

## Technical and Bibliographic Notes / Notes techniques et bibliographiques

The Institute has attempted to obtain the best original copy available for scanning. Features of this copy which may be bibliographically unique, which may alter any of the images in the reproduction, or which may significantly change the usual method of scanning are checked below.

- Coloured covers /  
Couverture de couleur
- Covers damaged /  
Couverture endommagée
- Covers restored and/or laminated /  
Couverture restaurée et/ou pelliculée
- Cover title missing /  
Le titre de couverture manque
- Coloured maps /  
Cartes géographiques en couleur
- Coloured ink (i.e. other than blue or black) /  
Encre de couleur (i.e. autre que bleue ou noire)
- Coloured plates and/or illustrations /  
Planches et/ou illustrations en couleur
- Bound with other material /  
Relié avec d'autres documents
- Only edition available /  
Seule édition disponible
- Tight binding may cause shadows or distortion  
along interior margin / La reliure serrée peut  
causer de l'ombre ou de la distorsion le long de la  
marge intérieure.
  
- Additional comments /  
Commentaires supplémentaires:

L'Institut a numérisé le meilleur exemplaire qu'il lui a été possible de se procurer. Les détails de cet exemplaire qui sont peut-être uniques du point de vue bibliographique, qui peuvent modifier une image reproduite, ou qui peuvent exiger une modification dans la méthode normale de numérisation sont indiqués ci-dessous.

- Coloured pages / Pages de couleur
- Pages damaged / Pages endommagées
- Pages restored and/or laminated /  
Pages restaurées et/ou pelliculées
- Pages discoloured, stained or foxed/  
Pages décolorées, tachetées ou piquées
- Pages detached / Pages détachées
- Showthrough / Transparence
- Quality of print varies /  
Qualité inégale de l'impression
  
- Includes supplementary materials /  
Comprend du matériel supplémentaire
  
- Blank leaves added during restorations may  
appear within the text. Whenever possible, these  
have been omitted from scanning / Il se peut que  
certaines pages blanches ajoutées lors d'une  
restauration apparaissent dans le texte, mais,  
lorsque cela était possible, ces pages n'ont pas  
été numérisées.

## The Northwest Lancet.

*Glean from the journals of the World all that is new in Medicine, Surgery and Pharmacy, placing monthly before its readers in a condensed form Medical, Surgical, Obstetrical and Pharmaceutical advances in both hemispheres.*

WINNIPEG, AUGUST, 1889.

### CANADA MEDICAL ASSOCIATION.

The first meeting of the Canada Medical Association for 1889 was held in the Moulton Park Pavilion, Banff Park, on the 12th. The party arrived the previous evening, and numbered about 130. They were immediately driven to the Canadian Pacific Railway Hotel, where supper awaited them. At 10.30 on the following day the meeting was called to order by Dr. Ross, the retiring President, who gave place to Dr. Wright, the President elect. After an address of welcome was delivered by Dr. Brett, the resident physician to the Sanitarium, the President delivered his address. He eulogized the late Dr. Howard and expatiated on the unrivalled attractions of Banff. He next reviewed the growth of medical institutions in Manitoba and British Columbia. The meeting adjourned at 1, and was opened again at 8.30, and was occupied for the most part in discussions regarding amendments and alterations in the by-laws of the Association. The visitors expressed themselves as delighted with their trip, and as very greatly impressed with the grandeur and beauty of the mountain scenery, and predicted a great future for this magnificent people's Park. Dr. Brett was elected vice-president of the Society for the Northwest. As no stenographer accompanied the party, we are unable to give a verbatim report of the papers read, more particularly as the profession in Manitoba was not represented at the meeting. As far as we can gather, just one medical man from Winnipeg attended. The meeting was regarded more as an outing for our medical confreres in the East; to enable them to become acquainted with our glorious Prairie Province and the far-famed grandeur

of the Rocky Mountain scenery; with the curative agencies of the Banff mineral springs—combining a modicum of work with an ocean of pleasure.

### NOTE ON THE EFFECTS PRODUCED ON MAN BY THE SUBCUTANEOUS INJECTIONS OF A LIQUID OBTAINED FROM THE TESTICLES OF ANIMALS.

BY DR. BROWN-SEQUARD, F.R.S., ETC.

On the 1st of June last I made at the Societe de Biologie of Paris a communication on the above subject, which was published in the *Comptes Rendus* of that Society on June 21st (No. 24). I will give here a summary of the facts and views contained in that paper and in two subsequent ones, adding to them some new points.

There is no need of describing at length the great effects produced on the organization of man by castration, when it is made before the adult age. It is particularly well known that eunuchs are characterized by their general debility and their lack of intellectual and physical activity. There is no medical man who does not know also how much the mind and body of men (especially before the spermatic glands have acquired their full power, or when that power is declining in consequence of advanced age) are affected by sexual abuse or by masturbation. Besides, it is well known that seminal losses, arising from any cause, produce a mental and physical debility which is in proportion to their frequency. These facts and many others have led to the generally admitted view that in the seminal fluid, as secreted by the testicles, a substance or several substances exist which, entering the blood by resorption, have a most essential use in giving strength to the nervous system and to other parts. But if what may be called spermatic anemia leads to that conclusion, the opposite state, which can be named spermatic plethora, gives as strong a testimony in favor of that conclusion. It is known that well organized men, especially from twenty to thirty-five years of age, who remain absolutely free from

sexual intercourse or any other causes of expenditure of seminal fluid, are in a state of excitement, giving them a great, although abnormal, physical and mental activity. These two series of facts contribute to show what great dynamogenic power is possessed by some substance or substances which our blood owes to the testicles.

For a great many years I have believed that the weakness of old men depended on two causes—a natural series of organic changes and the gradually diminishing action of the spermatic glands. In 1869, in a course of lectures at the Paris Faculty of Medicine, discussing the influence possessed by several glands upon the nervous centres, I put forward the idea that if it were possible without danger to inject semen into the blood of old men, we should probably obtain manifestations of increased activity as regards the mental and the various physical powers. Led by this view, I made various experiments on animals at Nahant, near Boston, (United States), in 1875. In some of those experiments, made on a dozen male dogs, I tried vainly, except in one case, to engraft certain parts or the whole body of young guinea-pigs. The success obtained in the exceptional case served to give me great hopes that by a less difficult process I should some day reach my aim. This I have now done. At the end of last year I made on two old male rabbits experiments which were repeated since on several others, with results leaving no doubt as regards both the innocuity<sup>1</sup> of the process used and the good effects produced in all those animals. This having been ascertained, I resolved to make experiments on myself, which I thought would be far more decisive on man than on animals. The event has proved the correctness of that idea.

Leaving aside and for future researches the questions relating to the substance or substances which, being formed by the testicles, give power to the nervous centres and other parts, I have made use, in subcutaneous injections, of a liquid contain-

ing a small quantity of water mixed with the three following parts: first, blood of the testicular veins; secondly, semen; and thirdly, juice extracted from a testicle, crushed immediately after it has been taken from a dog or a guinea-pig. Wishing in all the injections made on myself to obtain the maximum of effect, I have employed as little water as I could. To the three kinds of substances I have just named, I added distilled water in a quantity which never exceeded three or four times their volume. The crushing was always done after the addition of water. When filtered through a paper filter, the liquid was of a reddish hue and rather opaque, while it was almost perfectly clear and transparent when Pasteur's filter was employed. For each injection I have used nearly one cubic centimetre of the filtered liquid. The animals employed were a strong and, according to all appearances, perfectly healthy dog (from two to three years old), and a number of very young or adult guinea-pigs. The experiments, so far, do not allow of a positive conclusion as regards the relative power of the liquid obtained from a dog and that drawn from guinea-pigs. All I can assert is that the two kinds of animals have given a liquid endowed with very great power. I have hitherto made ten subcutaneous injections of such a liquid—two in my left arm, all the others in my lower limbs—from May 15th to June 4th last. The first five injections were made on three succeeding days with a liquid obtained from a dog. In all the subsequent injections, made on May 24th, 29th and 30th, and June 4th, the liquid used came from guinea-pigs. When I employed liquids having passed through Pasteur's filter, the pains and other bad effects were somewhat less than when a paper filter was used.

Coming now to the favorable effects of these injections, I beg to be excused for speaking so much as I shall do of my own person. I hope it will easily be understood that, if my demonstration has any

1. This innocuity was also proved on a very old dog by twenty subcutaneous injections of a fluid similar to that I intended to employ on myself. No apparent harm resulted from these trials, which were made by my assistant, Dr. D'Arsonval.

2. For reasons I have given in many lectures in 1869 and since, I consider the spermatic as also the principal glands (kidneys, liver, etc.) as endowed, besides their secretory power, with an influence over the composition of blood, such as is possessed by the spleen, the thyroid, etc. Led by that view, I have already made some trials with the blood returning from the testicles. But what I have seen is not sufficiently decisive to be mentioned here.

value—I will even say any significance—it is owing to the details concerning the state of my health, strength, and habits previously to my experiments, and to the effects they have produced.

