PAGES

MISSING

The Canada Lancet

VOL. LII. TORONTO, OCTOBER, 1918 No. 2

EDITORIAL

A FINAL WORD TO THE MEDICAL PROFESSION.

On many occasions we have directed the attention of our readers to the importance of the coming medical legislation; and urged upon them the need that all should take a keen interest in this vital question. We shall take the liberty of again stating some of the essential features of the situation as revealed by a study of the Report on Medical Education.

1. Physical Therapy. The Commissioner found reasons during his study of medical education for urging that more attention be gven to physical therapy than had been done in the past. In this view we concur. It would enable the medical practitioners in the future to control this phase of treatment more thoroughly than in the past, and would supplant the parasitic practitioners who style themselves osteopaths, chiropractors, and manotherapists. Under the proposed system of medical education there would be no place for these.

2. Christian Science. As a system of treatment Christian science has no justification for its existence. It boldly disclaims any knowledge of disease, and goes the length stating that such knowledge would be detrimental to it. With most of what the Commissioner states we agree, but dissent from his recommendation that this cult must obtain from the Provincial Board of Health a certificate of a knowledge of contagious diseases before any of them could heal cases. This we think is wrong, as some of this body might acquire such knowledge as would enable them to recognize the diseases that must be reported, and, thereafter, go into general practice. There should be no short cuts.

3. Osteopathy. There is one feature of the report that we think is open to objecton. The Commissioner recommends that the osteopaths in practice on 30th June, 1913, be allowed to continue under certain conditions. We hold that this should not be done. They are not qualified, and came as squatters under the privilege of a very foolish judgment. They have no vested rights. To grant them the right to continue in practice we think is unfair to the people and the medical profession, and

is creating a dangerous precedent for the future in the case of other cults that might spring up.

4. The Chiropractors and Manotherapists. We agree fully with the report on these cults. It is recommended that they be granted no status whatever. This is absolutely right. They have no claims by education to the privilege of treating sick and injured people.

5. The Medical Director. The report advises the creation of a new office and filling it by a medical practitioner to be titled a "Medical Director." We can see no use for such an office; and we can see much harm that might arise from its creation. The duties that are to be assigned to the person filling this office can be performed by officers already appointed. The Inspector of Hospitals, the Secretary of the Provincial Board of Health, the Medical Council, the proposed Council for the Government of Nurses, and the medical colleges can all be relied upon to give the government all the expert advice and assistance that is possible under any circumstances. Further, we think it would be decidedly degrading to the medical profession to have such an officer appointed as set forth in the report.

6. The Medical Council. We fully endorse the recommendations regarding the size of the Medical Council. Six from the colleges, eight from the general profession, and one from the Homeopaths. We do not, however, concur in the suggestion that the eight be elected by the entire profession. We hold firmly that it would be much the preferable plan to have them chosen from districts. This would obviate the risk of the large cities controling the Council.

7. The Medical Council and the Universities. We take the position the Medical Council and the universities should agree upon some plan of common examination. By this means the Council could accept and register a university degree. All that is required is the maintenance of an adequate standard. This can be accomplished by a joint board of examiners, or by the Council appointing an assessor to satisfy the Council that the standard is maintained. This would do away with the present useless system of duplicate examinations.

8. Council Fees. On the matter of the fees and funds of the Medical Council, we are of the opinion that the Council should only charge such fees as would be sufficient to furnish it with the required income for running expenses, but not to accumulate large surpluses. It would be better also that this income be obtained at the time of registration, and that the annual fee be discontinued

9. Nurses. We approve of the recommendations regarding nurses and their training. If these recommendations can be carried out so as not to impair the nursing at the smaller, rural hospitals, much good should come from their enforcement. Under any circumstances, we

feel that it would do good to change the nurses in training from the special to the general hospitals for part of their experience, as far as the large cities are concerned.

10. Optometry. There are opticians, and these will continue; and under proper regulations can fill a useful place. There is no need, however, for the creation of another body of opticians to be styled optometrists. The course of study laid down in the report would only create a poor quasi section of the medical profession. The proper course would be to give a larger amount of instruction on refraction to the medical students, and thus effectually and logically meet the situation. This plan would be in keeping with what is advanced in the case of physical therapy in the report.

OSTEOPATHY.

The following advertisement, which appeared in a Toronto newspaper, of recent date, is most interesting and should be read by every medical practitioner in Ontario.

"Owing to the number of fake and counterfeit osteopathic and optical associations and self-appointed qualified practitioners advertising in bold type in public directories, and holding diplomas in a great many cases from diploma mills which call for four years, but in a great many cases have granted diplomas in three months,

"Dr. B. B. Dutton, president of the Canadian registered and copyrighted Association of Osteopathy, past president of the Ontario Optical Association, chartered and incorporated, past director of the Toronto Osteopathic Association, chartered and incorporated, asks that when requiring the services of an osteopath or optician, *only members* of the *above associations* be called, as they are the only ones recognized by the Ontario Government.

"Dr. B. B. Dutton, 39 Bloor East. Phone N. 4242."

The foregoing is truly spicy reading. It states what most medical men know; but it is well to have the information from the osteopaths as in this advertisement. Note the claim of being recognized by the Ontario Government.

THE CHIROPRACTORS.

The following news item should make it clear that the chiropractors intend putting up a vigorous fight for the privilege of continuing in practice. They are here as squatters and intend to remain if they can secure legislation granting them this right.

"The chiropractors of Ontario held a meeting at the King Edward Hotel, Dr. D'Arcy McLean presiding. Chiropractors from all over

Ontario were present, and stirring addresses were given denouncing the proposed legislation suggested by Mr. Justice Hodgins. Dr. Lee Edwards of Nebraska and Dr. Fred Lundy of Wisconsin addressed the chiropractors, and gave valuable information along the lines of organization to fight for their rights and for the freedom of the people to have the right to choose their own kind of doctor when they were ill. The chiropractors feel that the merits of chiropractic have not been fully investigated, and to prove the statement we will gladly produce evidence from those who have been made well by chiropractic, and who tried medicine with no lasting results. Dr. Ernest Duval of Hamilton, Ont., was elected Chairman of the chiropractors Legislative Committee."

Some fake systems of treatment have an odd grain of reason for their existence, but chiropraxy has none. It is erroneous in every aspect. It should receive no countenance whatever.

DRUG HABITUES.

Habitual use of morphine, cocoaine, heroin, and preparations containing other narcotic drugs has increased rapidly in the United States within the last two years, and a drastic anti-narcotic law must be enacted at this session of Congress to check the wholesale spread of the habit. These are the conclusions made public to-day by a special treasury investigating committee, together with a partial report on the number of drug addicts actually under physicians' treatment in the States.

The investigations of the committee, which is headed by Representative Rainey of Illinois, showed that thousands of drafted men have been dismissed from military camps after it was found they were drug-addicts and that this number included many who systematically developed the habit after being drafted in order to insure their dismissal. This condition is one reason given for the urgency of immediate remedial legislation.

DENTISTRY OF ANCIENTS.

In the former villa of Pope Julius III., in Rome, which is now used as an Etruscan museum, there is exhibited an excellent specimen of a gold dental bridge in proper position in a skull taken from an Etruscan tomb in Civita Castellana, a town in Etruria, situated upon the proposed site of Veji. The latter town was utterly destroyed before the time of Christ, so a conservative estimate would put the age of this dental bridge at over 2,000 years.

ORIGINAL CONTRIBUTIONS

THE ADDRESS OF THE PDESIDENT, ACADEMY OF MEDICINE, TORONTO.

By A. Primrose, C.B., M.B., C.M., Edinburgh.

TWELVE years have passed since the Academy of Medicine was brought into existence by an act of incorporation amalgamating the various medical societies which existed in Toronto, as individual institutions, in 1907. The objects of the Academy, as set forth in the Declaration of Incorporation were "the advancement of the art and science of medicine with its collateral branches; the promotion and maintenance of an efficient library and museum; professional improvement; the cultivation of harmony and good feeling among its fellows; and the promotion of the corporate influence of the profession in relation to the community." It is well to "take stock" occasionally in an institution like this and ask ourselves whether or not we have justified our existence in fulfilling the requirements demanded of us by the ideals which we set before us when we began our career. Hitherto your President of to-night has had little official connection with the academy and may therefore speak with less reserve. We may confidently assert that the objects aimed at have been attained, in some respects with greater success than we had anticipated. At times there were grave differences of opinion when "harmony and good feeling among the fellows" seemed in danger of being sacrificed. We came at times through stormy waters when indeed we were threatened with shipwreck but we weathered the storm and perhaps to-night we are stronger and more capable of greater achievement because of the fact that our experience has not always been in a smooth sea. The responsibility of the President in the Chair is very great in guiding the destinies of such a society. I appreciate the honour which has been conferred upon me, and in thanking you I can only say that my aim will be to justify to the best of my ability the confidence you have thus placed in me. I am sure I have the loyal support of the individual fellows and I sincerely trust we shall make good progress during the coming session in strengthening the society in its various activities and in making it still more effective than in the past in accomplishing the purpose we had in view when our academy came into existence.

Our library constitutes one of our chief assets. It is growing to such an extent that it is proving of great service to the fellows who wish to study medical literature. Most modern books of value, dealing with medical science, are found upon our shelves, but the greatest usefulness of the library is found in the periodical literature and reprints which

are kept up to date and embrace all the chief current publications. These are both indispensible and invaluable for our purpose. All progressive medical men are students and for such it is difficult to overestimate the importance of having access to a good library. Apart from all other activities of the academy the library itself is sufficient to justify one becoming a fellow in order to reap the advantages which it provides. For the student of the history of medicine we have rare and important books and manuscripts by the older writers. Many valuable donations have been made and it is hoped our friends will make still further contributions to this interesting series. The arrangement of reciprocity with other libraries constitutes a valuable addition to our library resources. More particularly is this the case with the Surgeon-General's library at Washington where we can obtain any book we desire from their inexhaustible storehouse of medical literature.

The museum of the academy is still in its infancy. During the coming session a special effort will be made to develop and establish it on a basis which will add greatly to its interest and value, more particularly in connection with the materials of war.

We are sadly in need of a suitable auditorium and modern library building. Activities in this regard are necessarily more or less dormant during the war, but it is hoped in the near future suitable buildings will be erected worthy of the dignity and standing of our academy in the professional life of this community.

The Academy of Medicine constitutes to-day an essential and vital force in the medical fraternity of our city and neighbourhood. We should endeavor to foster good feeling and confidence among our colleagues in the profession and by the progressive character of our efforts to cater to the needs of medical men we should soon make ourselves indispensible so that, as a matter of course, every practitioner of good standing in the community will seek to enroll his name on the list of fellows. Our aims must be laid on broad lines, we should enlist the aid of workers in the allied sciences and utilize in particular laboratory investigations in their application to medicine. We are fortunate in being in close touch with the Provincial University and we are able to utilize to the full the advantages which accrue therefrom. At one period of our history anxiety was expressed lest there should be a cleavage between those members who were on the university staff and those who had no official connection with that institution. It was feared that university men would usurp too much influence in the academy. As a matter of fact in consequence of the smaller community of university men compared with that of the profession in general, the majority vote would always be in the hands of the latter in the event of any such cleavage taking place. It is a narrow-minded policy to create or recog-

nize class distinctions in our ranks. In choosing our leaders our sole aim should be to select the men best fitted to hold office, men who are capable of preserving the dignity and directing the activities of the academy with no selfish interest to serve—it is a matter of entirely secondary importance whether or not he is connected with some outside institution. In this academy we are united with the prime object of benefiting the general profession and through it the community as a whole, all other objects are subsidiary. The officers you select to hold office are determined to render unselfish service untrammelled by any affiliation they may happen to have with outside institutions. It is in that spirit your President and his colleagues in office accept the responsibility of leadership for the coming session.

In this Province the official body which represents the entire medical profession is the Ontario Medical Council and in a wider sphere, the Dominion Medical Council. These bodies have rendered good service in the past and should have our sympathetic support. We should use our best efforts as an academy to assist these organizations in every effort they may put forth to safeguard the welfare of the community and the interests of the Profession.

