Bradford has gone fully into causation—faulty position in sitting at school and home, lack of athletic exercise, poor assimilation, etc.; described the *anatomical peculiarities*, and *how to examine cases* and the treatment. The clinic is most carefully illustrated by photos and diagrams that will be of greatest aid in diagnosis. The paper and binding are an improvement on the former series.

A TEXT-BOOK OF THE THEORY AND PRACTICE OF MEDICINE. By American Teacher. Edited by William Pepper, M.D., LL.D., Provost and Professor of the Theory and Practice of Medicine and Clinical Medicine in the University of Toronto. In two volumes. Illustrated. Volume II. Pages 1,046. Philadelphia: W. B. Saunders, 1925 Walnut street.

Volume II. of the text-book of the theory and practice of medicine is fully up to the standard of excellency of the first volume. It opens with a complete article by Dr. William H. Welch on "Bacteria Infection and Immunity." The known facts concerning the toxic products of bacteria are discussed at some length, and here one will find the latest information upon the many pathological questions concerning infectious diseases.

Dr. Henry M. Lyman, in a series of articles, deals with the principal arthritic diseases, biliary lithiasis, gravel, obesity, diabetes, gout, and rheumatism. His article on obesity is a very interesting one, and contains many practical hints to the physician. Bouchard bases the treatment of obesity upon the condition of the urine.

When nitrogenous excreta are present in excessive quantity, the amount of albuminous food should be reduced. When the urea is deficient in the urine the quantity of food should be at first diminished, and then increased as con-

valescence progresses. In all cases the quantity of fat, starch, and sugar in the food should be five times greater than the amount of nitrogenous nutriment.

Diseases of the blood are dealt with by Dr. Wm. Osler, as well as those of the suprarenal capsulis and ductless glands. These articles are written in his usual lucid style and illustrated by well-executed plates.

Dr. Wm. Pepper writes the articles upon the different forms of heart affections, as well as those treating of diseases of the whole alimentary tract.

Diseases of the nose, bronchi, lungs, and pleura are dealt with by Dr. James C. Wilson. Dr. James W. Holland's article on "Practical Urinary Examination" will be found one of great clinical usefulness. In a clear manner he describes the most reliable tests, and his notes on the practical import contains many useful hints and much valuable information.

Diseases of the lungs and kidneys will be found fully described by the pen of Dr. Francis Delefield. The concluding articles of this volume are upon diseases of the pelvis, liver, and pancreas, from the authoritative pen of Dr. Reginald W. Fitz.

As a whole, this text-book of medicine is, without doubt, the most valuable work on internal medicines that has been published in America.

The following Books and Pamphlets have been received :

SURGICAL PATHOLOGY AND THERAPEUTICS. By John Collier Warren, M.D., Professor of Surgery in Harvard University, and Surgeon to the Massachusetts General Hospital. 832 pages. Illustrated. Subscription price, \$7.00. Philadelphia : W. B. Saunders, 925 Walnut street.

EPITOMES OF MODERN SURGICAL PROGRESS. For Students and Practitioners. Urinary Surgery. By E. Henry Fenwick, F.R.C.S. Eng. 220 pages. Illustrated. \$1.00. Bristol : John Wright & Co.; Toronto : J. A. Carveth & Co.

THE RESULTS OF DOUBLE CASTRATION IN HYPERTROPHY OF THE PROSTATE, with a consideration of allied methods, and a table of cases. By J. William White, M.D. Philadelphia : Reprinted from *Annals of Surgery*.

TUBERCULOSIS IN THE ANO-RECTAL REGION. By Thomas H. Manley, M.D., Visiting Surgeon to Harlem Hospital, New York. St. Louis, Mo. : Reprinted from *The Medical Brief*. 1894.

THE DIAGNOSIS OF PREGNANCY DURING THE FIRST THREE MONTHS. Read, Nov. 14th, 1894. Reprinted from the Transactions of the Philadelphia County Medical Society. Also

CÆLIOTOMY FOR PUERPERAL SEPTICÆMIA AND PERITONITIS. Read before the New York Academy of Medicine, Feb. 28th, 1895. Reprinted from the *American Gynecological and Obstetrical Journal*. Also

REMARKS ON THE TREATMENT OF INEVITABLE ABORTION. Reprinted from *Codex Medicus Philadelphice*. By Charles P. Noble, M.D., Surgeon-in-Chief of the Kensington Hospital for Women, Philadelphia.

Medical Items.

DR. C. C. RICHARDSON is practising at Mount Albert.

DR. THOMAS W. JEFFS (Tor., '95) was married on June 29.

DR. W. F. MEIKLE, of Lansdowne, was married on June 12.

DR. J. H. WESLEY, formerly of Keswick, has removed to Newmarket.

DR. A. F. MCKENZIE, formerly of Toronto, is now practising in Mitchell.

DR. J. R. SMITH has removed from Glanford to Conewaugo Valley, N.Y.

DR. D. C. MEYERS, of Toronto, started for Europe, July 3. He will spend a few weeks in Paris.

DR. DAVID ROBERTSON, of Milton, has been appointed Associate Coroner for the county of Halton.

DR. H. B. ANDERSON has returned to Toronto, after spending a few weeks at Johns Hopkins Hospital.

DR. FREDERICK C. HEATH, of Brantford, has been appointed Associate Coroner for the county of Brant, including the city of Brantford.

DR. THOMAS B. FUTCHER (Tor., '93), who has been at Johns Hopkins Hospital, Baltimore, for nearly a year, visited Toronto recently. He is likely to remain in Baltimore for another year.

DR. H. CRAWFORD SCADDING went for a trip to England in April. He will be married, June 5th, and will return with his bride to his home in Toronto in the latter part of the same month.

THE following were appointed on the house staff of the Toronto General Hospital: Drs. T. McCrae, A. A. Small, J. Sheehan, and W. J. Chapman (Toronto); Drs. F. C. Harris, J. G. Lamont, A. G. Lambert, and F. L. Vaux (Trinity).

THE following is a list of the officers elected at the closing meeting of the Toronto Medical Society for the coming year: President, W. H. Oldright; first vice-president, W. J. Wilson; second vice-president, T. MacMahon; recording secretary, John N. E. Brown; corresponding secretary, A. R. Gordon; treasurer, George H. Carveth. Council: H. T. Machell, J. Spence, N. A. Powell.

OBITUARY.

MR. ARTHUR DURHAM, senior surgeon to Guy's Hospital, is dead.

PROFESSOR THOMAS HENRY HUXLEY died at Eastbourne, England, June 29, at the age of 70. He was educated as a physician, and received the degree of M.D. from the University of London, 1846. After serving for about four years as surgeon on a man-of-war he devoted himself entirely to science with distinguished success, as all the world knows. In March last he had a severe attack of influenza, followed by bronchitis and kidney complications, which were the immediate cause of death.