I am seventy-two years old. My general strength, which has been considerable, has notably and gradually diminished during the last ten or twelve years. Before May 15th last, I was so weak that I was always compelled to sit down after half an hour's work in the laboratory. Even when I remained seated all the time, or almost all the time, in the laboratory, I used to come out of it quite exhausted after three or four hours' experimental labor, and sometimes after only two hours. For many years, on returning home in a carriage by six o'clock after several hours passed in the laboratory, I was so extremely tired that I invariably had to go to bed after having hastily taken a very small amount of food. Very frequently the exhaustion was so great that, although extremely sleepy, I could not for hours go to sleep, and I only slept very little, waking up exceedingly tired.<sup>1</sup>

The day after the first subcutaneous injection, and still more after the two succeeding ones, a radical change took place in me, and I had ample reason to say and to write that I had regained at least all the strength I possessed a good many years ago. Considerable laboratory work hardly tired me. To the great astonishment of my two principal assistants, Drs. D'Arsonval and Henocque, and other persons, I was able to make experiments for several hours while standing up, feeling no need whatever to sit down. Still more: one day (the 23rd of May), after three hours and a quarter of hard experimental labor in the standing attitude, I went home so little tired that after dinner I was able to go to work and to write for an hour and a half a part of a paper on a difficult subject. For more than twenty years I had never been able to do as much.<sup>2</sup> From a natural impetuosity,

and also to avoid losing time, I had, till I was sixty years old, the habit of ascending and descending stairs so rapidly that my movements were rather those of running than of walking. This had gradually changed, and I had come to move slowly up and down stairs, having to hold the banister in difficult staircases. After the second injection I found that I had fully regained my old powers, and returned to my previous habits in that respect.

My limbs, tested with a dynamometer, for a week before my trial and during the month following the first injection, showed a decided gain of strength. The average number of kilogrammes moved by the flexors of the right forearm, before the first injection was about  $34\frac{1}{2}$  (from 32 to 37), and after that injection 41 (from 39 to 44), the gain being from 6 to 7 kilogrammes. In that respect the forearm flexors re-acquired, in a g. eat measure, the strength they had when I was living in London (more than twenty-six years ago). The average number of kilogrammes moved by those muscles in London in 1863<sup>3</sup> was 43 (40 to 46 kilogrammes).

I have measured comparatively, before and after the first injection, the jet of urine in similar circumstances—i.e., after a meal in which I had taken food and drink of the same kind in similar quantity. The average length of the jet during the ten days that preceded the first injection was inferior by at least one quarter of what it came to be during the twenty following days. It is therefore quite evident that the power of the spinal cord over the bladder was considerably increased.

One of the most troublesome miseries of advanced life consists in the diminution of the power of defecation. To avoid repeating the details I have elsewhere given in that respect, I will simply say that after the first days of my experiments I have had a greater improvement

For a great many years I had lost all power of doing any serious mental work after dinner. Since my first subcutaneous injections I have very frequently been able to do such work for two, three, and one evening for nearly four hours.

3 I have a record of the strength of my forearm, begun in March, 1860, when I first established myself in London. From that time to 1882 I occasionally moved as much as 50 kilogrammes. During the last three years the maximum moved was 38 kilogrammes. This year, previously to the first injection, the maximum was 37 kilogrammes. Since the injection it has been 44

<sup>1</sup> I ought to say that, notwithstanding that dark picture, my general health is and has been almost always good, and that I had very little to complain of, excepting myrcicism and muscular rheumatism.

<sup>2</sup> My friends know that, owing to certain circumstances and certain habits, I have, for thirty or forty years gone to bed very early and done my writing work in the morning, beginning generally between three and four o'clock.

with regard to the expulsion of fecal matters than in any other function. In fact a radical change took place, and even on days of great constipation the power I long ago possessed had returned.

With regard to the facility of intellectual labor, which had diminished within the last few years, a return to my previous ordinary condition became quite manifest during and after the first two or three days of my experiments.

It is evident from these facts and from some others that all the functions depending on the power of action of the nervous centres, and especially of the spinal cord, were notably and rapidly improved by the injections I have used. The last of these injections were made on June 4th, about five weeks and a half ago. I ceased making use of them for the purpose of ascertaining how long their good effects would last. For four weeks no marked change occurred, but gradually, although rapidly, from the 3rd of this month (July), I have witnessed almost a complete return of the same state of weakness which existed before the first injection. This loss of strength is an excellent counter-proof as regards the demonstration of the influence exerted on me by the subcutaneous injections of the spermatic fluid.

My first communication to the Paris Biological Society was made with the wish that other medical men advanced in life would make on themselves experiments similar to mine, so as to ascertain, as I then stated, if the effects I had observed depended or not on any special idiosyncrasy or on a kind of auto-suggestion without hypnotisation, due to the conviction which I had before experimenting that I should surely obtain a great part at least of these effects. This last supposition found some ground in many of the facts contained in the valuable and learned work of Dr. Hack Tuke on the "Influence of the Mind over the Body." Ready as I was to make on my own person experiments which, if they were not dangerous, were at least exceedingly painful, I refused absolutely to yield to the wishes of many people anxious to obtain the effects I had observed on myself. But, without asking my advice, Dr. Variot, a physician who believed that

the subcutaneous injections of considerably diluted spermatic fluid<sup>1</sup> could do no harm, has made a trial of that method on three old men—one fifty-four, another fifty-six, and the third sixty-eight years old.<sup>2</sup> On each of them the effects have been found to be very nearly the same as those I have obtained on myself. Dr. Variot made use of the testicles of rabbits and guinea-pigs.

These facts clearly show that it was not to a peculiar idiosyncrasy of mine that the effects I have pointed out were due. As regards the explanation of those effects by an auto-suggestion, it is hardly possible to accept it in the case of the patients treated by Dr. Variot. They had no idea of what was being done; they knew nothing of my experiments, and were only told that they were receiving *fortifying* injections. To find out if this qualification had anything to do with the effects produced, Dr. Variot, since the publication of his paper, has employed similar words of encouragement, whilst making subcutaneous injections of pure water on two other patients, who obtained thereby no strengthening effect whatever.<sup>3</sup>

I believe that, after the results of Dr. Variot's trials, it is hardly possible to explain the effects I have observed on myself otherwise than by admitting that the liquid injected possesses the power of increasing the strength of many parts of the human organism. I need hardly say that those effects cannot have been due to structural changes, and that they resulted only from nutritive modifications, perhaps in a very great measure from purely dynamical influences exerted by some of the principles contained in the injected fluid.

I have at present no fact to mention

<sup>1</sup> In my third communication at the Biological Society, I said that both the intense pain each injection has caused me and the inflammation it has produced would be notably diminished if the liquid employed were more diluted. The three cases of Dr. Variot have proved the exactitude of my statement. He made use of a much larger amount of water, and his patients had to suffer no very great pain and no inflammation.

<sup>2</sup> The paper of Dr. Variot and my remarks upon it have appeared in the "Comptes Rendus de la Société de Biologie," No. 26, 5 Juillet, 1893, pp. 451 and 454.

<sup>3</sup> Since writing the above I have received a letter from Dr. Variot announcing that, after injecting the liquid drawn from the testicles into these two individuals, he has obtained the same strengthening effects. I have myself experienced.

which might serve to solve the question whether it would be possible or not to change structurally muscles, nerves, and the nervous centres by making during a good many months frequent injections of the fluid I have used. As I stated at the Paris Biological Society, I have always feared, and I still fear, that the special nutritive actions which bring on certain changes in man and animals, from the primitive embryonal state till death by old age, are absolutely fatal and irreversible. But in the same way that we see muscles which have from disease undergone considerable structural alterations regain sometimes their normal organisation, we may, I believe, see also some structural changes not essentially allied with old age, although accompanying it, disappear to such a degree as to allow tissues to recover the power they possessed at a much less advanced age.

Whatever may be thought of these speculations, the results I have obtained by experiments on myself and those which have been observed by Dr. Variot on three old men show that this important subject should be further investigated experimentally.—*London Lancet.*

## A NEW METHOD OF EXCISING THE WRIST-JOINT.

BY EDWARD THOMPSON, F.R.C.S.I.,

Surgeon to the Tyrone County Infirmary.

Excision of the wrist-joint, even in these days of antiseptic surgery, is an operation not much in favor with most surgeons. It is comparatively seldom practised, probably because, as a rule, the amount of disease which would justify such a very serious proceeding is too extensive to render success probable, while in slighter cases efforts are made to remove limited diseased portions of bone, a proceeding which I have often seen attended with very unsatisfactory results. The operation as perfected by Sir Joseph Lister is, notwithstanding all that can be said in its favor, clumsy and difficult of performance, and includes removal of the

whole carpus, resection of the ends of the metacarpal bones, as well as of the ulna and radius. The following case, which has been under treatment in the Tyrone Infirmary, illustrates the change which I propose in the method of performing this operation.