In the growth of our city many large and important hospitals have come into existence. Of recent date these have been enormously increased in number by the organization of several large military hospitals. Our policy should be to form close affiliations with all these institutions, civil and military. The amount of clinical material is enormous. Your council will have under consideration some organized scheme to utilize the advantages which here exist for the advancement of professional knowledge so that the community as a whole may be benefited by individual experiences. We must enlist the services of the members of the staff of these various hospitals. The academy should play the part of a central "clearing house," we should become indispensible to the hospitals as a medium through which all the varied problems connected with the care of the sick and wounded, the preservation of health and the varied activities of hospital work, should be presented. Some systematic scheme for utilizing the clinical material at our disposal would be of great educational value. In turn we should give our best support to these hospitals in their effort to increase their equipment and efficiency. Many hospitals are still sadly deficient in equipment—one might for example cite the fact that in this large and wealthy community there is no hospital provision made for treatment by Radium. We are told that at least a quarter of a million dollars is necessary to install such a plant. It is a disgrace that we withhold from our pauper sick the enormous advantages in the treatment and cure of malignant disease which is available in Radium. Possibly this academy will be able to play

some part in urging the necessity of such equipment. In this and in other regards we should make our influence felt in the support and encouragement of our hospitals in their effort to benefit humanity.

This academy should show a sympathetic interest in many activities in our city which have to do with the preservation of the health of the community. Social service work through numerous channels is carried on with increased efficiency from year to year. The control of venereal disease and the care of the mentally unfit are problems engaging the attention of some of the best talent in our midst. Some idea of the extent of the work may be gleaned from the Report of the special clinic for Syphilis in the Toronto General Hospital from December, 1915, to September, 1918. The total number of visits to the clinic was 15,432. The total visits 105,566. There were 6,747 Wasserman tests and 4,677 Diarsenol treatments.

Another organization which is accomplishing a great deal in Ontario is the Workman's Compensation Board. In 1917 some 28,702 accidents were compensated and $167,028.14 provided for medical aid. The terms of the Workman's Compensation Act under which the Board works were discussed in this academy when the bill was before the legislature and valuable suggestions were made in the framing of it. On the whole we understand the work accomplished by the Board is considered satisfactory by the various parties concerned.

The power of the Press is proverbial. At times we think they utilize their ability to influence public opinion or to create it, with a lack of sympathy to various medical institutions which have been constituted primarily to protect through a properly organized profession the health of the community. No one will gainsay the benefit of such institutions as the public Press throughout our country. Fair criticism we welcome, but at times we think certain sections of our press are unreasonable. Our responsibility to the Public is great, and the more influential our academy becomes, the greater becomes our responsibility. We hope in future to have closer relationship with the Press through our committee appointed for that purpose, and we trust we shall enlist their sympathy and support in our joint effort to benefit the community as a whole.

We as an academy have our duty to perform in our relationship to the Provincial Legislature and the Federal Government. Our duty is to watch legislation and to use our influence in securing good laws, affecting the practice of medicine, on our statute book—laws which will protect individual members of the community from the charlatan and the quack —laws which will prohibit the practice of medicine by other than those who have had the necessary education and training to deal with problems upon which the life or death of an individual patient may depend.

Here we must have class distinctions. Such distinctions are established by law in the case of lawyers, bankers, educationists, etc., this is essential in the common interest of the nation. In all civilized countries, the world over, the recognition of this principle is effectively operative. No gevernment can fail to recognize this fact. It is indeed recognized in this country for our profession, by the institution of such bodies as the Provincial and Dominion Medical councils with their power to control the license for Practice. It becomes incumbent upon us to utilize this circumstance in no selfish effort to further our own interest at the expense of the community. At the present moment legislation is pending which will have far reaching effects upon the future of our profession and its relationship to the general public. I refer to the Commissioner's Report on Medical Education in Ontario. Many of us have studied that report with great care and the unanimous opinion is one of appreciation of the able manner in which the Hon. Mr. Justice Hodgins has presented it. A special committee of this academy has had the report under consideration and will in the near future present their views before you. We cannot therefore discuss the various matters which have been brought under review but we can express the hope that the legislation which is to be based upon the report will be of enormous value in safeguarding the welfare of the public.

No institution existing in this country can fail to be affected by the far reaching influences of the war. It affects the Academy of Medicine in a variety of ways. Of our membership of 505 there have been 132 on active service of whom 108 have served overseas. Of those who have seen service overseas, there have been 3 killed in action or died while on service. There have been a numbr wounded. Some of our members were at the Front in France in the autumn of 1914 and some of these are still overseas, having been on continuous service abroad ever since.

Practically all the officers of the staff of the University Base Hospital at Salonica were members of this academy. Others have served at the Dardanelles, in Mesapotamia and in Egypt. Some have done duty as medical officers on transports and others in His Majesty's Navy.

These men who have had the good fortune to have seen service at the Front have been profoundly influenced by their experiences. On their return home they cannot fail to make that influence felt in turn in the academy. Let us enquire for one moment in particular as to the effect produced in an institution like this by the returned soldier instead of merely dealing in generalities such as are often indulged in, sometimes in ardent anticipation, often as a threat, when contemplating the influence which such men will wield in the political sphere and in the various activities of the life of the community as a whole.

We may assert the fact, universally recognized, that the experiences of this war have had revolutionary effects upon the Practice of Medicine and Surgery. Many of our members have done pioneer work in the gradual evolution of efficient methods for the treatment of the wounded and sick as well as in the prevention of disease among our troops. It would be invidious to mention names, and if we did so we would be apt to do injustice to the work of many whose particular contribution to the medical service of the army is as yet not fully known to us. We can state, however, that many of our members have had no small share in the introduction of methods at the Front which have been not only of immense service in maintaining efficiency and in preserving the health of our troops during the war but which will have an effect such as we may truly describe as revolutionary in the future practice of Medicine and Surgery in peace time.

In the prevention of disease, our sanitary officers have done their full share. They have played their part with marked efficiency by utilizing methods at the Front which have made the experiences of this war,in the incidence of disease, different from all former campaigns. It may be confidently asserted that this war would long ere this have been prematurely terminated as has been the case in previous wars by infective diseases and the ideals for which we are fighting would have thus been sacrificed, had we not learned and practised effective means for the control and prevention of disease.

Those who have seen service in the East have had the opportunity of studying tropical diseases: Dysentry, Malaria, Relapsing Fever, Paratyphoid and other more rare affections have been carefully studied in the laboratory and in the wards. As a surgeon I am perhaps more impressed with the revolutionary effects, or should I rather call it evolutionary effects of the experiences of this war upon surgery. Many of our pet theories regarding the etiology and the prevention of infection in wounds have gone by the board. So too we have abandoned many of the methods of treatment which we considered formerly as essential to success. Perhaps the greatest benefit conferred on surgery is the atmosphere of scepticism which has been developed. In our arduous and concentrated efforts to discover Truth we realize, as never before, that we have arrived at no finality. The surgeon to-day, if he is to reap the full benefit of the experiences of the war, must have an open mind, he must be able to adapt himself to entirely new ideas regarding the healing of wounds, the resistance of serous surfaces, such as the large joints to infection, the possibilities of extensive operations on such organs as the Lung and the great blood vessels, the methods of repair of the skull, when large portions have been destroyed, methods of dealing with wounds of the cranial contents, the marvellously ingenious methods

of repairing those distressing and disfiguring wounds of the face and jaws and a host of other things which have advanced the practice of surgery in four years at a colossal rate. My contention is that the surgeon to-day has an entirely different view-point from that he had before the war. He is compelled to be more scientific and less empirical in his methods. He must be progressive. The experiences of the present war will have their effect upon the practice of surgery for all time to come, in civil as well as in military practice.

During the past year there has appeared in the Press an important contribution to the History of Medical Science in the "Life of Lord Lister," by Sir Rickman Godlee. The very wide appreciation of this book has made it necessary to issue a second edition, within a year of its first publication. What has always impressed one with the life and work of Lister perhaps more than anything else is the progressive spirit which he so splendidly displayed. In the establishment of scientific facts and their application to the practice of surgery he reached no final goal but many times expressed his belief that the methods he introduced would be improved upon in the future. With prophetic insight he referred to the possibility of employing a technique which has in recent years been elaborated and termed "aseptic surgery." He shared the spirit of John Hunter who remarked to a pupil on one occasion—"Do not write down that observation—I shall probably change my mind next year." Unfortunately the pupils of a great teacher—and all surgeons are pupils of Lister—are apt to be satisfied with the conclusions arrived at by the Master. We should learn from Lister to be progressive and attempt to build on the scientific foundation he so splendidly laid when he enunciated the principles of Antiseptic Surgery, adding a superstructure which will continue to be an ever increasing monument to his genius and fame. It is a truism to state that the remarkable advances in surgery during the present war would have been impossible if Lister had not lived and worked.

We may give some specific illustrations of the advances made in surgery. The incidence of Tetanus in this war has proved the value of the experience we have gained in the treatment of the wounded in the present campaign. A study was made of the number of cases which occurred in home hospitals among the wounded returned from France. In October, 1914, there were 32 cases per 1,000 wounded. In November, 1914, there were 2 cases per thousand and during the subsequent 2 years the average number per month only reached one per thousand wounded. There were several factors which produced a very large number of cases of tetanus in September and October, 1914, such as the character of the soil in the fighting area, the heavy fighting with its heavy toll of wounded, the difficulty of properly caring for the wounded, etc., but

it was not until the middle of October that prophylactic inoculation was introduced in anything like a complete scale. Immediately a remarkable fall in the incidence of tetanus occurred. The number occurring being less than 1-30th of those prior to the employment of prophylactic treatment. But experience has led us to further conclusions, and we find that antitetanic serum is curative as well as preventive in its value.

Large doses of the antitoxic serum are given by the intrathecal route immediately on tetanus manifesting itself. From 50,000 to 100,000 units may be given in the first few days, the object being to saturate the body with antitoxin as quickly as possible. The curative value of such treatment has been determined in many instances. Then again we have learned that the bacillus of tetanus may remain incapsuled within the tissues for prolonged periods and may, independently of any fresh traumatism, cause a recurrent attack. This is very prone to occur as the result of any secondary surgical operation and in certain specific instances has brought about fatal results.

Our knowledge of gas gangrene, its etiology, prevention and treatment has been greatly advanced. Its spread along lymph spaces and the invasion of damaged muscle fibrils; the absence or scanty occurrence of leucocytosis; the prolifiration of epithelium with thrombosis of veins resulting in rupture of vessels with extravasation of blood and rapid spread of infection; the characteristic appearance of certain cases in Xray plates, are some features of this infective process regarding which our knowledge has been greatly increased.

The treatment consists first in prophylaxis, encouraging personal cleanliness in the soldiers, treating trench walls with slaked lime, etc. Every wound should be lookep upon with suspicion and should be submitted to immediate and thorough cleansing, the use of anti septics and the removal of all foreign matter. Particular attention is paid to the removal of all lacerated muscle tissue, and all fragments of bone and the securing of complete haemostasis. If gas gangrene supervenes the entire wound is freely opened up in all its ramifications, all dirt and foreign matter is sought for and carefully removed. Haemotomata which may lodge infection are eradicated, all contaminated muscle tissue is widely excised and haemorrhagic oozing carefully checked. Free incisions are made in the long axis of the limb, all tension is relieved and the wound is left freely open avoiding all pressure and possible constriction of blood vessels, free drainage is provided and the wound irrigated with a potent antiseptic. If amputation is considered necessary the flaps are left widely open without suture.

The results obtained by such treatment may be illustrated by those published by Ivens. Of 464 cases of gas infection, 42 were fatal, 25 died from gangrene, 4 died from tetanus and the rest from severe injuries

which they had sustained. When the gangrene was limited to a group of muscles it was possible in 41 cases to do a local excision. Of these 33 recovered. Amputation by the open method and with lateral skin incisions was practised 65 times; 48 of these recovered.

One other noted example may be mentioned of advances made in this campaign; for the first time in war Transfusion of whole blood has been employed. It is of special interest to record the fact that Canadians were the first to employ this life saving measure—no treatment has been more spectacular or effective in cases of haemorrhage.

The War Museum which is to be established at Ottawa is an undertaking of great national importance. Already, on an extensive scale, arrangements have been made to assemble a collection of the various implements of war. We understand the French Government, for example, has undertaken to make large contributions to the Museum, which will consist of War Materials of all sorts illustrating the varied activities both at home stations and in the field. The museum will be suitably housed in buildings which are to be constructed for the purpose. The section devoted to the Medical Aspects of the War will contain an exhibit of great importance. It will constitute a permanent record in Canada of the part played by the Canadian Army Medical Corps. This collection will be of great educational value. From it materials may be obtained from time to time by teaching institutions and by such bodies as this academy when they are required for purposes of illustration and instruction. We are familiar with some of the work which has been done in connection with this project by our Canadian Hospitals in England. At our solicitation money was provided by the Dominion Government and at Orpington we secured the services of a group of experts consisting of an excellent sculptor, who reproduces very beautiful models in wax illustrating the various stages of such wounds as those of the face and jaws, from the condition at the time the wound was inflicted up to the final processes of repair. Similarly wounds and injuries of other parts of the body are reproduced in wax. Then we have an expert who makes plaster casts, another who is an artist in making coloured pictures in pastels, yet another who specializes in coloured photography, transparencies and in the production of cinematograph films. Care is taken in the Xray Department to preserve and convert into lantern slides the large amount of valuable material which is collected there. Arrangements have been made that this group of experts should travel about among our various hospital units to reproduce and preserve for our museum everything of value in our hospital service.