Mrs. I., a strong, healthy, middle-aged woman, living near Dungannon, in the county Tyrone, was admitted into the Tyrone County Hospital, about two years ago, suffering from caries of some of the carpal bodies of the left hand. The diseased and loosened portions of bone were removed by careful gouging, and although there was some improvement, the woman went home very little better than when I first saw her. About five months ago she returned to the Infirmary in a very much worse state of health. She had lost greatly in flesh and strength; the lower part of the forearm and hand were swelled and much inflamed. The slightest motion, even of the fingers, caused intense pain. There were numerous sinuses both on the back and front of the hand and forearm, all of which communicated readily with carious bone. There was also a constant discharge of thin unhealthy pus. The patient was most anxious to have her forearm amputated, as her sufferings were intense. I determined, however, to try and save the hand by removing the diseased bone by a method quite different from the proceeding generally adopted in excision of the wrist. On the back of the hand, and within about half an inch of its ulnar border there was a large shallow ulcer about the size of half-a-crown. I selected the outer edge of this sore as the site of the incision, which ran between the tendons of the extensor communis and minimi digiti, and was about four inches in length. The edges of the wound were kept apart by retractors, the joint freely opened into, and a full and accurate view obtained of its inner aspect. The disease seemed to be confined to the first carpal row of bones, and to the lower extremity of both the radius and ulna.

A gouge was first introduced into the joint, and the semilunar bone gouged completely away; then each of the neighboring bones was firmly caught by a strong

forceps, slowly twisted from its connections and removed. The diseased ends of the radius and ulna were removed by gouging. Subsequently, as there was no difficulty in showing the extremity of the radius and ulna through the wound, I thought it better to saw both bones straight across immediately above the seat of disease. In order to allow free drainage, a small incision was made on each side of the joint as close as possible to the level of the floor of the joint, and a drainage-tube inserted. The wound was stuffed firmly with iodoform gauze, and dressed antiseptically. A straight splint was placed under the forearm and hand, the palm being supported and raised on a roller bandage instead of a piece of cork as usually recommended. The case made an uninterrupted and speedy recovery, and the patient has now a good useful hand instead of an unsatisfactory mechanical contrivance.

This case seems to me of some importance, because it well illustrates the success of a plan of treatment which I believe has not been hitherto recommended. The method employed differs widely from the usual operation of excising the wrist-joint. It is easy of performance, free from danger, does not tear or injure any of the tendons, vessels, nerves, or deeper structures. It is quite bloodless, and does not require removal of any portion of bone which is sound and healthy. The opening on each side of the joint I consider essential, as free exit is thus given to any discharge that might possibly collect in the cavity left after removal of the diseased bones. Arthrectomy of joints, with removal of diseased masses of bone by gouging and the chisel, has a large field before it. Quite recently in the Tyrone Infirmary I opened freely into the knee-joint, and gouged away nearly the whole of the head of the tibia, draining the joint freely by two large drainage-tubes inserted above and below, and crossing in the joint. The case was a most unfavorable one in every respect, yet recovery was complete, the boy being out of bed in a few weeks, his limb being well supported in a plaster-of-paris case, which was put on immediately after the operation.

## ON THIOCAMF—A NEW DISINFECTANT MATERIAL.

BY J. EMERSON REYNOLDS, M.D., F.R.S.

Read before the Royal Dublin Society, May 22nd, 1880

Every practical physician is asked from time to time "How can I most easily disinfect that room?" after infectious illness or death has occurred in a household: and the answer is by no means simple. The difficulty is to recommend anything sufficiently easy of application in which confidence can be placed.

Since writing the chapter on "Disinfection and Contagion," in the "Manual of Public Health," I have sought some simpler means than is there recommended for disinfection of rooms, so that any intelligent person could attain the end in view without risk of fire, without the use of corrosive materials, or of large quantities of any agents, and without involving the presence of the operator in the room, or the employment of special apparatus.

This search has been successful, and I have now the pleasure of bringing under notice the singular liquid which fulfils the conditions I have just specified, and to which the name of Thiocamf has been given.

The basis of this novel disinfectant is a very curious liquid which results when sulphur dioxide gas is brought in contact with camphor. At ordinary temperatures the gas alone requires a pressure of more than two atmospheres to liquefy it; but camphor, owing to chemical attraction, can liquefy the sulphur dioxide gas without any pressure whatever. In this liquid are dissolved several known bactericides, therefore Thiocamf is *all* disinfectant; but I am not free to enter into further particulars, as the patent specification has not yet been published.

A quantity of the liquid has been preserved in my laboratory for nearly two years in a corked bottle, and has not undergone sensible alteration during that time.

Thiocamf possesses almost unique properties; for, while it can be preserved, *without* pressure in bottles at mean temperature, mere exposure of the liquid

in a thin layer to the air determines the steady evolution of relatively enormous volumes of sulphur dioxide gas from it, charged with the vapours of other powerful disinfectants. These gases and vapours diffuse through the whole of the air of a well-closed room, and therefore must reach everything in the room if given reasonable time.

The question then arises whether the sulphur dioxide gas can destroy the bacteria—particularly the infective forms—when it reaches them. The evidence on this point has hitherto been of a rather loose kind, though the results led to the conclusion that sulphur dioxide gas is a powerful bactericide. Happily the truth of this conclusion has now been placed beyond doubt by a critical investigation of the subject, aided by modern methods of bacteriological study. This examination has been carried out in Paris by MM. Dubief and Bruhl, under the direction of Dr. Dujardin-Baumetz, and the results have been recently communicated to the Academy of Sciences. (*Comptes Rendus*, cviii., 324).

Starting with air rich in germs of various kinds, and combining Miquel's method of numbering the bacteria with alkaline culture, Dubief and Bruhl found that the germs were always reduced in number after the action of diluted sulphur dioxide gas; therefore the latter destroyed the vitality of bacteria. It was further found that the number destroyed increased with the duration of the action of the gas, and that this destructive action was accelerated when the humidity of the air was increased.

In all the experiments with the rather dilute sulphur dioxide gas used the latter proved particularly fatal to micrococci and allied bacteria, whether diffused through the air of a chamber or attached to its walls. As these are organisms of the class which true disinfectants seek to destroy, this testimony to the value of sulphur dioxide is of exceptional importance.

Lastly, those investigations have shown that sulphur dioxide gas is a true bactericide even in a dry state, though longer time is then required for the production of its full effect.

The bearing of these results on the value of Thiocamf is obvious, for if simple sulphur dioxide gas be the powerful bactericide M.M. Dubief and Bruhl have proved, the mixture of sulphur dioxide with vapours of other disinfectants of acknowledged value should be a reliable combination. Moreover, there is no material that I know of, save Thiocamf, which can give off so large a relative volume of sulphur dioxide gas (the contents of a small six ounce bottle can afford over 20,000 c.c.) without any special treatment, save exposure in a very thin layer on an old tray or dish to the air of a room to be disinfected. Further, one ounce of Thiocamf shaken up with a quart of water forms a powerful disinfectant for ordinary purposes, such as sprinkling over various matters, purifying drains, etc.; while a still more dilute solution (one ounce to a gallon) can be used for soaking clothes which have been in contact with infected persons. The residue of Thiocamf has a pleasant aromatic odour.

This concentrated disinfectant can now be obtained at a cheap rate, as a company formed for its manufacture, can produce several hundredweight of Thiocamf per week.

---

### LAMINARIA IN STRICTURE OF THE OESOPHAGUS.

---

Professor Senator has recently stated that for about a year past he has used laminaria in stricture of the gullet with comparatively good results. A piece of laminaria is attached to the end of an ordinary oesophageal bougie, and for greater safety this is further connected with a string running through the whole length of the bougie. Different sizes are used according to circumstances. The instrument is passed into the stricture and left in position from half an hour to an hour, during which time the laminaria swells to a considerable extent. In one case it expanded from one to one and a half millimetre in the course of half an hour. The surface of the laminaria remains smooth, and does not injure the mucous membrane. In most of the cases in which Dr. Senator has tried this plan



the stricture has been cancerous, and as he says, although "by gradual and frequently repeated pressure a carcinoma may cicatrise and become atrophied, this very seldom happens." In a large proportion of his cases, however, the treatment produced very marked dilatation of the stricture, so that the patients after a certain time could swallow much better than before. In some instances there was no improvement, and Professor Senator confesses that at first his anxiety to dilate the stricture as quickly as possible made him apply the treatment without sufficient regard for the tolerance of the diseased parts. If due care is not exercised, the laminaria may swell so much as to cause great pain, and even difficulty in removal. The most favourable cases for the treatment are of course those of cicatricial stricture. Dr. Senator points out that laminaria may also be used with good effect in narrowing of other canals, and he relates one case of stricture of the rectum in which he tried it, but apparently with indifferent success.

---

### SERIOUS ACCIDENT IN A TURKISH BATH.

Fifty-five inmates of the Cork, Ireland, Lunatic Asylum, were placed in a Turkish bath, which, owing to a leakage, contained gas of a deleterious nature, and shortly afterwards nine fell down insensible, but, on being removed and restoratives applied, they recovered. It is alleged that the previous morning the man in charge of the furnace reported to the house-steward that the bath was defective, that the flue was leaking, and that the smoke and foul gas which should be carried off found their way into the bath. The bath is divided into two compartments for males and females, the leakage being common to both. On the female side, forty-five inmates were in their portion of the bath, and very soon eleven were prostrate and senseless. For a considerable time two old women remained unconscious, and their condition was regarded as very dangerous, but ultimately they recovered consciousness.