Material accumulated so rapidly that we had to provide a suitable place for storage until such time as it could be transferred to Canada. Through the courtesy of Professor Arthur Keith, the curator of the

Royal College of Surgeon's Museum in London, a large room was provided which in peace time had contained part of the valuable Hunterian collection, but which had been transferred to safe quarters because of the danger from air raids. Most of these specimens were preserved in spirit and would therefore be destroyed by fire. In this room is now a large collection forming the Canadian Exhibit which is extremely creditable and has attracted much attention from the numerous visitors to the Museum. Professor Keith has himself grouped the specimens in a most effective manner and has had them labelled and described each with a suitable inscription.

I would urge that this academy do its full share of duty in using all its resources to disseminate among the Profession the lessons learned from the War both in Medicine, in Surgery and the allied sciences. The influence of the experiences of war on our professional work is evidenced by the enormous amount of space devoted to these problems in current medical literature. Our various societies, national or special, when they meet devote a large portion of their time to war subjects. Our academy must play its full part in this regard. Already many of our members have returned after extensive experiences at the Front. We hope to have some valuable contributions from them during the ensuing session. Primarily the most pressing problems for solution existed at the Front, but as the sick and wounded gradually sifted through to the Base and were finally transferred to their home land we began to find that the medical and surgical treatment of the returned soldier demanded special concentrated study. Eventually, of course, when peace arrives, there will still remain problems in the treatment of our men at home which will demand our best efforts for many years to come. Many mistakes have been made in the past because of improperly constituted authority in the Home Field but the situation is vastly improved. It has been conceded that military and not civil organizations must run our hospitals for the returned soldier. The Canadian Army Medical Service possesses the necessary organization for the purpose. The men who crowd our hospitals in Canada, and who will continue to arrive here in increasing numbers as time goes on, have been trained for years to submit to military discipline. It is essential for their personal welfare that they should continue under military discipline until such time as they are fit to return to their normal vocations, of peace time. I fancy no one will venture to gainsay the truth of the assertion that officers and men alike have vastly benefited by the discipline to which they have been required to submit while serving their country in the army. In some quarters the tendency is , on behalf of well meaning individuals, to relax all discipline and to encourage license. If we attempt to argue this matter out logically we must first agree that these well meaning individ-

uals have, in common with all loyal citizens of our country, the desire to do all in their power to benefit the returned soldier and to demonstrate in some practical manner the debt they owe to men who have sacrificed so much and who have suffered so greatly in the splendid service they have rendered to their country. These men have bravely faced the terrible experiences of the battle-front—the horrors of war, rendered more terrible than ever before through the diabolical methods adopted by a brutal and barbaric foe. Many of our fellow citizens have sacrificed their lives. A very large number have been wounded. There is a large army of men who have lost one or more limbs and in other ways have been maimed for life. We are all at one in our conviction that we cannot do enough for these men when they return home. Our desire is to restore them to their home and family and to secure for them comfort, prosperity and contentment. Our contention is that the only way to accomplish this is to make them useful citizens. Many of our men have spent long periods of time in hospital. It is a common expression to hear regarding them that they have "got the hospital habit." They become accustomed to having everything done for them, they lose all ambition and have no desire to help themselves. If they are to become useful citizens they must be taught to take a different view-point. Every effort must be made to restore ambition, to make them less dependent upon others and to foster a desire to get back to some useful employment. In so far as we succeed in that regard we not only do the best possible service to the individual but we also benefit the state. The economic value of efficient treatment is not to be overlooked. The state is saved much in the payment of pensions and gratuities, and the individual's earning power is increased. The methods used to accomplish these results have been gradually evolved; special hospitals for limbless men have been established where they are trained to do work in spite of great disability. We have special institutions for the re-education of men who have suffered various functional losses of brain, nerve or muscle. Individuals suffering from shell shock are placed under the care of specialists who by these remedial measures, are accomplishing excellent results. There are many other activities organized for the purpose of restoring these disabled victims of the war to conditions approaching as nearly as possible the normal.

Vocational training has received very careful consideration and is being placed upon a thoroughly systematic basis. The object is to discover, by careful study, the work for which the individual soldier is best fitted. Investigations are carried on at a very early stage in the care of the wounded man and whenever possible his vocational training begins while he is still in the hospital ward.

Experiences of the war have given a tremendous impetus to the development of the method of treatment described as Physico-therapy—this utilizes many different forms of physical energy in the cure of the patient. Heat, light, electricity, baths, massage, gymnastics, the Xray, Radium, etc., are now employed by experts in each department with skill and judgment. The value of the results obtained in the treatment of the wounded soldier by such means are so apparent that all modern hospitals, civil and military, if they are to maintain their reputation for efficiency will be compelled to make provision for physico-therapy in all its branches and to secure skilled administrators.

In order that these various activities may effect their purpose we must have efficient organization and the means of exacting thorough discipline. Our Canadian Army Medical Service possesses the necessary organization. We are fortunate in having at the head of it in Canada a man who has the ability and the determination to utilize that organization and to direct its policy in a manner which will ensure the maximum of effectiveness in its administration. I refer to General Fotheringham.

This academy and similar organizations throughout the country have their duty to perform in supporting the multitudinous efforts which are being made to care for the sick and wounded men who return to Canada. It will be our policy to give our loyal support to the Canadian Army Medical Corps and to aid them in every possible manner in the important and responsible work they are accomplishing in this country. I hope we shall be able to show some special interest in the hospital organizations which are established in our city and neighbourhood. Discussion will be of value in connection with the work done in such clinics as the Military Orthopaedic Hospital, the clinic for special cases at the Toronto General Hospital, the Neurological Clinic, the clinic for Chest cases, etc. These all have not only their special bearing in Military Medicine and Surgery but have also a much wider application and here as elsewhere the experience of this war will produce a profound effect upon the theories and practices of our profession.

THE UTILITY OF ARTIFICIAL PNEUMOTHORAX IN THE TREATMENT OF PHTHISIS.*

By C. D. Parfitt, M.D., Gravenhurst, Ontario.

ARTIFICIAL pneumothorax is the name for a procedure whereby the collapse of the lung is brought about through the introduction of air or gas into the pleural space which lies bteween the lung and the chest wall, with the object of putting a diseased lung at rest. The lung is of spongy, elastic texture, and is normally in a stretched condition because

*Read before the Canadian Medical Association for the Prevention of Tuberculosis, Hamilton, 25th May, 1918.

of atmospheric pressure which can act upon it through the windpipe, bronchial tubes and air spaces, pressing it out to fill the space of the chest cavity. If an entrance for air is made through the chest wall and pleural membrane lining it, and air is allowed to enter freely, the lung will contract until the air pressure is the same both inside and outside the lung. The amount of contraction can be proportioned to the amount of air permitted to enter, and, with the apparatus devised for the procedure, the contraction may be stopped short of complete collapse, or the lung may, to a limited extent, be actually squeezed by increasing the amount of air introduced to a point above atmospheric pressure. It will readily be seen that if there is nothing to prevent the collapse of the lung, a diseased lung may be put at almost absolute rest through being surrounded by a cushion of air which acts as a splint. An inflammed lung can thus be splinted almost as completely as an inflammed joint, and the known benefit of splinting to the joint can also well be imagined for the lung. The circulation in the collapsed lung is thereby greatly limited so that poisonous products in the inflammed tissues are not so freely washed out to come eventually into the blood stream. The poisoning of the body in general is thus reduced and a general improvement, with increased resistance of the body cells, takes place. A reduction in fever is therefore to be expected. The inflammed lung will become less irritable, and cough will be reduced. Expectoration will also be lessened because of subsiding inflammation, quieter circulation and limited movement.

The rest treatment ordinarily applied at certain periods in the treatment of pulmonary tuberculosis can never be so effective as this artificial method of inducing rest, since respiration, even when limited by bodily rest, must be shared by the affected lung.

If this artificial method of securing rest is to be applied, two essential points for its success will readily be understood. The first consideration is the condition of the better lung, upon which the function of respiration must depend if the diseased lung's function is to be dispensed with. Rarely is the better lung entirely free from disease in the rather advanced type of disease for which this treatment is adapted, and it is sometimes a nice point to decide whether or not the procedure should be undertaken. The better lung must be well enough to stand th strain of extra function. Disease in it will often lessen, mainly because of the improvement in the general condition resulting from the reduced poisoning of the system.

The second point is whether collapse of the lung can take place, since it too frequently happens in cases suitable for the treatment that past inflammation has caused the lung surfaces to adhere firmly to the chest wall. Fairly accurate opinion as to the possibility of the undertaking may be formed, but opinion is quite frequently at fault and no otherwise suit-

able case should be denied the attempt because of suspected adherence of the lung to the chest wall.

Collapse treatment is not generally applied to early cases of pulmonary tuberculosis, because the outlook for them is good under usual methods of treatment, and there are reasons for getting along without this treatment, if possible. If a patient is not doing well under properly applied conventional methods of treatment, he should be given an early chance at collapse treatment. If this were done the results of collpase treatment would be far better, good as they already are, with great gain for a large number of patients. The reasons why the method is denied the earlier group of patients are two: there is a slight risk involved in this very simple operation, and complications occasionally arise through the creation of this unnatural condition. Both these objections are inconsiderable when weighed against the dire outlook for patients who do not promptly improve ,or who gradually get worse under the ordinary methods of sanatorium treatment. The operation in itself is trifling, and scarcely to be considered from a surgical standpoint. It is, of course, always done under a local anæsthetic.

Nearly a century has passed since the induction of artificial pneumothorax was conceived and put into practice by Carson, of Liverpool, as a treatment for phthisis. Following the Napoleonic wars, it was noted that soldiers known to have been phthicisal got better following a bayonet wound of the chest, when air had entered the space between the lung and chest wall. It is more than twenty years since Forlanini, of Padua, and Murphy, of Chicago, independently, made it an effective measure in treatment. Ten years ago it had become widely adopted in Europe, and it has been extensively practiced in America during the past seven years. This treatment was carried out by several physicians in Ontario after Murphy published his method in 1897. Dr. J. M. Rogers, of Ingersoll, was, I believe, the first to practice it in 1898. In 1900 it was almost simultaneously taken up extensively by Dr. James Third of Kingston and Dr. A. MacKinnon of Guelph. Dr. Third read a paper on the subject before the Kingston Medical and Surgical Society in April, 1903. Of 51 cases reported, all having had bacilli in the sputum, 27 were living in 1907, nine of them being in good health. In 1918 two of the nine had been killed in France, three were well, and four had been lost track of. Dr. MacKinnon's article, read at the meeting of the Ontario Medical Association in June, 1912, has been published. This contribution marked the renaissance of the procedure in Ontario, and during the last five years it has been used extensively by a few physicians.

Four years ago I had the privilege of reading papers before the Toronto Academy of Medicine and the Ontario Medical Association, in which the method in general was discussed and results on twenty-four

cases were reported. My apology for bringing this subject up again at this meeting is the comparatively slight recognition that the method has thus far received from the profession at large. This is evident, because of the few cases that present themselves especially for this treatment, and because inquiries from well informed physicians as to what is meant by artificial pneumothorox are not infrequent. It seems, therefore, probable that this procedure must still be unknown to many physicians.

In the last two years more than 4,000 people have died in Ontario from pulmonary tuberculosis. It has been fairly estimated that at any one time there are 10,000 cases of pulmonary tuberculosis in the province. We may, therefore, assume that during the past two years there have been 12,000 patients for whom this method of treatment might rightly have been considered if all of them had come under the observation of physicians, and 8,000 of these, at least, who would be moderately or far advanced cases, had the right to have this method considered for the treatment of their condition. An inquiry sent to the several sanatoria and outpatient clinics for tuberculosis in the province, and to physicians who are known to be practicing this method, reveals the fact that at present collapse of the lung has not been attempted in more than 200 patients during the last two years. Therefore, only 2.5 per cent. of the moderately and far advanced consumptives have had the opportunity of being helped by this beneficient method. It is surely worthy of wider application.

The percentage of patients for whom it is a desirable procedure cannot be accurately estimated. The stages of disease of patients coming under the consideration of the various workers in the field of tuberculosis differ greatly, and the criteria by which the suitability of a case for the treatment is judged have been varied, and are, to a certain extent, experimental. The personal equation of each physician will also modify the selection of cases. According to such limitations the method has been tried in from 5 per cent. to 12 per cent. by various workers. Thus far I have tried to practice artificial pneumothorax in 63 patients, 12 per cent. of those who have come under observation since I felt warranted in practicing this treatment. My criteria have been varied, and have been tinctured by conservatism, enthusiasm and humane considerations, and there has inevitably been some bad judgment in selecting cases.

With the yearly mortality of 2,000 from pulmonary tuberculosis in the Province of Ontario, it is reasonable to assume that each year 2,000 patients approach and pass the point when pneumothorax should be considered as a therapeutic possibility. If 10 per cent. only were selected (and if considered at the proper time, the percentage might be considerably higher), the method should be tried in at least 200 cases yearly, apart from the great accumulated reserve of 800 cases (10 per cent. of 8,000 above mentioned), to whom it should be applied. From my own

hard material, as will be seen later, a more or less beneficial pneumothorax was obtained in 56 per cent. of the cases in which it was attempted, and a material success was obtained in 60 per cent. of these, apart from benefit symptomatically in many others. Better material should give much greater success. Therefore, material success might be expected in upwards of 250 cases at once if this measure could be applied to the large number for whom it is desirable that are living at present, and one might reasonably expect upwards of 60 successful cases yearly for the future.

In a previous paper I have mentioned the immediate and ultimate results obtained by physicians of large experience, and some of these results have stood the test of years. The symptomatic relief, the prolonging of life, the restoration to health and working capacity, and the arrest of the disease in otherwise hopeless cases obtained by artificial pneumothorax, makes the procedure, when it can be successfully applied, pure gain for the tuberculous who are loosing ground. For such patients it has place when sanatorium treatment, with or with graduated exercise, fails, and when tuberculin is inappropriate. From the abundant literature no one can doubt the value of induced pneumothorax in certain selected cases of tuberculosis. My faith in this treatment is even greater to-day than it was four years ago, when I expressed mild enthusiasm about its possibilities, and I shall prove to you that this faith is justified solely from my own limited experience. Such cases as the following seem sufficient warrant for enthusiam, and the patients themselves are the warmest advocates of the method.

1. A man aged 38 has had symptoms of a progressive tuberculosis for eighteen months. He is fat and plethoric, the left side of the chest is greatly contracted and theret is almost no respiratory movement. The heart's impulse is visible over an area of 14 cm. extent. The point of maximum intensity is 15 cm. to the left of the midsternal line. Dullness is intense except at the extreme base. Cavernous signs are extensive. There is marked hypertrophy of the right lung, and a moderate infiltration of the upper lobe. There is one ounce of sputum per day, with bacilli present. For three months there is some improvement under sanatorium treatment. The patient then relapses, with slight daily fever accasionally reaching 102 degrees. The sputum increase to four ounces. There is much pleurisy on the left side and great mental depression. A tuberculous papilloma develops in the interary tenoid space and is removed. Six months after coming under observation, artificial pneumothorax is, to my surprise, easily induced. A month later the patient is up the greater part of the day, and is better is every respect. Three months later he is exercising freely, and tubercle bacilli are absent from the sputum. The signs in the right lung gradually became less pronounced. The patient left at the end of twenty-one months in excellent physical condition, and able to

undergo considerable exercise. Shortly after leaving, effusion developed in the side. This has been persistent, but has given no trouble. The patient resumed his old occupation of electrical engineer a year later, and has remained well at work during the last two and a half years. The compression has been maintained. Fifty-two injections of gas have been given during the five years. Twenty examinations of sputum in three years have been negative for bacilli.

2. A girl aged eighteen had had progressive symptoms for six months before coming under observation. An extensive lesion of moderately intense type involved the left lung throughout. A slight infiltration involved the upper half of the right upper lobe. After improvement for four months there was a severe relapse, with marked constitutional symptoms and general increase of the pumonary signs. After four months from the beginning of the relapse, pneumothorax was timidly undertaken because of the increasing signs in the right upper lobe. Improvement was prompt and consistent. For three months physical signs in the right upper interscapular region increased and then subsided. The patient then improved in every way. A year following the induction of pneumothorax there was a slight reactivity at the right apex. Treatment was then carried out at her home far away. Five months later she suffered a paratyphoid infection. At this time I found further activation at the upper apex. The pneumothorax was lost in about two years and the lung re-expanded. When last seen, a year ago, the physicial signs in both lungs might reasonably be considered those of a healed lesion, the patient was apparently well and enjoying exellent halth. This was three years after the original operation, and more than a year following the re-expansion of the treated lung. This patient leads a normal life with unlimited exercise. She could earn her own living and may well be considered an arrested case. She has married recently.

3. A man aged 30 had had symptoms for five months, and, on examination, was shown to have a moderately advanced condition involving the right upper lobe and the apex of the right lower lobe. During a month's observation a cavity developed and pneumothorax was induced. A satisfactory compression was obtained, the temperature fell to normal within ten days, and marked improvement was forthwith made in every way. Two months later a slight effusion was noted. Treatment was then continued by the patient's own physician. Nine months later the patient returned for examination and refill. The lung had re-expanded so much that it was almost impossible to determine which lung had been compressed. A slight modification of breath sounds below the clavicle was the only clue. Although the disease was apparently arrested, a refill was undertaken. A pneumothorax was continued for six months longer, when it was abandoned, after being carried on for fourteen months. For three

years and a half the patient has been managing his 160 acre farm, and may fairly be considered an arrested case, is not apparently cured.

4. A youth aged nineteen had had symptoms for nine months. A large cavity was found in the left upper lobe, and a widely disseminated lesion throughout that lung. There was a mild disseminated lesion, also, in the right upper lobe and in the apex of the right lower lobe. A year later, under sanatorium treatment, there had been marked improvement both in general and local condition. Notwithstanding the general improvement, however, the patient was unable to endure exercise or tuberculin. Eighteen months after coming under observation the improvement in the right lung was so marked that the induction of an artificial pneumothorax seemed warranted. A fair degree of compression was obtained. Sputum was reduced within six weeks from three ounces to half an ounce, and the patient was soon able to undertake more exercise without any rise in temperature. The pneumothorax was maintained for eighteen months, but the gas cavity had become so greatly diminished in size during the last nine months of the treatment that the pneumothorax was abandoned. The patient was then able to take unlimited exercise, physical signs had almost disappeared from the right lung, the left lung was relatively dry, half an ounce of spyutum continued from which bacilli have been absent for long periods. The patient was about to resume work, but youth led to indiscretions, and I believe he is not so well as when last seen two years ago. Nevertheless, pneumothorax was material in helping towards more secure health.

5. A girl aged sixteen years had had symptoms for two months with expectoration for one month. She was then seen in consultation, and a lesion of rather intense type was found in the upper half of the right lung, with a slight infiltration at the left apex. A month later there was increase in physical signs and pneumothorax was urged. This was accomplished without difficulty, and a moderate degree of compression was obtained. A month later fluid was noted. After three months the patient left to continue the treatment under her own physician. When seen six months afterwards there was no sign of fluid. The pneumothorax was maintained for twenty-seven months, but was discontinued fifteen months ago. She had received twenty-nine refills. When seen last, a month ago, there was limited evidence of past disease at the right apex, and the disease could be classed as apparently arrested. There was no sputum. The patient was fit for work, and said she could not feel better than she does.

6. A man aged thirty-seven had had symptoms for eight months. An intense lesion was found throughout the left upper lobe, less intense disease in the left lower lobe and a limited area in the right upper lobe. Under sanatorium treatment, with graduated exercise, he improved remarkably in general condition during eight months. During the next four

months there was a decided relapse, witih considerable extension of the process in the left lung and slight reactivity of that in the right. A large pneumothorax was readily induced. The patient at once began to improve in constitutional condition, and, during the first nine months after compression was undertaken, the condition in the right lung had become arrested, and the patient was in such excellent condition that he was permitted to resume his work. This he has consistently followed for two years along with regular golf, sometimes playing thirty-six holes. He still returns at two monthly intervals for refills.

During five years, ending with the year 1917, an attempt to induce pneumothorax was made upon 63 patients, apart from the replacement of fluid by gas in several cases of pleural effusion. The material was difficult from the standpoint of prognosis as well as from an operative standpoint. If the treatment was desirable the patient was not denied the attempt even though it seemed improbable that collapse of the lung could be obtained. In the ordinary course of events the outlook was fairly good in 2 per cent., doubtful in 25 per cent., and bad in 73 per cent. of the series. The patients were classified as 24 per cent. moderately advanced, and 76 per cent. far advanced. Only 6 per cent. were clinically unilateral. All but two had bacilli in the sputum. Tuberculous complications were present in 30 per cent. The object of the operation was curative in 52 per cent. and simply to relieve some distressing symptoms in 48 per cent. of the cases. The results of the operations allow the series to be divided into two groups: Group I, operative failures, 44 per cent.; Group II, satisfactory compressions, 56 per cent. The average length of treatment in Group II was 13 months. In this group there were 26 per cent. of durable successes, 34 per cent. of temporary successis, 17 per cent. benefited in regard to some group of symptoms. In 6 per cent. the treatment threatened to be injurious and was abandoned on this account. The treatment therefore proved of benefit in 77 per cent. of the patients in whom compression could be accomplished. In Group II, 26 per cent. of the cases can earn their own living, 11 per cent. can do part of a day's work, 37 per cent. have lost bacilli from the sputum, and 34 per cent. have died. In Group I, those in whom no satisfactory compression could be obtained, 8 per cent. can earn their own living, 8 per cent. can do part of a day's work, 4 per cent. have lost bacilli, and 43 per cent. have died. The contrast between the groups will become further emphasized as time elapses.

It is evident that artificial pneumothorax has won an important place amongst the methods of treatment of phthisis. It should be seriously considered whenever there is failure of progressive cases to respond to sanatorium methods after a reasonable trial, regardless of the stage of the disease. The best results will be obtained before the occurence of extensive adhesions, marked irreparable involvement of the opposite lung and irreparable deterioration of general resistance. Every case requires care-

ful study and the weighing of the several factors which make for or against success. The character of disease in the lung in question; the ability of the better lung to bear the strain of the extra work that will be thrown upon it, upon which the site and character of disease in it have an important bearing; the ability of the heart to stand the strain of extra work, under possibly impaired oxygenation, and when affected by displacement, and the presence of tuberculous complications in other organs —are all points for consideration. A reduced toxaemia will often more than compensate the extra work thrown upon the better lung and heart, with consequent improvement even in risky cases. After collapse of the lung has taken place, it will be occasionally noted that adventitious sounds and breath and voice modification have been transmitted and that the better lung is even better than it seemed to be.

Whether the desired collapse can take place is difficult, indeed often impossible, to decide by most careful physical examination along with the X-ray. Prejudice on this point should not restrain the attempt if the case is otherwise suitable, as it has quite frequently been found that a free pleural space, essential to successful treatment, has been found despite the history and signs suggesting adhesions.

This treatment is so much worth while that at convenient points throughout the province some physician should familiarize himself with the technique and develop judgment as to its application, so that the method may have a much wider use than obtains at present.

For preliminary observation, and for the earlier operations, at least, the various sanatoria would naturally be regarded as possessing the desirable facilities. It is, however, a time-consuming, tedious process to carry out carefully a series of these operations, along with preliminary and subsequent examinations, to which now should be added roentgenological study, and for sanatoria to do much of this work they will require more medical assistance than has hitherto been usually provided. The sanatoria are often undermanned, because they are poor, or because directors do not see the need of, nor appreciate the cost in time of, medical work on patients for whom they think a verandah life is all that is necessary. If physicians in general will realize the possibilities of induced pneumothorax, and will demand it as a therapeutic measure in suitable cases, there is little doubt that sanatorium staffs will be augmented, and in the 1,500 beds in the province, filled with 80 per cent. of moderately and far advanced consumptives, many patients will find their lives made more comfortable and often usefully prolonged by the induction of pneumothorax at the proper time. This treatment offers more to the consumptive in whom it can be carried out than any other measure that has been developed since the inauguration of sanatorium methods, and indeed it will often succeed when well ordered sanatorium treatment has hopelessly failed.

SEXUAL PROBLEMS

By James S. Sprague, M.D., Belleville Ont.