### THROAT DISEASE IN MAN AND THE LOWER ANIMALS.

Another suggestion as to the existence of a connection between diphtheria and allied throat disease in the human subject and some similar disease in a lower animal comes from Darton, near Barnsley, where Dr. Bruce Low, of the Local Government Board, is making inquiry as to the deaths of twenty children from diphtheria and so-called "croup." The clerk to the Local Board of Health has reported that in a number of cases there seem grounds for believing that the disease had been communicated to children by means of cats which were ailing, one of them fatally so. Whatever the actual facts in the case may turn out to be, it is quite certain that we already know enough to call for much greater caution than has heretofore been observed in our dealings with animals such as cats, and also with certain birds, when these appear to be suffering from throat affections.

---

PROFESSOR LOWENTHAL, who has lately made experiments on the action of salol in cholera bacilli in Professor Cornil's laboratory in Paris, has received a special mission from the French Government to proceed to Tonquin in order to study the effects of salol on cholera patients.

---

### FLAPPING OF A FLY'S WINGS.

In his book—*On the Senses, Instincts and Intelligence of Animals*—Sir John Lubbock records some of his later observations, among which are these:—

The slow flapping of a butterfly's wing produces no sound, but when the movements are rapid a noise is produced, which increases in shrillness with the number of vibrations. Thus the housefly, which produces the sound of F, vibrates its wings 20,100 times a minute, or 335 times a second; and the bee, which makes a sound of A, as many as 26,400 times in

a second. On the contrary, a tired bee hums on E, and, therefore, according to theory, vibrates its wings only 330 times in a second.

#### LOCAL APPLICATION OF CHLOROFORM IN EPIDIDYMITIS.

Dr. Theodor Clemens, of Frankfort, in an interesting paper communicated to the *Allgemeine Medicinische Central Zeitung*, describes the great benefit he has obtained in cases of epididymitis, both specific and non-specific, by means of chloroform locally applied. He regards as most unsatisfactory the treatment of the affection by other methods as compared with his own, which he has employed now for a great many years. It consists in laying some cotton wool saturated with chloroform and spirit at the bottom of a large glass vessel, into which the genitals are then put and packed round with dry cotton wool, the buttocks and thighs forming a cover, this application being continued for from fifteen to twenty-five minutes, and repeated two or three times a day. Pathologically, he considers venous congestion of the epididymitis and the chord through retention of semen a predisposing cause of the disease. He also considers epididymitis as very likely to occur when gonorrhoea has been contracted in excessive venery. He mentions a case of treatment by chloroform thirty-six years ago, not of epididymitis, but of periodical "heat" occurring in the human subject. The man used to suffer periodically from a form of orchitis, during which the testes felt hot and swollen, and the plexus pampiniformis was full and turgescient like a varicocele. He was ordered the local application of chloroform three times a day, from fifteen to twenty-five minutes each time, but the first time he bore the chloroform for nearly thirty-five minutes, after which the pain of the severe attack completely ceased and the swelling considerably decreased. This treatment lasted three days, during which time he was able to walk about, the cotton wool which had been used for the chloroform being put into the suspensory bandage and the testes covered with it. After

that both the swelling and sensibility disappeared. Another case is mentioned, where epididymitis had been caused by the continuous pressure of a rudder handle on the hypogastrium, in which similar treatment proved entirely successful. Again, a class of case that is usually very difficult to treat—viz., that of gonorrhœal orchitis—seems to have proved fairly tractable when managed with the help of chloroform. Here one of the first signs of improvement was frequently the re-establishment of an old discharge, which was soon cured simultaneously with the epididymitis.

#### SUSPENSION TREATMENT OF LOCOMOTOR ATAXY.

Dr. William Morton, of New York, has reported his experience of the suspension treatment of locomotor ataxy in six cases. He believes "that by no other means has equally marked, progressive, and decided improvement been attained." He found that the pains were relieved, and the power of equilibration and of walking very markedly improved, that the pupils regained accommodation and became moderately dilated, that sexual power was fairly restored, that the girdle sensation and the sensory disturbance about the legs and feet disappeared, and that micturition became natural. In one case some cramp in the neck, attributed to an ill-fitting head-strap, was noticed, and in another increased hyperæsthesia of large areas of skin; but with these exceptions no unfavorable results were observed. If the patient has sufficient power in his arms, Dr. Morton prefers to use only a head-strap and to let the patient suspend himself; the raised position of the arms is, he thinks, an advantage, and the patient feels less nervous. To secure the full advantage of this self-suspension, he has invented a handle which, while sliding freely up the rope will grip it on being pulled downwards. In this way, he says, the patient gains each fraction of an inch that he can push his hands up, and is relieved from the cutting of the rope. In patients who cannot use their arms to suspend themselves, he employs straps

passing under the axilla. He begins in either case with suspension of from one to two minutes, gradually extended to from five to seven, and he recommends that the toes should not leave the floor.

---

### THE PENTACLE OF REJUVENESCENCE.

On two occasions this month Dr. Brown-Sequard has made communications of an extraordinary nature to the Societe de Biologie of Paris. The statements he made have attracted a good deal of attention in the public press. He obtained by compression and washing from the testicles of young animals a fluid, which he injected into the subcutaneous cellular tissue with a hypodermic syringe. He performed the experiment on himself, repeating the injection almost every day for a fortnight, with results which appeared to him to warrant an immediate communication to the Society. He stated that he had experienced a rejuvenescence of all his forces, physical and psychic; all that had become difficult or impossible for him owing to advancing age became once more easy, and he found himself possessed of the same vigor as he had had thirty years before. He could undergo fatigue in standing, travelling; and in intellectual labor previously impossible; the functions of defecation and micturition also were discharged with greater ease. MM. Fere and Dumontpallier, in commenting on M. Brown-Sequard's statements, observed that they would require to be rigidly tested and fully confirmed by other self-experimenters before they were likely to meet with general acceptance.

---

### A ROYAL PHYSICIAN AND PHILANTHROPIST.

The House of Bavaria can boast of few worthier scions than his Royal Highness the Duke Charles Theodore, who has just resumed his *villeggiatura* on the Tegern-See after a campaign as honorable as any recorded in the history of his ancestors. For eight weeks, together with his wife and assistant physician, Dr. von Zenker,

his Royal Highness, who has graduated as Doctor of Medicine, has been devoting his experience and skill in ophthalmic surgery to the poor of Meran who suffer from affections of the eye. That well-known health resort of the Austrian Tyrol is now year by year frequented by crowds of the humbler class of patients who are afflicted by disease of the visual organs, attracted thither by the cure or alleviation they gratuitously receive at the hands of his Royal Highness. Just before the Whitsuntide recess no fewer than 1,061 of these had been under treatment, in which the chief share was borne by the "Duke-Doctor," as he is familiarly called, while the Duchess performed the part of nurse and general benefactress. In 195 cases he had recourse to operation, with unusually satisfactory results, among which may be noted the cure of sixty-eight persons suffering from cataract, to all of whom their eyesight was successfully restored. In these last his Royal Highness acknowledges the co-operation of his assistant, Dr. von Zenker, whose skill in ophthalmic disease had recommended him for the post. The mining and pastoral population around the Tegern-See welcomed their "Duke-Doctor" and his consort on their return among them with the most touching demonstrations of affection and esteem—demonstrations, however, not more cordial than those of the Tyrolese poor, whose gratitude they had earned by benefactions in the power of few to bestow.

---

### SPECIALISTS AND THE GENERAL PRACTITIONER.

BY WILLARD P. BEACH, M.D., BROOKLYN.

We believe it will be conceded by all concerned that the struggle for a livelihood among the younger members of the medical profession is becoming more trying and severe every year, and that it is a serious daily question with many physicians of a few years practice how to maintain an honorable standing before the eyes of their brethren, and at the same time keep their financial accounts even and themselves and families comfortably provided with this world's goods.

This state of affairs normally and naturally exists to a certain degree, as in all other professions, as well as in the trades, owing to a healthful and necessary competition. There are, however, certain factors to be considered, which seem to us to account for a great deal of uncalled-for struggling and deprivation universally experienced by the young doctor. It is for the purpose of discussing two of the more important of these factors that this article is written. They are:

*First.*—The inefficient acquirements, both theoretical and practical, of those starting in the practice of medicine.

*Second.*—Too many specialists, and too many specialties.

A young man, having tried his fortune at various occupations, and making but little progress, or perhaps having been brought up on a farm, where the work is laborious and prolonged, bethinks his lot a hard one; and having heard of Doctor A., who started from a position in life as far down in the scale as his own, who is progressing wonderfully well, starts his career in a medical school, without any special intellectual preparation or inquiry as to peculiar adaptability, and is soon made a full-fledged M.D.

His means being limited, he selects the institution from which he feels he will be the surest to graduate in the shortest space of time. This of course stimulates the medical schools, which are for the most part not endowed colleges, but compelled to rely on the funds of the students for support, to offer extra inducements to those about to study medicine, and here comes in the very hurtful competition between medical seats of learning. The result is, in too many instances, that the new doctor puts out his sign, and awaits his first case with more or less lack of self-confidence and fear. He has probably never felt a pulse or taken a temperature, and most of his prescriptions are fanciful and often composed of incompatible ingredients.

Sooner or later a simple case calls for treatment, perhaps, in fact almost certainly, it can be classed in one of the numerous specialties; and the young man, and very often some of the older ones too, never having seen a case like it

before, becomes alarmed, and at once sends it to a specialist.

And thus the general practitioner becomes the feeding reservoir to keep the offices of the specialists filled with patients, and their pockets distended with money which is willingly paid in large fees, while the family doctor just ekes out an economical existence, working night and day for miserably small pay.

It is here we wish to consider the second factor, namely: Too many specialties and too many specialists.

Dr. George Shradley said, in an article contained in the *New York Medical Record*, recently, that specialism was being overdone. We are decidedly of the same opinion.

What should constitute a specialist? He should be a man of mature mind, consequently one who has reached middle life at least, and who has had an extensive experience in general practice in all its phases; a man who has been a close student of nature and of his books, and who is naturally observing; one who, in the course of many years of general experience, has found himself intuitively drifting towards a special line of study, for which he has instinctively developed a particular liking.

Such men are few, and in demand. Their scope of observation will be broad and unbiased, and their diagnoses of special disease will be deduced from a proper comparison of all symptoms, both near and remote, and not limited to the narrow channel of their specialty, as is now so often the case.

Some time since, a gentleman complained of having a sore throat. He visited an eminent genito-urinary specialist, who diagnosed secondary syphilis, and ordered the mixed treatment, which afforded no relief. He was then referred to a neurologist, who located the trouble in the brain, and prescribed strychnia and galvanism, which caused no improvement. He then went to a laryngologist, who thought his complaint was catarrhal pharyngitis, and used astringents, which, according to the patient, aggravated the trouble. Finally he fell into the hands of a well-known

general practitioner, who prescribed for an old-standing dyspepsia, which soon resulted in totally curing the throat. The above facts were narrated to us by a laryngologist of note, and are all vouched for.

When the day comes that shall find such specialists as advocated above, it will not be necessary for them to get up a paper on some subject in their line, read it before a medical society, and then have reprints sent to all the doctors far and near, with their addresses plainly appended, or to change their residence and send cards to brother physicians announcing their removal, such as one recently received by us, stating that "Dr. —, of — street, New York, having removed to — street, was ready to treat all female complaints." To increase the already overfilled list of medical schools for personal aggrandizement, to run private hospitals or health asylums, or any of the numerous dodges resorted to for individual advertisement. They will be known and read of all medical men as wise and helpful counselors, who can really assist us in our extremity, and not consult to merely satisfy the friends of the patient.

But we would maintain that all the commoner maladies, even belonging to the specialties, should be treated by the general practitioner and the specialist called in only in the very obscure and ill-defined cases.

The solution of this whole matter we believe to be in raising the standard of licentiates for theoretical knowledge, and requiring a hospital experience for every practitioner in the State. — *Brooklyn Medical Journal*.

---

### DEAF-MUTISM.

*Deaf-Mutism and Marriage.* — Mr. Alexander Graham Bell rectifies certain statements ascribed to him in *The Lancet* of July 28, 1888, and calls attention to the following facts: The deaf-mutes of America are increasing at a greater rate in proportion than the population at large, both as regards the congenital and non-congenital cases. The number of

non-congenital deaf-mutes show great and sudden fluctuations at different times on account of epidemical diseases that cause deafness. Meningitis is now the principal cause of deafness in America, and scarlet fever takes second rank. Statistics and the law of heredity indicate that marriages between congenital deaf-mutes result in deaf-and-dumb children, and the continuous intermarriage of congenital deaf-mutes from generation to generation may ultimately result in the formation of a deaf variety of the human race in America. Cases can be cited where deafness has been handed down through four generations, and in one family congenital deaf-mutes have appeared for five successive generations in increasing numbers, and in which the younger deaf-mutes are marrying parties who are themselves deaf and dumb. Mr. Bell regards the total abolition of separate institutions for the deaf and dumb as impracticable, although they should be recognised as evils to be avoided as much as possible, as leading to acquaintanceships, and eventually intermarriages, between deaf-mutes. He suggests that the ordinary local schools should have a deaf-and-dumb class for the locally afflicted children, and thus prevent separation from their friends. — *Lancet*.

That the intermarriage of the deaf leads to an increase of a defective class, and this to an extent demanding the legal prohibition of such marriages, is a proposition so inconsistent with the general observation of those devoted to deaf-mute instruction that it could not have provoked serious discussion had it not rested upon the authority of so distinguished a name as that of Prof. A. Graham Bell. It is a mistake to suppose that the sociological and educational doctrines of Professor Bell are, or ought to be, accepted by the profession of deaf-mute instructors without taking the regular course of discussion and trial. We have, therefore, requested Prof. A. L. E. Crouter, Principal of the Pennsylvania Institution for the Deaf and Dumb, to place at the disposal of the *Annual* the valuable statistics in his possession, as well as his own deductions therefrom, to which his long-extended observation and special studies lend the highest weight. We

have asked his criticism upon the following propositions (*The Satellite*):—

1. Children deaf from birth, or from soon thereafter, are generally of deaf parentage.

2. The co-education of the deaf tends to their intermarriage.

3. The offspring of such marriages are generally deaf.

4. Experience has shown the necessity of a legal prohibition of intermarriages among the deaf as an effective means of limiting this defective class.

He criticises the propositions seriatim:

“Concerning the first proposition, I am compelled to say that I deem it very wide of the truth. According to the records of this institution, covering a period of upward of seventy years, only a *very small proportion* of our congenitally deaf pupils have been of deaf parentage—about one in thirty-five. To satisfy myself upon this point I have personally examined the history, so far as it relates to this fact, of one thousand unselected cases, and find that *only seven* of those congenitally deaf were born of deaf parents, whereas two hundred and thirty-three were of hearing parentage. In the one thousand cases two hundred and forty were born deaf or became deaf *under one year of age*, and of these two hundred and forty-seven were of deaf parentage, and *two hundred and thirty-three* of hearing parentage. I believe the same proportion would be maintained were I to extend the examination throughout the whole period of seventy years.

“Deaf parents, unless there is hereditary tendency to the defect, are no more liable to have deaf children than hearing parents. I am firmly convinced that deafness, like other physical defects, is hereditary in certain families, and members of these families should never intermarry. The transmission of the defect should be guarded against in every possible way—among the hearing as well as among the deaf.

“Regarding the second proposition, I believe the co-education of the deaf *does* tend to a certain extent to promote intermarriage. Nothing more natural, and if such unions be wisely made there can be no objection to them, at least not upon the ground of extending the defect.

“Third: As already indicated, unless the defect is hereditary, the intermarriage of the deaf is not followed by deaf offspring as a rule. Out of four hundred and thirty-six pupils now under instruction in this institution, but seven were born of deaf parents, notwithstanding the many instances of intermarriage in the State, and I know personally many such unions have been blessed with hearing children.

“Fourth: While I am opposed to the indiscriminate intermarriage of the deaf, and discourage it except under favorable conditions, I do not favor legislation prohibiting such unions; Special and class legislation in my opinion is never wise. It should be made a matter of careful instruction. The educated deaf are coming more and more to understand and appreciate the importance of this subject, and in time will contract unions with proper intelligence and prudence. I know of nothing that gladdens the heart of a deaf parent more than the birth of a hearing child.”—Special communication to the *Annual*, May 21, 1889.

#### THE SUSPECTED POISONING OF A LIVERPOOL MERCHANT.

The preliminary inquiries in what promises to be a *cause celebre* have just been completed. The social position of the prisoner and the deceased, with other circumstances, have combined to invest the case with somewhat sensational surroundings, and the “Maybrick case,” as it has been called, has been the subject, not only of very full reports, but also of leading articles in most of the London and provincial daily papers. The inquest, which was held by Mr. Samuel Brighouse, the coroner for the West Derby district of Lancashire, extended over several days, resulting in a verdict of wilful murder against Florence Elizabeth Maybrick, the widow of the deceased gentleman. The inquiry before the magistrates occupied the whole of two days, at the close of which the accused lady was fully committed for trial for wilful murder at the next Liverpool assizes.