"READ not to contradict and confute; nor to find talk and discourse; but to weigh and consider" as Lord Bacon in his "Essays" tells us, but weighing and considering, delaying to act; indisposition and procrastination for support and endorsement are evidently in unison in these our days when the plague of plagues, so well and graphically announced by the master-minds and observers,—Sir (Dr.) Conan Doyle, Sir (Dr.) Wm. Osler and other men, in our ranks, equally as zealous for the purity of our nation, is running riot. A Martin Luther is demanded —certainly one "who cares not to be great, but as he saves or serves the State" for this path of duty, for every M.D. is the way to glory— to that glory in which the salvation of not only our men over the sea, but their own kith and kin and of unsuspecting innocents is worthy of wide-spread action, silencing, understanding, and if possible—eradication, if we are to maintain our "great race, our empire of splendor that has dazzled the wondering world" and preserve that bodily purity. even of those "who kept Thy truth so pure of old when all our fathers worshipped stocks and stones—forget not."

There are in the United States 300,000 meretrices, and it has been stated with equal authority that if these denizens of the underworld were to abandon their work, within twenty-four hours after their disappearance, an equal number would take their places. It, too, has been stated publicly, that in Chicago, for every lawful marriage there are six divorces. I need not make nor produce extracts from the Health Circular Social Hygiene vs. The Sexual Plagues, issued for the public by the Indiana State Board of Health. The booklet has thirty-nine pages, and every medical man, every patriot, every clergyman, every health officer, school teacher (man or woman), and not least, every legislator, should have not one, but one or more dozens of copies. Of the copies I received, one was sent to Dr. McCullough, our chief Health Officer, one each to four ministers of the Gospel, and the remaining copies (except one retained by me) have been sent to fellow physicians and men who are working for reform and beneficent movements. You, my brother, resting in the belief that this country is keeping even with the progressive movements in regard to the national health, and not observant of what has been done and is being done by several States of the Union, are but slumbering and in great ignorance, and it is time to awaken and read, even the pamphlet herein named and in which appears "5th edition—110 Thousand," and the "Press of the Indiana Boys' School. You and I, at graduation, without taking any oath to become the conservators of the public health, assumed the yoke

and kissed the rod, and are fideles ad urnam, fully believing we have a trust to keep, and that the Great Architect of the Universe is a good paymaster. You and I have treated, and very frequently, too, misguided youths—even adults, whose associations were with a "rag and a bone and a hank of hair"—whom the fools called "their lady fair," and, too, we have seen these deluded and impetuous fellow beings roam our streets at mid-day, contaminate others and even befoul their own nests through ignorance, and the lack of legislation to announce the dangers and to require the necessity of such disorders to be named communicable, and reported to the local officer of health.

Yes,this or the other fool "was stripped to his foolish hide, which she might have seen when she threw him aside," but "some of him lived and some of him died" and the work went on. As Gay tells of the Devon farmer, the case is similar:

"Ye gods avert that worst disgrace—
Thy ruined nose falls level with thy face:
Then shall thy wife, thy loathsome kiss disdain,
And wholesome neighbors from thy mug refrain."

..*"Non uxor salvum te vult, non filius; omnes vicini oderunt.—Ovid.*

The subjects of eugenics, phylogenesis, and areotology are occupying much attention as studies by many physicians and prominent divines, everywhere, yet they are not forgetful of the sexual plagues in all forms. In many States there are laws—rigidly enforced—that require medical certificates to be produced by the parties under contract for marriage, and yet, not long since, a deputation of God-fearing women, who not wanting their or their sisters' wombs to be the nursery for diseased spawn, humbly presented an appeal for such health certificates, and that legislators but follow the advanced rulings of several enlightened States, and although kindly received, yet what was the answer of our chief officer among the legislators? Was their noble and patriotic appeal even promised "due consideration in time?" To him or her—whose words are by Byron:—

"My days are in the yellow leaf,
The flowers and fruits are gone;
The worm, the canker and the grief are mine alone,"

shall we say in the words of Burns:—

"What's done we partly may compute,
But know not what's been resisted."

And that the remorse is but an after-clap; or shall we say: "Thy fury inward on thyself prey and consume thee!" No! let us repeat the soothing and yet not encouraging words of the great English dramatist:

"The life of all his blood
Is touched corruptibly;
And even his own pure brain,
Which some have vainly supposed
Was the soul's frail dwelling place,
Doth by the idle comments it makes
Foretell the ending of mortality."

If a man is to keep his health (said Plato, in his The Republic, Book III, 404) would you allow him to have a Corinthian girl as his fair friend," and would you not tell our men overseas that "London is the plague spot of the world"? according to figures supplied by the London Lancet, says The Therapeutic Gazette.

It requires knowledge to decide what an ill deed really is, and it requires courage to deal with facts which contravene an accepted course of procedure.

One truth is this, and Bombastus Paracelsus tells it to us: "The body has been given to us without venom. Whatever makes a man sick is the venom that gets into his nature from outside." To that chief legislature, herein so named, I refer the words of the great Virchow: "The care of the public health is the first duty of every statesman." In my consideration of men medical there are not living any, or even one, who are, or who is the equal of Abram Jacobi, M.D., of New York, and I present a few of his encouraging and prophetic words: "If there be in the Commonwealth any man, or any class of men, with great possibilities and responsibilities, it is the physician. It is not enough, however, to work at the individual bedside and in the hospital. In the near or dim future, the physician is to be set in and control school boards, health departments and legislatures" —and we are seeing the pioneers at work —even late—in our Province, and even a Dominion Medical Board of Health, that possibly may be a co-partner with agriculture which concerns itself in raising and keeping pure Holsteins, and Berkshire hogs. How dear to our gods—Apollo, Æsculapius—even Hippocrates, and the shades of our illustrious progenitors, fathers, master minds and the brightest of divinities in medicine (the first of arts and sciences) must this mundane incompatibility of interests appear when divinity act in the judgment of their tribunals! With the words of the Honorable Chauncey Depew, you and I agree: "The professional man, because of his wider culture and more accurate training, is a leader in every community." And this expression especially applies to the medical profession and to that great source and personified culture represented most frequently by that hallowed term of "country doctor," for he it is who sees a god in every man, and fully believes "they serve God well

who serve His creatures." How essential, then, it is that he—one of the McClure order—should have a very broad and most thorough training, yes how frequently do we hear witness to the following kindly reference:

"He who thus endoweth us witha sense and faculty for storms and turbulence, is yet a soul whose master-bias leans to home-felt pleasures and to gentls scenes, sweet images! which where so'er he be, are at his heart;" even, if at times we see humanity without its masks and frills, yet, we forget not the poetry of life, and our mission is ever that of "Herakles battling with disease, with custom, and with prejudice, and with men's blinded hopes, disorders, toil and prayer and winged troubles peopling daily air"—("Spes hominum, caecos, morbos, votumque, labores, et passim toto volitantes aethere curas") and yet we ever prize in leisure hours those "studies which result in the soul getting righteousness and wisdom," and pleasing, too, it is to recall the words of Tertullian: "Quod invenitur, fuit," "What is invented, was," in brief that which is being used by our modern scholars as original was said before, however expressive words bear repetition for confirmation. The health of the people was considered the supreme law among the Romans, and before Romulus and Remus were suckled the Mosaic health-rulings had their origin, and are held as sacred and are observed by the faithful even now as when promulgated.

It is, indeed, a paradox to us who notice in several journals whose readers are women—even many young, the various measurements of the ideal young woman, and in the columns of some farm papers was noticed the measurements of the perfect horse or hog, in fact too much drifting there is to the flesh and bone—and "hank of hair"—corsets—and matters sexual in character, meretricious, not refining to the soul, or preparing young women honorably for their highest distinction and destination of motherhood. In fact, much current literature—so termed—is but encouraging vice, and a careful study of the writings of several women, who affix M.D. to their names, reveals the fact that lustful thoughts either possess them, or do not possess them from disappointments in life, or their medical education is as a commercial asset, or, worse still, that the fountains of their youth are dried up. One fact is this "propter ovarium mulier est;" and another is, as Gay tells us: "'tis woman that seduces all mankind; by her we first were taught the wheedling arts."

If, as Kipling says: "The colonel's lady and Judy O'Grady are sisters, under the skin" for proofs we have as example the suffragettes, improperly manned, improperly halter broken, misguided, unsatisfied, neutrals, and androgyneal blots, of whom and whose furor sexualis it may be said that every inch that is not fool is rogue, "all impudence and tongue."

"Let strictures on my conduct pass, said he,
Unnoticed let them be;
'Tis the stricture somewhere else, alas!
That is deplored by me."

And thus wrestling with the Gon Neisser, his favorite poet's lines he recalled:—

"I only knew she came and went.—Lowell.
Like troutlets in a pool.—Hood.
She was a phantom of delight.—Wordsworth.
And I was like a fool.—Eastman.

As the actress, Estor Banks, writes:

"Just a bit of badness,
Man and woman's madness,
Studies of life's sadness
Versed with ink and pen."

These anthologia, if worthy of this definition, are introduced to illustrate the frailty of mankind in general, to point out morals, and not least to state that the wages of sin is death, has ever been, and will forever prove to be the death of deaths. Concerning that fearful disorder of which the Devon farmer, herein named, was a sore victim, one may find in Persius' Satire the following lines: Tentemus fauces—tenero latet ulcus in ore putre, quod haud deceat radere beta.

From my old friend, Horace, I make a quotation, thinking this age is equally as wealthy, as luxurious, and as profligate as Rome and its Empire were in his days—when wealth accumulated and men decayed and their spawn trampled to the dust:—

"Time sensibly all things impairs,
Our fathers have been worse than theirs;
And we than ours, next age will see
A race more profligate than we
(With all the pains we take) have skill enough to be."

If such statements are true and have been fulfilled, it remains for us as conservators of the public health to interest our legislators in immediate reforms, to educate the public, and to see that legislation does not encourage quackery by licensing baseless and mercenary cults —miscalled medical—to interfere with our efforts to stamp out of existence the evils named herein which walk as a pestilence in our very midst.

My trust is in the love of truth and the candor of cultivated minds, said Harvey, and if we had more believors in this assertion and more and more workers for prevention and a less number for the cures, the workers for morality and eugenics would gradually cease their labors, for other studies, although kindred, yet for further "look up" and "lift up" interests in which the "God overhead and yet the heart within"

nearer approaches divinity and not a blot, or marred in the making, for "unabridged existence is bestowed on swine, unslain by indulgent codes." (Juvenal). Reader, consult Horace, read Juvenal and learn that it is not only the censor mankind needs, but the law's avenging hand, not screened, by its delay or religion's rites, and that well-established fact that "he is the greatest criminal who poisons the germ cells," and another fact:—"What children usually die of is their parents, and what a nation dies of is its lack of men."

Need I recall the words of Persius (A.D. 34-62): "The Great Father of the gods punishes not in vain cruel oppressors, when dire lust, tinctured with poison impetuous moves the brains of men," etc.,—Magne Pater divum! saevos punire tyrannos, Haud alia ratione velis, quum dira libido moverit inginum, ferent tincta veneno;—Virtutem videant —intabescantque relicta."

Yes, temptations wait for all, as John Boyle O'Reilly says, and even go out and ask the devil home. And it is our duty to act as conservators of the public health, and even to teach or assist "eternal wisdom how to rule," and that each of the sins herein named in various moods,

"Holds such an enmity with blood of man,
That swift as quicksilver it courses thro,
The natural gates and alleys of the body;
And with a sudden vigor, it does posset
And curd like eagre dropping into milk,
The thin and wholesome blood—as told in Hamlet.

Herein are proper sermons (Sermones propria), and he who looks or may look for texts may find them, yes, truly.

Talia sciat oportet qui multa Vult scire. For here is "line upon line, precept upon precept; here a little and there a little." For we well know:

"Heaven doth with us as we with torches do,
Not light us for ourselves alone."

Fully believing with Gladstone that "physicians will become the future leaders of the nations," and that the "she," faultily faultless, icily regular,splendidly null," irregular or defective or impersonal or barren, may learn and we learn and teach God's purpose in her existence; —"He for God only, and she for God in him." However, I ask you, "Read not to criticize, but to accept, or reject, or to consider" this medly, for it is a study and may be of interest for our altars and firesides: ("pro aris et focis.")—as for you, brother, was it prepared that you may be a light to those who are in darkness.

This paper was published by *Therapeutic Record,* Louisville, Kentucky; *Medico-Legal Journal,* New York City, and *Medical Summary,* Philadelphia, Pa.

CURRENT MEDICAL LITERATURE

PROCAINE AND NOVOCAINE.