Stripped of all sensational statements,

many of which may be entirely false, the case appears an extremely simple one, the following being the principal facts disclosed before the coroner and magistrates. The deceased, Mr. James Maybrick, was a cotton merchant, having an office in Knowsley buildings, Tithebarn street, Liverpool, his residence being Battlecrease House, Riversdale-road, Garston, within easy distance of Liverpool. The prisoner and he had been married for some years, the issue of the marriage being two children, and to all appearances they lived happily together until March 29th last, the date of the Grand National, which both attended. Here the prisoner would appear to have given the deceased cause of offence, which induced him to express himself strongly to her. She resented this, and, speaking to a lady friend, said "that she would give it him hot and heavy for speaking to her like that in public." They subsequently quarrelled, and the prisoner called upon Mr. Hopper of Liverpool (who was their medical attendant) on March 30th, suffering from a black eye. She complained of her husband, and wished for a separation, but Mr. Hopper succeeded (as he believed) in effecting a reconciliation. Some time afterwards one of the servants found a number of "fly papers" steeping in water in a basin on one of the tables in the bedroom, covered over with a towel. These papers and the water could not subsequently be traced. About this time the deceased, who was in his fiftieth year, and had always enjoyed fairly good health, though he was somewhat fond of taking medicine, including, it was suggested, arsenic, began to feel unwell, and went to London to see his brother, Mr. Michael Maybrick, the well-known vocalist and composer. He consulted Mr. Fuller, who prescribed for him, the prescription being dated April 14th, and it is a remarkable coincidence that the discovery of the fly papers occurred just about this date. Mr. Fuller's prescription contained no mention of arsenic, but in one of two bottles which had been made up from it by Messrs. Clay and Abraham, of Liverpool, and which had been found in the lavatory of Battlecrease House, arsenic was subsequently found by Mr. Edward Davies, analytical

chemist. The other bottle, which deceased kept at his office was found free from arsenic. On the very day when the prescription was made up the prisoner purchased one dozen fly-papers at another chemist's, near to her house, and some days later she obtained two dozen more at a third chemist's. After taking the medicine, the deceased became worse, and Mr. Richard Humphreys of Garston, who had not previously attended him, was called in visiting him on April 28th. He found him complaining of a fear of dying, and of a peculiar feeling about his heart; he was also afraid of paralysis coming on. These symptoms had appeared that morning, and the deceased attributed them to a cup of tea he had drunk. He had experienced similar feelings from drinking tea before, and had made up his mind to give up tea in future. He complained of a dirty tongue, and asked Mr. Humphreys to clean it for him. On the same day, at ten o'clock in the evening, Mr. Humphreys was sent for hurriedly. The deceased complained of stiffness in his limbs, which soon passed off, and never returned. As he still continued very ill, Dr. William Carter was sent for, and first saw him on May 7th, about 5:30 p.m. The deceased complained of having suffered from vomiting and diarrhoea for several days; he had a bad taste in his mouth, great thirst, and a feeling as of a hair in his throat. On examining him, Dr. Carter found the lungs, heart, and brain normal. The tongue was extremely dirty, but there was no offensive odour, and the throat was red, dry, and glazed. He was rather weak, but very restless, kicking off the clothes. Dr. Carter expressed an opinion that he was suffering from acute dyspepsia, brought on by some irritating food. He saw him again on the 9th, when, in addition to the former symptoms, there was also extreme tenesmus. That day Dr. Carter suspected irritant poison, and examined a bottle of Neave's food, but with a negative result. He saw Mr. Maybrick the next day, when he expressed himself as feeling much better, only requiring some sleep to make him all right again. Dr. Carter and Mr. Humphreys thought him decidedly worse; the right hand up to the knuckles was

numbed and absolutely bloodless, indicating failure of circulation. A bottle of Valentine's meat juice was given by Mr. Michael Maybrick to Dr. Carter, who examined it by Marsh's and Reinach's tests, both giving decided indications of arsenic being present. This same bottle was subsequently examined by Mr. Davies, who found that it contained 411 grains of liquid, in which he found half a grain of arsenic. The deceased lay red till the following day (Saturday, May 11th), when he died. Circumstances appearing to seriously compromise the prisoner having now come to light, the police were communicated with, and, as no certificate of death was forthcoming, the coroner was also informed of the death, who ordered a post-mortem examination. This was made on the 13th by Alexander Barron, pathologist to the Liverpool Royal Infirmary, in the presence of Dr. Carter and Mr. Humphreys. There were no appearances of any natural cause of death, but those of some irritant poison. The viscera were sent to Mr. Davies; subsequently the body was exhumed, and more viscera were removed and sent to him. He found arsenic in the liver, the estimated quantity being one-eighth of a grain in the whole liver; there was no arsenic in the stomach and its contents, or in the spleen; but in the intestines and kidneys there were minute traces. In addition to the articles previously mentioned, Mr. Davies also examined a pan and basin used by the deceased for warming up some Neave's food, which had been given to his brother by the prisoner in a jug. He found arsenic in the pan, jug, and basin, though there was only a very minute particle of solid food left adhering to the sides of each. He obtained samples from the stock bottles used by the assistants of Messrs. Clay and Abraham in preparing Mr. Fuller's prescriptions, and proved that each was free from arsenic. A bottle of Valentine's meat juice which had not been opened was found free from arsenic. A bottle, containing liquid and black powder, found in the house, contained a strong solution of arsenic, with also a large quantity of arsenic in the solid form. Another bottle contained a solution of arsenic, with a little solid arsenic at the

bottom; and the sediment in another bottle contained from fifteen to twenty grains of arsenic, with a few drops in solution. In a glass containing milk and a rag Mr. Davies found about fourteen grains of arsenic, from which he judged that there must have been about twenty grains originally in the tumbler. There was also a sealed package containing a powder labelled "Poison for cats." This consisted of 91.44 per cent. of arsenic and 8.42 per cent. of carbon. The package also contained a handkerchief upon which there was a trace of arsenic and black particles similar to those in one of the bottles. On this handkerchief was also the prisoner's name. A bottle of Price's glycerine contained two-thirds of a grain of arsenic, while another bottle procured, not previously opened, had none. Flypapers similar to those purchased by the prisoner contained two grains and a half of arsenic in each paper, with a small quantity of arsenite of potash; the arsenic dissolved easily in cold water. On testing the comparative specific gravity of the Valentine's meat juice found to contain arsenic with a pure sample, Mr. Davies concluded that the arsenic must have been added in a liquid form.

The case for the prosecution was very ably conducted by Superintendent Bryning of the county police, who showed throughout the greatest fairness towards the prisoner. The medical evidence was extremely well given, and that of Mr. Davies was a model of scientific accuracy. There were a very large number of articles examined by him, and the labor involved must have been very great. The summing up of Mr. Coroner Brighthouse was very able, and it is satisfactory to note that the prisoner has had all along the services of Mr. Pickford, barrister, who has had previous experience in the defence of persons charged with arsenic poisoning — *London Lancet.*

Mrs. Maybrick was tried at the Liverpool assizes, convicted and sentenced to death.

DR. SUTHERLAND, surgeon to the Penitentiary, has returned from his English tour.



---

 THE NORTHERN LANCET.
 

---

A case unique in the annals of Forensic Medicine as to cause of death, was tried at the recent assizes held at Calgary, before Mr. Justice Rouleau. The prisoner was indicted for the murder of a squaw, one of the Cree band, namely Rosalie, aged 24 years, and described as a handsome girl extremely well proportioned. The injuries inflicted on the woman, as revealed by post mortem examination were, a large rent at the upper and left side of the vagina leading into the abdominal cavity. The broad ligament was ruptured. There was a rent at the posterior and lower portion of the vagina. A complete laceration of the perineum. Four inches of the rectum with the sphincter ani was torn away. There was also a deep lacerated wound on the inside of the vulva and the abdomen was filled with blood. There was no external evidence on the body of injury, with the exception of a slight bruise on the inside of the left thigh, and, post-mortem examination found all the internal organs healthy. Extraordinary to relate these injuries were inflicted on this woman in a room, part of a small building used as a kind of club, flimsily constructed of wood, and in which any sound in whatever part of the structure it originated must be heard plainly throughout. A slight groaning was heard by the bar man, who went up to the bedroom door and warned the occupants to be quiet, when the groaning immediately ceased. The prisoner subsequently called to the bartender and told him he had been fooling with a squaw and he believed she was dead on his hands, and asked him to come and look at her, which he did, and told Jumbo that she was still breathing. At this time there was blood on Jumbo's face, hands and arm, and the bartender recommended him to wash himself, and brought him some water for that purpose. After cleansing himself they locked the door and proceeded to have their supper at an adjoining hotel. They returned in about an hour and on visiting the room found the squaw to be dead. Jumbo immediately proceeded to see a friend to whom

he related the circumstances, and, acting on his advice, he gave himself up to the chief of police, narrating the facts of the case to him. The coroner was notified of the occurrence and called in a local practitioner, who, on examination, found the bed-clothes much disordered and a quantity of blood upon them, blood was also smeared on the walls. The man was committed for trial on the coroner's warrant, and at the spring assizes the jury brought in a verdict of acquittal, which the judge refused to accept, and the prisoner was remanded to the summer assizes. The crown prosecuted for a capital offence, but the medical evidence for the defence proved that the surroundings of the case were against any such accusation being sustainable. There was nothing to show that Jumbo's act, which led to the infliction of these injuries, was against the wish of the deceased, but, on the contrary, was with her consent and assistance. Incredible as it may appear, there is little doubt that the practice of allowing men to introduce the hand and arm into the vagina is not uncommon amongst the degraded Indian squaws, and that white men in their brutal lust find a morbid gratification in so doing. The evidence given on the trial all pointed to this abominable act by the prisoner, but as to how the injuries were inflicted—whether by a sudden force exercised by the man, or, by an unexpected struggle on the woman's part—remains a matter of conjecture. The manipulator's mouth, as prisoner, was closed, and the other participant in the beastiality paid forfeit with her life. Though nothing can palliate the commission of such an act, even if it were followed by no untoward result—its perpetration being one richly meriting exemplary punishment—English law does not make it a capital offence, inasmuch as the woman's consent and assent was given to the act which led up to her death. But not the least brutal part of the tragedy was the conduct of these men, one the perpetrator, the other the friend called in to pronounce as to the unfortunate girl being dead or alive, and while life was still shown to be in her, calmly cleansing themselves of the woman's blood and

going off to eat their suppers, and on their return, in an hour, they find the wretched squaw was indeed deceased. There was callous atrocity in this act of a devilish type, and unquestionably with both judge and jury it had deservedly very great weight. The antecedents of the prisoner were all in his favor. He had borne a character for generosity and gentleness, had served his country in the Northwest troubles, where he lost a finger, and had distinguished himself in saving a drowning man. These facts pleaded in mitigation of punishment, and but for his previous good character there is no doubt, from the judge's observation, that he would now be serving a life sentence of penal servitude, instead of one of fourteen years. "Facilis decensus averni" is a true proverb. We here have the case of a young man respectably connected, with an irreproachable character up to a recent date, generally liked for his good nature and gentleness, allowing the debasing passions too surely latent in all mankind to gain the mastery over him—degrading his manhood below the level of the brute creation, with the result of bringing sorrow and disgrace on his relatives and consigning himself to the restraints of a prison for the best portion of his life.

---

### THE ELIXIR OF LIFE.

---

Under the ægis of one of the most honored names in the profession, a strange and startling discovery is put forth, difficult of belief and yet who dare deny without further enquiry the truth of what so great and scientific an authority gives as the outcome of years of experiment. There are many people still living, who, a few short years ago, scornfully laughed at the crude, and, as they then thought, impossible ideas which were placed before them, but who have lived to see them become realities, and, the original conceptions far surpassed. A short time since the man who advocated the bold operations in our art which are now daily performed would have been regarded as a charlatan or lunatic. And though, receiving with somewhat of

credulity the announcement of the almost incredible virtues of this fluid, we take no part in bespattering it with ridicule. Let it be subjected to scientific and crucial tests, and, if its truth be proved, it will surround this already celebrated physician's brow with an halo that time will never diminish. Should it prove illusory, both the profession and the public may readily condone one mistake in a long life devoted to the welfare and interests of mankind. Meantime from several quarters we read of successful trials with this reanimating fluid, but not sufficiently authentic or numerous enough to conduct to a correct conclusion. There is little doubt that the public mind is profoundly stirred by the possibility of its truth and the sooner its being a fact or a mistake is unmistakably proved the better.

---

### CANADA MEDICAL ASSOCIATION.

*August 9th.*

The banquet given at the Queen's Hotel on the evening of the 9th ult. to members of the Canada Medical Association who were on their way to Banff was a very enthusiastic affair, and reflected the greatest credit on all parties connected with its arrangements. The dining-room, which was filled to its capacity, was completely decorated with flags and bunting and presented a gay appearance. Under the able direction of Manager Sprado, the dinner was a complete success. It was one of the best laid dinners that has been enjoyed for years. The dishes were few, but they were thoroughly choice, and seemed to be thoroughly appreciated.

The guests included all the visiting physicians, almost all the members of the local medical profession, and a number of prominent citizens. Following is a list, as nearly as could be secured:

Dr. G. Ross, president Canadian Medical Association, Montreal; Dr. H. P. and Mrs. Wright, Ottawa; Dr. J. Bell, secretary, Montreal; and Doctors Stewart, Montreal; Stewart, Pictou, N.S.; Geikie, Toronto; McCallum, Montreal; Hingston,

Montreal; Sheppard, Montreal; Dupius, Kingston; Fee, Kingston; Burt, Paris, Jennings, Paris; Hannan, New York; Hayes, Simcoe; Torrance, Montreal; Martin, Haverhill, Mass.; Gibney, New York; Buckley, New York; Barkley, Philadelphia; P. S. Conners, Cincinnati; Whitaker, Cincinnati; Wiggins, Cincinnati; Marcy, Boston; Jackson, Fergus Falls; Henderson, Minneapolis; Smith, St. Paul; McLellan, Trenton; Lathrop, Dover, N.H.; Jas. Ross, Toronto; W. A. Ross, Barrie; Kelly, Brantford; Gordon, Quincy, Mass.; Robertson, Brantford; Henwood, Brantford; Lundy, Galt; Sloan, Blythe; Proctor, Newboro; Grasset, Toronto; Strange, Toronto; Grier, Halifax; Johnston, Sydney, C. B.; Chamberlain, Morrisburg; Mount, Montreal; DeCow, Montreal; Harkness, Irquois; Farley, Belleville; Stockwell, Port Huron; Lachapelle, Montreal; Chown, Gray, Patterson; Mayor Ryan, Dr. Orton, Dr. O'Reilly, Dr. McArthur; Isaac Campbell, Consul Hespeler, Dr. Pennefather, Supt. Whyte, Mr. McDowall, M.P.; Warden Bedson, Lt.-Col. Villiers, Dr. Young, Dr. Jones, Dr. Good, Consul Taylor, Dr. Lynch, Dr. Calder, Canon Matheson, Dr. Henderson and others.

Dr. O'Donnell, president of the local Medical Association, occupied the chair. On his right sat Dr. George Ross, president of the Canadian Medical Association, Judge Killam, Joseph Wrigley and Dean Grisdale. On his left sat Hon Mr. Greenway, Mr. Golden Smith, and Prof. Bryce.

August 10th—A large number of the visitors went out to Stony Mountain to see one of the attractions of Manitoba, namely: the Model Penitentiary, under the management of Warden Bedson, Lieut.-Colonel of the 91st Mounted Light Infantry and A.D.C. to the Governor-General of the Dominion. Three carloads of physicians and their families were conveyed to the Mountain by special train, kindly furnished by the C. P. R. A warm reception awaited them there. There was a band of fantastically dressed Indians, all covered with war-paint, and wearing feathers, plumes, etc. They were holding a regular old-fashioned war-pance, which was highly amusing to the

visitors, who had never seen anything of the kind. Most of the dancers were Indian prisoners who were connected with the rebellion of 1885. They included Dressy Man and other heroes of the Frog Lake massacre. During the visit, the Indians kept up the war-dance, one of the number beating the tom-tom on a tambourine while the rest continued to shout and discharge the rifles they were furnished with. The party were delighted with the exhibition and with the hospitality of Warden Bedson. The large collection of curiosities was much admired by all. The penitentiary was inspected, the highest encomiums being pronounced upon the discipline observed, and the order and cleanliness everywhere seen. Unfortunately the buffalo herd could not be found. The party returned at 11:30 much pleased with their visit and shortly after left for Banff, where the meeting of the Canada Medical Association is held for 1889. These were joined at the C. P. R. station by several confreres, who had travelled by the lake route, and arrived in Winnipeg that morning by the Northern Pacific line. The following are the papers promised:—

"The Endemic Fern of the Northwest (Mountain Fern)." Dr. A. Jukes, Regina.

"The Climate of South Alberta, with special reference to its advantages for patients with Pulmonary Complaints." Dr. G. A. Kennedy, McLeod, N.W.T.

"Traumatic Inflammations of the Eye, and their proper treatment." Dr. John L. Falton, St. Paul, Minn.

"Hæmatoma of the Vagina and Vulva." Dr. A. H. Wright, Toronto.

"A Case of Empyema, successfully treated by free incisions." Dr. James Ross, Toronto.

"The early recognition and treatment of Epithelioma." Dr. L. Duncan Bulkley, New York City.

"The relief of pain in Eye and Ear affections." Dr. R. A. Reeve, Toronto.

"Sulphonal." Dr. James Stewart, Montreal.

"Nephrothotomy." Dr. F. J. Sheppard, Montreal.

"Vertigo, an Eye and Ear symptom." Dr. J. W. Stirling, Montreal.

"A Resume of a few Surgical Cases."  
 Dr. E. A. Roger, Nanaimo, B. C.  
 "Varicella." Dr. Whitaker, Cincinnati.

---

BOOKS, PAMPHLETS, ETC.

"Petition and Prayer on Behalf of the Lower Animals," is the title of a pamphlet written by Mr. Archibald McBean, of this city. While admiring Mr. McBean's praiseworthy efforts in favor of the brute creation—creatures given for man's use, not abuse—we are unable to adopt the hypothesis he lays down as to the baneful effects of animal food, not matured by age. Mr. McBean contends that beef should be eight year's old before it is fit for human food, and, by the consumption of such food he would insure the duration of human life to eighty years, while the consumer of four year old beef would shuffle off the mortal coil at forty years. He arrives at this conclusion by a process of reasoning more ingenious than convincing. Mr. McBean says: "It is cruel and barbarous enough to slaughter them at any time, but of all the terrible crimes committed against nature and nature's law, the slaughtering of the young, of all species, before they have arrived at maturity, is the greatest." Now, the pain of death, cannot be greater to the young than it is to the mature. If anything, less so, as the more vigorous the life the greater resistance to death. So long as the world lasts, lamb and salad, ducklings and green peas, veal and bacon, not forgetting the luscious little sucking pig, will continue to be in ever increasing demand as the world's population multiplies, even if Mr. McBean's theory was a correct one. But, we fancy, he will have much difficulty in proving it.