To the Editor:

It appears that in certain quarters the attitude is taken that the local anesthetic sold as Procaine is not identical with that marketed as Novocaine. The Sub-committee on Synthetic Drugs of the National Research Council believes it important that this misunderstanding should be corrected and hence offers the following explanation:

The monohydrochloride of par-amino-benzoyldiethyl-amino-ethanol, which was formerly made in Germany by the Farwerkevorm, Meister, Lucius and Bruening, Hoechst A. M., and sold under the trademarked name novocaine, is now manufactured in the United States. Under the provisions of the Trading with the Enemy Act, the Federal Trade Commission has taken over the patent that gave monopoly for the manufacture and sale of the local anesthetic to the German corporation, and has issued licenses to American concerns for the manufacture of the product. This license makes it a condition that the product first introduced under the proprietary name "Novocaine" shall be called Procaine, and that it shall in every way be the same as the article formerly obtained from Germany. To insure this identity with the German Novocaine, the Federal Trade Commission has submitted the product of each firm licensed to the A. M. A. Chemical Laboratory to establish its chemical identity and purity, and to the Cornell pharmacologist, Dr. R. A. Hatcher, to determine that it was not unduly toxic.

So far, the following firms have been licensed to manufacture and sell Procaine:

The Abbott Laboratories, Ravenswood, Chicago.
Farbwerke-Hoechst Company, New York, N. Y.
Rector Chemical Co., Inc., New York, N. Y.
Calco Chemical Co., Bound Brook, N. J.

Of these, the first three firms are offering their products for sale at this time, and have secured their admission to New and Nonofficial Remedies as brands of Procaine which comply with the New and Nonofficial Remedies' standards.

While all firms are required to sell their product under the official name "Procaine," the Farwerke-Hoechst Company is permitted to use the trade designation "Novocaine" in addition, since it holds the right to this designation by virtue of trademark registration.

In conclusion: Procaine is identical with the substance first introduced as Novocaine. In the interest of rational nomenclature, the first

term should be used in prescriptions and scientific contributions. If it is deemed necessary to designate the product of a particular firm, this may be done by writing Procaine-Abbott, Procaine-Rector, or Procaine-Farbwerke (or Procaine [Novocaine brand]).

Yours truly,

JULIUS STIEGLITZ,

Chairman Sub-committee on Synthetic Drugs, National Research Council.

P.S.—Professor Stieglitz, Chairman of the Sub-committee on Synthetic Drugs of the National Research Council, has asked me to send you the enclosed letter for publication.

On behalf of the committee, he also urged that you adopted the Federal Trade Commission's recommendation to use the official name of the licensed drugs in connection with all written articles and advertisements, and if the proprietary brand name is to be used, to place this side by side with the official name.

The official names so far adopted by the Federal Trade Commission are:

Arsphenamine for the drug marketed as: Salvarsan, Diarsenol and Arsenobenzol, etc.

Neoarsphenamine for the drug marketed as Neosalvarsan, Neodiarsenol and Novarsenobenzol, etc.

Barbital for the drug marketed as Veronal.

Barbital-Sodium for the drug marketed as Medinal and Veronal-Sodium.

Procaine for the drug marketed as Novocaine.

Procaine Nitrate for the drug marketed as Novocaine Nitrate.

Phenylcinchoninic Acid for the drug marketed as Atophan.

Yours truly,

W. A. PUCKNER.

CHILDREN'S YEAR.

The object of this Movement is to endeavour to rouse the Nation as a whole, to bring to bear upon our Children and Young People every influence that will tend to promote their physical, intellectual and spiritual welfare, and to inspire them with high ideals of character and duty.

It will make its appeal not only to parents, teachers and social workers, but to everyone, who, in any way, however small, may be able to render service either through an organization, or directly to an individual child, and will thus seek to combine all the available resources of the Nation in a supreme effort to protect, guide and ennoble the young

life which is hourly becoming more precious to the Nation and to the race.

No new machinery is being introduced for the attainment of this object, and no financial aid is being solocited. Voluntary agencies, which are already seeking to promote the health, education and religious training of the young, and to equip them for worthy citizenship, have expressed their sympathy with the Movement, and have promised their co-operation.

Most of the principal religious bodies are giving the effort their cordial support, and the practical problems to which it directs urgent attention will receive special attention and consideration at their annual and other meetings this year. It is unsectarian; the Archbishop of Canterbury and the Presidents of the various Free Churches, alike express their profound conviction of the vital importance of making right use of this solemn time for the upbuilding of the new generation upon whom our destiny depends: it is non-political; its demand is universal. Let everyone help in this struggle for the things that matter. What will you do?

Further particulars, handsbill, posters, slides, etc., can be obtained from the Sunday School Union, 56, Old Bailey, London, E.C.

HEPATIC COLIC.

As the first measure for relief of the agonizing pain in this condition Whitla gives a hypodermic injection of morphin, ¼ to 1-3 grain, combined with atropin. Chloroform affords complete relief and allows the passage of the stone through the orifice of Vater, due to the relaxation of the muscles. In mild attacks a large hot poultice or hot pack or stupe may be placed over the liver, but a bath in hot water is even better—105° to 110° F.—together with copious draughts of hot water in which bicarbonate of sodium, 60 grains, and sodium salicylate, 20 grains, have been added to each pint.

When attacks are to be expected the following mixture may be kept on hand and administered as soon as the attack begins:

℞ Liquor. Morphinæ hyd.....f℥iv
Tinct. cannab. ind.....f℥ij
Olei. menthæ pip.....f℥ij
Spt. æther. sulph.....f℥iv
Spt. chloroformi.....f℥vj
Spt. æther. nit.....ad f℥iij

M. ft. mist.

Sig.: A teaspoonful with a tablespoonful of whiskey in a wineglassful of water when the pain comes on. To be repeated in 30 minutes if the pain continues and every 2 hours thereafter until relief is obtained.

Whitla also suggests olive oil as a measure for relief during the attack. It may be given in doses of 5 or 6 ounces, combined with a tablespoonful of whiskey or brandy, and 5 drops of oil of peppermint. Fifteen ounces of the warm oil may also be injected into the rectum. In the after-treatment olive oil may be given in 4 to 8-ounce doses on an empty stomach.—*Dictionary of Treatment; Medical Record.*

—*The Medical World.*

ARSPHENAMIN.

J. C. Sargent, Milwaukee (*Journal A. M. A.*, March 30, 1918), reports his experience with the new salvarsan, now being made in New York by representatives of the Farbwerke-Hoechst Company of Germany. He concluded to first try it on five patients who had reported for an arsphenamin treatment. Three ampules each containing 0.3 gm. of arsphenamin, were dissolved in 225 c.c. of sterile water which had been distilled less than two hours before. After the arsphenamin was entirely dissolved, the solution was alkalized by the addition of sufficient quantity of 15 per cent. sodium hydroxid to form and redissolve the precipitate. The technic was the same as had been used in 200 previous cases of salvarsan administration. In four of the cases there was a disagreeable reaction, in some apparently worse than in others. The symptoms observed were cyanosis, nausea, vomiting, chills, fast thready pulse and headache. Only one patient escaped the reaction. He has therefore abandoned the use of this particular make of the drug, and realizing the wide reputation it had gained while still made in Germany, he offers his experience for the benefit of others.

PROGNOSIS AND TREATMENT OF LARYNGEAL TUBERCULOSIS.

J. Dworetzky, of Otisville, New York, summarizes his views on laryngeal tuberculosis, citing cases from the Municipal Sanatorium to illustrate his points. Under prognosis the following factors are discussed:

1. The pulmonary condition. The character rather than the extent of the lesion determines the gravity of the individual cases. Other things being equal, however, smaller lesions are more favorable.

2. General condition, as indicated by temperature, pulse and respiration. A rapid pulse or steady subnormal temperature are frave prognostic signs.

3. Uuderlying disease. Gastro-enteritis or syphilis aggravate the prognosis by lowering the general vitality.

4. Type of laryngeal lesion. In the peracute type the condition is hopeless. Acute cases sometimes recover. Chronic cases are the most favorable.

5. Location of the lesion. When situated on the posterior commissure or on the true cords, where the mucous membrane is closely adherent, the disease takes a chronic course and the prognosis is more favorable.

6. The extension of the lesion does not necessarily influence the prognosis for life though a small lesion has less effect on the voice.

7. Early diagnosis is important especially in the subacute and chronic cases which are more amenable to treatment.

8. Early treatment improves the prognosis.

9. Complications. Neighboring inflammatory conditions tend to lower the resistance of the larynx.

10. Financial status. Ample financial resources, making possible a prolonged "cure" necessarily enhance the prognosis.

Treatment is considered under three headings, prophylactic, general and local.

1. Under prophylaxis is advised, proper care of mechanical and inflammatory conditions of the naso-pharynx, avoidance of abuse of the voice and of local irritants.

2. Since laryngeal tuberculosis is always secondary to pulmonary tuberculosis the main issue would be disregarded if the lung condition were not considered and dealt with.

3. Local treatment will vary with the individual cases. Need of vocal rest and treatment by various solutions looking toward cure or relief are discussed.—Dworetzky, J.: The Prognosis and Treatment of Tuberculosis Lesions of the Larynx, *Am. Rev. Tub.*, 1918, Vol. 2, No. 1.

RESECTION OF NASAL SEPTUM.

The early operations for resection of the nasal septum were often incomplete or unsuccessful, and further relief was called for, so G. W. Mosher, Chicago (*Journal A. M. A.*, March 23, 1918), says and he has tried various methods with varying success to correct the condition. Recently he has adopted the following method which has proved satisfactory so far. He makes a Kilian incision on the convex side, elevating the membrane as completely as possible without disturbing the part attached to the opposite membrane and incises the cartilage anterior to the old window and elevates the other membrane. He uses a Freer knife or sharp elevator, and works from within outward to the side of the first incision, cutting as cleanly as possible around the adherent mucosa, leaving it attached to the other mucosa, thus making

a corresponding hole in the incised membrane. This method gives a minimum of traumatism and healing, is little, if any, slower than in an uncomplicated case, and the outcome comparable to that of a typical primary operation.

QUICK DETECTION OF SPIROCHETA PALLIDA.

Dr. W. H. S. Stalkartt, of the British Navy, communicates to the *British Medical Journal* a method for the speedy detection of treponema pallidum, which he says is well known, although its originator is lost to fame. Doctor Stalgartt's directions are as follows:

Take a smear of blood and serum from the sore, the exudate being obtained after cleaning and rubbing or scraping the sore, or making a small incision in its margin. The sore should not previously have been treated with antiseptics, or, if it has, should be dressed for several days with a simple saline dressing.

1. Fix in 1 per cent. glacial acetic acid and 8 per cent. formaldehyde solution. Rough dry the slide.
2. Wash in alcohol and flame off.
3. Gently heat in 5 per cent. solution of tannic acid.
4. Wash in water and stain with slightly warmed ammoniated silver nitrate solution. (To a 5 per cent. solution of silver nitrate add ammonia solution until the precipitate first formed is just dissolved; add a few more drops of silver nitrate solution until the precipitate just reappears.)
5. Wash in distilled water and dry.

The films should be chestnut color. If they have only become yellow the staining from the tannic acid onward should be repeated at once.

The slides must *not* be mounted in balsam, but examined in neutral cedar wood oil in the ordinary way. The spirochetes are very clearly demonstrated by this method.—*The Medical World.*

SINUSITIS.

J. G. Parsons (*Journal of Ophthalmology and Otolaryngology*) calls the attention of the general practitioner to the importance of infection of the accessory sinuses as a possible cause of systemic disturbance, and emphasizes the fact that in many cases the diagnosis of the common forms of sinusitis should be made by the attending physician. Infection of the sinuses is known to be a frequent cause of severe headache and neuralgia. Fever, a sense of fullness in the head, tenderness on pressure, headache, neuralgic pains, and a discharge of pus, observed on nasal examination, should arouse suspicion of impending trouble. White or yellow thick discharge from the nose is pus. While

the presence of pus points strongly to sinus involvement, the absence of pus does not necessarily prove the absence of sinus disease. In frontal, ethmoidal, and sphenoidal infection, there is always a possibility of meningitis. Serious eye disease may result from the infection of the ethmoidal or the sphenoidal sinus through the involvement of the optic nerve or from orbital abscess; irritation and congestion may be caused by pressure on nerve and blood distribution. These various cavities are significant as focal points of infection, as the products resulting from the infection are readily retained by the labyrinthine structure of the parts. The chronic discharges are sometimes important factors in causing infections of the lower respiratory tract and the intestinal canal.

Both local and general treatment is required. Cleaning the nasal cavities by Dobell's solution or oily liquids, application of ichthyol or isarol solution, and the use by the patient at home of Dobell's or an oily solution are necessary. Injections of vaccine containing staphylococcus albus, aureus and citreus result in wonderful improvement.—*The Medical World.*

PERSONAL AND NEWS ITEMS

In the first year medical class at the University of Toronto, 220 students have been registered, as against 171 a year ago.

Dr. (Lt.-Col.) H. R. Casgrain, who has been overseas at Hospital No. 8 in France, has been decorated with the Cross of the Legion of Honor. He is at present in England.

Dr. T. L. McRitchie, M.O.H. for Chatham, who was so active in his efforts to check the epidemic of typhoid fever in that city, was taken ill some time ago with the disease.

Dr. Walter McKeown, of Toronto, who went overseas with the University of Toronto Base Hospital, is now in command of Richville Hospital, Brighton, England, and has been made a full Colonel.

Dr. H. W. Hill, of London, has returned to Minnesota. His absence is a great loss to health work in this Province.

We note with pleasure that Dr. E. Fraser Bowie, of Toronto, has been chosen as Supreme Medical Examiner for the Ancient Order of United Workmen as successor to Dr. J. Milton Cotton, deceased.

Major (Dr.) E. Young has returned from France, and has assumed command of the Military Hospital at Cobourg.

Dr. D. A. Carmichael has gone from the Calydon Sanatorium, Gravenhurst, to take charge of the Jordan Memorial Sanatorium, New Brunswick.

Hon. Dr. Roche was removed from Minnedosa. Man., to Ottawa, where he enters upon his duties of chairman of the Civil Service Commission.

Dr. Duncan Graham has become head of the medical department of the University of Toronto Hospital at Basingstoke, succeeding Dr. Parsons.

Dr. (Capt.) John N. Humphrey, R.A.M.C., of Tara, has been awarded the Military Cross. He has seen service in Malta. Egypt, Port Said, at Salonica, in France, and Italy.

Dr. H. A. Stewart, of Saskatoon, Sask., has been elected to represent the College of Physicians and Surgeons of that Province on the Senate of the University of that Province.

Dr. F. J. Shepherd, of Montreal, has been investigating Goitre in Alberta in behalf of the Committee on Conservation in Canada.

Lt.-Col. J. N. Gunn, C.M.G., Toronto, formerly officer commanding the 8th Canadian Field Ambulance in France, is now Assistant Deputy Director of Medical Services in Military District No. 14 at Calgary.

Lt.-Col. Andrew Croil, Saskatoon, who was in France for some time, is now in charge of the Surgery at Camp Hill Military Hospital, Halifax.

Dr. D. E. Staunton Wishart, of Toronto, who did splendid service in Egypt, is now in connection with the University Hospital at Basingstoke.

Lt. M. Wallace, son of the late Dr. M. Wallace, of Toronto, was recently killed in action. He won the Military Cross for bravery in the field.

The following doctors of Toronto have recently lost sons in the war: Dr. G. H. Burnham, Dr. W. Harley Smith, Dr. J. H. McFaul.

Lt.-Col. C. E. McVicar, Toronto, was home for a short furlough, but has returned to duty. He was one of the staff of the University Hospital. He was mentioned in despatches.

A hospital for American soldiers has been opened at Liverpool, England. The hospital was the home of Dr. Edmund Muspratt, who turned it over to the American Red Cross.

The fund in aid of Notre Dame Hospital, Montreal, has reached the sum of $267,153. This secures another sum of $100,000 from Sir Rudolphe Forget.

The officers of the Medical Council of Canada are: Hon. Prest., Sir T. G. Roddick, Montreal; President, Dr. R. Eden Walker, New Westminster, B. C.; Vice-President, Dr. J. C. Connell, Kingston; Registrar, Dr. R. W. Powell, Ottawa; Legal Counsel, F. H. Chrysler, K.C., Ottawa.

Dr. Arthur J. Johnson's son, while in command of a battery in France, won the Croix de Guerre for signal bravery.

In 1913 the Vancouver General Hospital had room for a little over 200 patients. Now it has accommodation for 1,200. The expenses are $60,000 a month.

Dr. Franklin Johnson, formerly of the Social Service Department of the University of Toronto, has gone to Washington as Director of Civilian Relief for the Insular and Foreign Division of the American Red Cross.

Dr. Richard C. Coatsworth, M.C., has arrived home in Toronto on furlough after three years' service with the R. A. M. C.

Bombing of a hospital train of sixteen cars by German airmen near the Belgian front was reported in Red Cross cables received recently. Many of the doctors and nurses lost all their personal belongings, and in many cases their surgical and medical kits. The iatter were immediately replaced by the Red Cross.

Word was received by Dr. Michael Clark, M.P. for Red Deer, on 20th September, that his eldest son, Michael, had been killed in action. Corp. Michael Clark leaves a wife and two children. Dr. Clark has two other sons at the front.

Dr. F. N. G. Starr went overseas a short time ago. He arrived safely in the later part of September, and has been appointed a consulting surgeon to the British Forces in France.

Capt. E. V. Frederick, just arrived home from service in Mesopotamia and India, is one of three Campbellford doctors who went overseas in a party of 35 medical men early in the war. Originally assistant senior surgeon with No. 1 Stationary Hospital, Capt. Frederick was with the R.A.M.C. at Cairo as a lieutenant in the spring if 1916, and has been given his captaincy since then. He is an M.B. of Toronto University with class '03, and was formerly of Peterboro'.

Col. Gardiner, A.D.M.S. for the third military district, has announced that the medical officers from the district who are to serve in the Siberian contingent have been selected. The men who are going all offered their services. No date has been set as yet for their departure, but the following have been authorized: Hendry Connell, J. H. Munroe, J. A. Lalonde, S. J. R. Horne, J. Sharp and F. S. Tisborne. All the men have been graded as lieutenants.

Col. Perry G. Goldsmith, of Toronto, was one of the first doctors to go overseas. He reached France before the first Canadian Contingent. He has done excellent work as a specialist, and has been made a full Colonel.

In order to keep up the supply of doctors and dentists, an order has been adopted permitting all one-year medical and dental students who wish to go on with their studies to return home from England and France.

Lt.-Col. E. Stanley Ryerson, who has been in command of the medical affairs of the Toronto district, has resigned to resume his regular practice. He has been succeeded by Lt.-Col. L. E. W. Irving, D.S.O.

The Hamilton Trades and Labor Council submitted a motion asking that Provincial Governments be petitioned to appoint a surgeon to inspect all cases brought into hospitals for operations. The motion contended that the people were at the sole mercy of the medical profession in the performance of operations, large numbers of which were, in the opinion of the Council, unnecessary.

Dr. Mary Lee Edward, a Petrolea girl, only daughter of A. C. Edward, is one of three women surgeons of New York serving in the military hospital in France who have been decorated by the French Government, and made Lieutenants, for eminent surgical services performed under heavy bombardment.

The city of Chatham was visited recently by a very severe epidemic of typhoid fever. At one time there were 184 cases.

The project of building and equipping a Chicago hospital in Paris immediately at the close of the war as a tribute to the nations whose sons fought together is progressing favorably.

Many French soldiers were killed or injured when a German airplanebombarded a hospital at Chalons on the night of October 1-2. At the time of the raid German prisoners were being sheltered in the cellars of the hospitals.

Dr. Thomas E. Case, of Dungannon, Huron County, has been nominated for the Ontario Legislature.

-Lt.-Col. C. S. McVicar, 300 Roncesvalles ave., who returned from overseas last month after three years' service, has been appointed senior physician at the Spadina Military Hospital. He went to Saloniki with the University Hospital, and was home on leave last fall. When he returned to England he was given charge of a department at the Ontario Government's Hospital at Orpington, Eng.

Miss Martha Hunter Hoa Hing, a Chinese woman doctor, has just been elected house surgeon at the Alexandra Hospital for Children, Dyke road, Brighton. Miss Hoa Hing, who is L.R.C.P., L.R.C.S., Edinburgh, and L.R.F.P.S., Glasgow, has been in England about seven years, and took her diplomas in 1916. She has a brother in the British army.

Capt. (Dr.) Leroy J. Snider was recently wounded at the front. He graduated in 1916, and immediately left for service. He was in Mesopotamia for some time.

A large factory building on Christie street, Toronto, is being converted into a military hospital, and will be ready by the end of the year with accommodation for one thousand beds.

The Germans deliberately bombed an American hospital in France, and killed eight patients. The hospital was raided on two successive nights.

Major Cleland, of 131 Bloor street west, Toronto, who will be the senior surgeon with the Canadian Expeditionary Force to Siberia, left the city recently for the Pacific coast, where the force is to be mobilized.

OBITUARY

THOMAS SIMPSON, M.D.

Dr. Simpson graduated from McGill in 1854, and was in his 86th year when he died. He studied in Edinburgh, London, and Paris. For a number of years he practised in Algoma District, Ontario, but finally settled in Montreal, and became attached to the Western Hospital in that city. He was at one time a professor in Bishop's College.

HUGH LANG, M.D.

Dr. Lang died at his home in Granton, Ontario, in his seventy-second year. He was a graduate of the University of Toronto, and settled in Granton, where he continued in practice till his death, which was caused by apoplexy. He was a highly esteemed practitioner.

H. WALKER, M.D.

Dr. Walker, of Kamloops, B.C., died on the 12th July. He was born in Ingersoll, Ontario, and graduated from the University of Toronto. He had resided at Wetaskiwin for fifteen years and was medical officer to the Indian Reserve.

CAPT. W. C. O'DONOHUE, M.D.

Capt. W. C. H. O'Donohue, M.D., whose home was in Westport, Ont., but who had been Medical Officer for the Second Depot Battalion, and prior to that for the Siberian force quartered at Connaught Park, died of influenza in Walter street Hospital, Ottawa, after a very short illness.

LT. L. G. JAMIESON, M.D., R.A.M.C.

Dr. Jamieson was in practise in Grimsby, but offered his services for overseas duties. He joined the Royal Army Medical Corps. After serving in England and France, he went to Egypt and Palestine. He was in his thirty-fourth year, and graduated from Toronto Medical School in 1908. He was accidentally killed.

W. M. BRUCE, M.D.

Dr. W. M. Bruce, of Toronto, died at the age of sixty-six years.

TANCREDE FORTIER, M.D.

Dr. Fortier, of Beauce, Quebec, died at the Hotel Dieu Hospital, Quebec, after a long illness.

E. J. LEARY, M.B.

Dr. Leary, who graduated from Toronto University in 1917, was drowned in Meat Bird Lake, near Sudbury, last August. He was in his 28th year, and engaged with the Canadian Copper Company.

E. R. HENAN, M.D.

On 10th September, at the home of his nephew, Dr. Edwards, Robert Henan, of Churchville, passed away in his eighty-fourth year. He was born on the homestead, which his father purchased from the Crown for $400 when the country was only a bush, and had lived there until 1916. He was unmarried and is survived by two sisters, Mrs. Edwards, of Whaley Corners, and Mrs. Cummings, of Clarkson, the former 80 and the latter 86 years of age.

R. S. McALPINE, M.D.

Dr. R. S. McAlpine died on 20th September, at his residence in Petrolea, in his seventy-eighth year, after some weeks of feeble health. He graduated from Toronto School of Medicine in 1864, and practised continuously since then, twenty-four years in Parkhill and twenty-nine years in Petrolea. His only son is on active service in France. Two daughters in Petrolea also survive him. He was born in Warwick township, county of Lambton.

LIEUT. C. H. FRANCY, M.D.

The funeral took place at Stouffeville, Ont., on 2nd October, of Lieut. C. H. Francy, M.D., who formerly practised his profession in York county, and who died on September 29 in Camp Eustis, Virginia, from Spanish influenza, which he had contracted while serving with the medical services of the United States army. Lieut. Francy had practised in the United States for some years. He is survived by his widow and one son in Gormley.

JAMES RICHARD NIXON, M.D.

Dr. Nixon, of Georgetown, was attending a soldier who was ill wnth influenza and contracted the disease. After an illness of three days the doctor died on 4th October.

J. ALEXANDER FERGUSON, M.D.

Dr. Ferguson died at his home at Saulte Ste. Marie, on 4th October, at the age of 43. He was intered from his sisters home, Mrs. Gillie, of Hamilton.

BOOK REVIEWS

OTOLOGY.

A Manual of Otology. By Gorham Bacon, A.B., M.D., F.A.C.S., formerly Professor of Otology in the College of Physicians and Surgeons, Columbia University, New York; Aural Surgeon, New York Eye and Ear Infirmary; Consulting Otologist, Roosevelt Hospital, Hospital for Ruptured and Crippled, Minturn Hospital, New York, and Vassar Brothers' Hospital, Poughkeepsie, New York. Assisted by Truman Laurence Saunders, A.B., M.D., Assistant Professor, Laryngology and Otology, College of Physicians and Surgeons, Columbia University, New York; Aural Surgeon, New York Eye and Ear Infirmary; Attending Aural Surgeon, Minturn Hospital; Assistant Surgeon, Department of Laryngology and Otology, Bellevue Hospital, New York. Seventh revised and enlarged edition, with 204 illustrations and 2 plates. New York and Philadelphia: Lea and Febiger, 1918. Price, $3.00.

We have had the pleasure of reviewing this excellent manual on the occasion of the appearance of former editions. Any words of commendation then made use of can now be repeated with added emphasis. The author, in the first instance, produced an excellent guide to the diseases of the ear; and has spared no pains to keep it fully up to date. Professor Bacon has associated with him in this edition the name of Dr. Truman L. Saunders. We have examined the portions of the book contributed by the associate author, and can cordially recommend them. What he has done speaks well for the future of the book. The work is of convenient size and price, and an ideal monograph for the general practitioner; but we think the specialist would profit by possessing this book also, as it sets fourth what two experienced aurists have to say.

COL. G. G. NASMITH'S BOOK.

On the Fringe of the Great Fight. By Col. George G. Nasmith, C.M.G. New York: George H. Doran Company. Price, $1.50.

Col. Nasmith has long been known, first in Toronto, then throughout Canada, and finally in the present great war, as a thoroughgoing scientist. He is a bacteriologist, a water specialist, and sanitarian, and a keen sighted student of preventive medicine. His book is delightful reading, because the author can express himself in such a pleasing way. It is also most profitable reading for the information set forth in its pages. During the time that Col. Nasmith was in France he made a

truly great name for himself by the splendid way in which he organized the sanitary concerns of the Canadian Army; and thereby set an example for the other allied armies to follow. Homer said that "a physician skilled our wounds to heal is more than armies to the nation's weal." This can be said in a still greater degree of him who prevents disease. Had it not been for the sanitary care over the soldiers the war would have been lost long ago. This book should be read by all.

BRACTERIOLOGY, BLOOD WORK, AND ANIMAL PARASITOLOGY.

Practical Bacteriology, Blood Work and Animal Parasitology, including Bacteriological Keys, Zoological Tables and Explanatory Clinical Notes. By E. R. Stitt, A.B., Ph.G., M.D., Medical Director, U. S. Navy; Commanding Officer and Head of Department of Preventive Medicine, U. S. Naval Medical School; Graduate, London School of Tropical Medicine; Professor of Tropical Medicine, Georgetown University; Lecturer in Tropical Medicine, Jefferson Medical College; Professor of Tropical Medicine, George Washington University; Member, National Board of Examiners; Member, Advisory Board, Hygienic Laboratory; formerly Associate Professor of Medical Zoology, University of Philippines. Fifth edition, revised and enlarged, with 1 plate and 144 other illustrations, containing 598 figures. Philadelphia: P. Blakiston's Son and Company, 1012 Walnut Street. Price, $2.00.

A few words of praise of this book is a very inadequate way of setting forth its many merits. Every page contains ample proof of the thorough grasp the author has of the subject matter with which he is dealing. The book is a very deceiving one as to the amount of ground covered; for, though a medium sized book, owing to the thinness of the paper and the close set type, it contains a complete account of the topics discussed. The illustrations are numerous and well chosen, and the text is clear and easily understood. This work can be recommended to the entire medical profession; as it is indispensable to the scientific worker on the one hand, and most useful and interesting to the general practitioner. No one would make a mistake by securing a copy of this book.

DISEASES OF THE MALE URETHRA.

Diseases of the Male Urethra. By Irvin S. Koll, M.D., Professor of Genito-Urinary Diseases; Post-Graduate, Medical School and Hospital, Chicago. Octavo of 151 pages, with 123 illustrations, several in colors. Philadelphia and London: W. B. Saunders Company, 1918. Cloth, 14s. net. The J. F. Hartz Company, Toronto, Canadian agents.

Dr. Koll writes as one with authority to speak on diseases of the urethra. He has had much experience and has made good use of it in the preparation of this book. The book is well illustrated and will afford pleasure and profit to all who make use of its pages. There is an account of the anatomy of uretha. Then follow several chapters dealing with

gonorrhoea. Stricture is very fully discussed. The author also takes up sterility, impotence, and some other topics. The directions on treatment throughout are first class. The book is most timely.

PROGRESSIVE MEDICINE.

A Quarterly Digest of Advances, Discoveries and Improvements in the Medical and Surgical Sciences. Edited by Hobart Amory Hare, M.D., Professor of Therapeutics, Materia Medica and Diagnosis in the Jefferson Medical College, Philadelphia. Assisted by Leighton F. Appleman, M.D., Instructor in Therapeutics, Jefferson Medical College, Philadelphia. September, 1918. Philadelphia and New York: Lea and Febiger. $6.00 per annum.

The contents of this volume are Diseases of the Thorax by William Ewart, F.R.C.P.; Dermatology and Syphilis by W. S. Gottheil, M.D.; Obstetrics by E. P. Davis, M.D.; Diseases of the Nervous System by W. G. Spiller, M.D. This is one of the best numbers of a long series of superior issues. We can most cordially recommend Progressive Medicine. It should be in the hands of every practitioner.

CLINICAL DIAGNOSIS.

Clinical Diagnosis. A Manual of Laboratory Methods. By James Campbell Todd, M.D., Professor of Pathology, University of Colorado. Fourth edition, revised and re-set. 12 mo. of 687 pages, with 232 text-illustrations and 12 colored plates. Philadelphia and London: W. B. Saunders Company, 1918. Cloth, 14s. net. The J. F. Hartz Company, Toronto, Canadian agents.

This edition covers the ground of former editions. The author takes up the microscope, the sputum, blood, urine, stomach, faeces, animal parasites, bacteriological methods, preparation and use of vaccines, serodiagnostic methods, and some miscellaneous examinations. The work is enriched by 232 illustrations, a number of useful tables, and the formulae for the many stains and reagents required. We congratulate the author and the publishers on the continued very high merits of this book. It is just the sort of book that every worker in this field should have. It has also a distinct value for the general practitioner.

MILITARY MEDICAL ADMINISTRATION.

Details of Military Medical Administration. By Joseph H. Ford, B.S., A.M., M.D., Colonel, Medical Corps, U. S. Army. Second revised edition, with 30 illustrations. Published with the approval of the Surgeon-General of the U. S. Army. Philadelphia: P. Blakiston's Son and Company, 1012 Walnut Street. Price, $5.00.

This highly attractive volume has the special endorsation of Surgeon-General Gorgas, who speaks of the author's personal experience regarding the subjects that are discussed in the book. These are in brief: Military Medical Administration, Medical Officers' Vocations, The Regimental Surgeon, Ambulance Work, Field Hospitals, Camp Hospi-

tals, Sanitary Squads, Division Surgeons, Evacuation of Sick and Wounded, Hospital Trains, Hospital Ships, Base Hospitals, Sanitary Service Posts, Department Surgeon's Office,Public Health Service, Medical Supply Depots, Examination of Recruits, Voluntary Aid, Malingering. Each one of these topics is dealt with in detail and clearly. At this juncture of the world's history this book must prove of the utmost value to the medical profession, and especially military medical men and surgeons.

MILITARY SURGERY.

Medical War Manuals No. 7. Authorized by the Secretary of War and under the supervision of the Surgeon-General and the Council of National Defence. On the Zone of the Advance, by George de Tarnowsky, M.D., F.A.C.S., Surgeon to Cook County and Ravenswood Hospitals, Chicago; Major, M. C., U. S. R., American Expeditionary Force, France, 1917-17. Illsutrated. Philadelphia and New York: Lea and Febiger, 1918. Price, $1.50.

This number of a very superior series of manuals covers the duties of the military surgeon on the zone of the advance. The author has something to say about the First Aid Station, the Front Zone, Projectiles, Bacteriology of War Wounds, Traumatic Shock, Hemorrhage, Tissue Wounds, the Treatment of Wounds, Tetanus, the Gas-bacillus, Cranial Injuries, the Injuries of the Face, Thorax, Abdomen, Bladder, Spine, and the Joints, Burns, Trench-foot, X-Rays, and the Carrel-Dakin Solutions used in the present war. This little manual should be in the possession of everyone who has anything to do with military surgery. The book is a most useful one.

MISCELLANEOUS

NEED FOR NURSES IN THE U. S.

Denial of recently published reports that the nursing needs of the army had been met has been made by Brig. Gen. Charles Richard, acting surgeon-general, who stated that 25,000 nurses must be obtained before the end of the year.

"A continued effort must be made by the Red Cross to enroll women if the needs of the army are to be supplied," General Richard said. "It is estimated that before July 1 next we must have 50,000."

VICTORY FOR MEDICAL SCIENCE.

A victory of science over the Huns not less important than a first-rate military triumph of Allied arms is contained in the announcement made by Major Pilcher, of Brooklyn, before the American Red Cross Research Society in Paris that a cure has been found for gas gangrene.

that prescribed for use of the Carrel-Dakin treatment, which has been the significance of the discovery will be appreciated when it is known that the majority of limb amputations are due to wound infections caused by gas gangrene. Major Pilcher has been at the front only a short while, but has made enough experiments with his new cure to justify his claim that the treatment of gas gangrene will be revolutionized. Quino-formol is what the new solution is called, and it is compounded of quinine, acetic and hydrochloric acids, and formalin, thymol and salt. It is said that it has the advantages of simplicity of preparation, stability and portability. According to Naboth Hedin, "its strength is eacily varied without impairing its properties, and it is suitable for the initial treatment of wounds at dressing stations or evacuation hospitals."

Recent tests of quino-formol made at the Auteuil hospital during the recent influx of seriously wounded soldiers showed just one failure, and in six weeks not a single amputation was performed, undoubtedly a record since the beginning of the war. Dr. Pilcher says that his remedy is not a cure-all, but is applicable only where proper surgical methods have been taken already. Application of the solution is identical with that prescribed for use of the Carrel-Dakin treatment, which has been often used in conjunction with quino-formol. We can imagine hardly any medical discovery that would be so heartily welcomed by soldiers as one that would reduce the percentage of amputations. Many soldiers would no doubt prefer instant death to a wound that would make them helpless cripples for the remainder of their days.

W. A. D. ORGANIZE FOR HOSPITAL WORK.

The Department of Militia and Defence has, in co-operation with the St. John Ambulance Brigade, made arrangements for the establishment of a woman's aid department (W.A.D.) for work in the several military hospitals and convalescent hospitals throughout the Dominion. This department will be organized in three divisions:

(1) V. A. Division:
(a) V. A. D. Nursing Service.
(b) V. A. D. Trainers.
(2) Special Service Division:
Masseuses.
(3) General Service Division:

Housekeepers, clerks, stenographers, typists, telephone operators, head cooks, cooks, etc.

Each hospital will have a general service superintendent and larger ones an assistant superintendent. The rates of pay and terms of engagements will be announced immediately.

UNIVERSITY OF TORONTO FOURTH YEAR MEDICAL EXAMINATIONS.

Pass—D. B. Avison, Miss H. Y. Bell, T. P. Carter, E. B. Clouse (Clinical Medicine). D. Esser, N. F. W. Grahham, D. Halliday, Miss M. G. Kerr, N. N. Kirkup, H. B. Lane, H. Lipsett, W. D. Logie, D. Muir, C. V. Mulligan, W. S. McClinton, A. L. McLean (Pathology and Pathological Chemistry), W. L. Spratt, M. E. Tiffin.

TORONTO'S VITAL STATISTICS.

An increase in births, marriages and deaths is reported by the city clerk. In September no deaths from measles or scarlet fever were reported. The vital statistical report for September as compared with September last year and August this year is as follows:

	Sept. 18	Sept. 17	Aug. 18
Births	1078	936	1077
Marriages	475	444	342
Deaths	484	470	441

The following deaths from contagious diseases occurred:

	Sept. 18.	Sept. 17.	Aug. 18.
Smallpox	0	0	0
Scarlet fever	0	0	0
Diphtheria	4	4	4
Measles	0	0	0
Typhoid	4	2	0
Tuberculosis	12	20	17
Meningitis	2	1	0