*Port Arthur Illustrated* issued as a supplement to the *Manitoba Colonist*; publisher, engraver and printer all deserve no stinted measure of praise for the manner in which the above is got up. The engravings are works of art, and in the twenty pages of closely printed matter there is an exhaustive description of Port Arthur, and the past and present history of its mining industry. No more attrac-

tive way could the compilers of this work have taken to place before the public the advantages and importance of Port Arthur. The pages of *Port Arthur Illustrated* are full of information and will well repay the peruser of them.

---

"He has just come out of college,  
 With his head crammed full of knowledge  
 So he thinks! So he thinks!

He has come the world to alter,  
 In reform he'll never falter,  
 So he thinks! So he thinks!

And he'll banish all old fogies,  
 Just like a lot of bogies,  
 So he thinks! So he thinks!

In a few years he'll grow tired,  
 And won't act like one inspired,  
 So he won't! So he won't!

He will learn life's hard and dreary,  
 That the world ain't run by theory,  
 Yes he will! Yes he will!

He will then grow very prudent,  
 And he will laugh at the young student,  
 Yes he will! Yes he will!

And he'll say, I once was really  
 Very green and very meally,  
 Sure's you live! Sure's you live!  
 —*Dr. Heeter in Columbus Medical Journal.*

---

A REMARKABLE FISTULA.

In the *Deutsche Monatschrift*, Dr. Nicolai, of Stuttgart, gives the history of a case in which a fistula opening at the nipple was found to be connected with a diseased molar tooth. According to a summary in the *Centralblatt für Chirurgie*, the connection was inferred from the fact that the discharge from the opening just above the left nipple ceased at once after proper treatment of the diseased left lower first molar, and it was afterward proved by an injection of cochineal into the alveolus of the tooth, which caused a red coloration of the pus discharged at the nipple. Further examination showed that the pus had made its way through the maxilla, descended along the border of the sternocleidomastoid muscle, perforated the fascia of the platysma myoides, and coursed

over the pectoral muscle into the substance of the mammary gland. The fistula closed in twelve days after the removal of the diseased tooth.—*N. Y. Medical Journal*.

### MISCELLANEOUS.

A NOVEL method of detecting a perforation of the membrana tympani (*Boston Med. and Surg. Jour.*) is communicated to the *Wiener Med. Press*, by Dr. E. Pins, of Vienna. "While looking into the auditory canal in the ordinary manner, with speculum and mirror, hold a piece of clear, cold glass close to the speculum; have the patient do the 'Valsalvian' experiment, and, if perforation exists, the vapor of the breath will be condensed upon the glass and obscure the view."

SAPOLINI, of Milan, has successfully treated sixty-two cases of deafness of old age (*International Cong. Otology*.) He mops the membrana tympani with a weak oleaginous solution of phosphorus. He claims that this diminishes the opacity of the membrane, increases the circulation, and improves the hearing.

DR. TESTEVIN (*Monit. Therap.*) resuscitated a case of asphyxia by giving repeated hypodermic injections of ether. The patient had previously been taken from a room in which a man had been completely suffocated by carbonic acid gas, and the usual artificial respiration, sinapisms, friction, etc., had failed, after an hour's use, to give any encouragement of restoration. Several injections, at intervals, finally roused the patient.

ASTHMA AND ANGINA PECTORIS.—Nitrite of sodium in doses of one or two grains several times a day is the most effective remedy known for asthma and angina pectoris. It relaxes the spasms of the arteriols and lowers the blood pressure.

HOW TO KEEP MILK.—When the milk is brought in in the morning, pour it into a glass jar, place the jar in a pot of water, bring the water to a boiling point and when the milk has reached the boiling point fasten the lid of the jar tight; the milk in the jar is sterilized and will

keep sweet two or three days if the top of the jar is tight.

ANÆSTHETIC MIXTURES.—From a series of articles by Mr. Geo. M. Foy on anæsthetics, we extract the following:

A. C. E. Mixture.	parts.
Alcohol sp. gr. 838	1
Chloroform sp. gr. 1.497	2
Ether sp. gr. 753	3
Billroth's Mixture.	
Chloroform	3
Alcohol	} of each
Ether	
The Vienna Mixture.	
Chloroform	1
Ether	3
By weight, Mix.— <i>Dublin Jour. of Med. Sci.</i>	

CHLORAL IN NIGHT SWEATS.—Dr. Nicola has used an embrocation of chloral hydrate, two drachms, dissolved in a tumblerful of brandy and water. At night about bedtime the patient is rubbed all over with a sponge dipped in this solution. Sometimes three or four rubbings suffice to effect the complete disappearance of night sweats which have previously lasted for weeks.—*Boston Med. and Surg. Jour.*

TO BLISTER THE SKIN QUICKLY.—Into a watch glass, pill box, or any similar small receptacle, pour ten drops of concentrated water of ammonia (aqua ammonia fortior); cover the liquid with a bit of linen or a little cotton-wool, and at once apply the cup upon the skin where the blister is required. Press so that the vapor is confined to the inside of the vessel. A red circle will directly be observed outside, when it will be certain vesication has taken place. Half a minute or so is all the time required to obtain the result. The blister may be dressed in the usual manner of dealing with a blister from cantharides. Acetic acid, concentrated, applied to the skin will also in a few minutes produce vesication. In such cases evaporation should be prevented by some suitable covering. Bibulous paper lightly wetted with a little of the ethereal extract of cantharides, instantly applied to the skin and covered with a piece of adhesive plaster,

will answer for the same purpose.—*Medical Record*, Feb. 16, 1889.

**GONORRHEA.**—Editor *Medical World*: In the April number of the *Medical World* Dr. H. E. Stroud, Oceanside, Cal., offered a prize of five dollars for the simplest, quickest and least harmful treatment of gonorrhoea.

I claim the prize, and will pay ten dollars for a better one.

Give the patient two capsules of docuta sandal wood two hours after each meal. Use no injections, bath the penis in hot water for ten minutes, morning, noon and night. Also let patient have a teaspoonful of Peacock's bromides, containing five drams of Merrell's fld. ext. of gelsemium every night.

In three days there will be no discharge, no pain after urinating, and all aggravating symptoms will have ceased. The patient should continue the capsules twice daily for ten days after discharge has ceased. Dundas & Dicks capsules are those I use.—A. J. ROE, M.D., Decatur, Ill.

LAWSON TAIT says, in his recently published lectures on ectopic pregnancy and pelvic hæmatocele: "I once saw a surgeon, who is now a baronet and has a court appointment, remove a breast with a tumor in it. After he had the whole thing in his hands he drew his knife across the tumor, and out spurted a lot of laudable pus. He had made his explorative incision after the treatment was complete. Absolute accuracy of diagnosis in the abdomen is very far from being possible; only the ignorant assert that it is, and only the fools wait for it."

**OIL OF TURPENTINE** is recommended as an effectual deodorizer of iodoform. If iodoform comes in contact with the fingers, these are rubbed with oil of turpentine and washed with soap. Utensils soiled by iodoform can be cleansed in the same manner.—*Texas Courier*.

**HYPNOTICS, SEDATIVES AND MOTOR DEPRESSANTS IN MENTAL DISEASES.**—Make up your mind clearly from the symptoms present whether your patient needs a pure hypnotic, a general nervous

sedative, or a simple motor depressant before you use any of these drugs.

Paraldehyde is the purest and least harmful hypnotic yet introduced when the insomnia is marked and intractable. Urethan and sulphonal cannot compare with it. Opium and chloral have special dangers and disadvantages.

Use the bromides as accentuators and prolongers of the effects of other drugs, and in order to be able to employ smaller doses than otherwise.

A combination of cannabis indica and the bromides is the best and least harmful of general sedatives.

Hyosine is the best pure motor depressant, but it needs care.

We never should narcotize an insane patient or one threatened with mental disease.

It is as dangerous to use more anodynes by the mouth or subcutaneously to relieve mental pain, as to subdue bodily pain by these means only, perhaps more so.

It is generally far better therapeutics to enable your patient to bear his mental pain and the effects of his insomnia by improving his general nervous tone and the nutrition of his body than merely to produce quiet and sleep by drugs.—*Amer. Jour. of Am. Sci.*

**PHYSICAL TRAINING IN G. ILS' SCHOOLS.**—At the second general meeting of the Bristol and Clifton Branch of the Teachers' Guild last week, Dr. James Stewart, B.A., in presence of a large audience, read a paper in which he advocated making it compulsory on all pupils in girls' schools, just as in boys' schools, to go into the playground and play such games as cricket, rounders, baseball and the like. This, he urged, would be healthier than monotonous walks through streets or along country roads, and more conducive to the development of both mind and body. Girls whilst at play should wear cricketing suits made of flannel, eschewing all such abominations as corsets, to wear which whilst going through any gymnastic exercise was simply courting death, whether the wearer be woman or girl. An animated discussion ensued, in which several ladies took part.

**INFLUENCE OF WATER ON OBESITY.**—Dr. Lorenzen, of Erlangen, says the Berlin correspondent of the *Medical Press and Circular*, has been discussing the influence of liquids on obesity. The first experiment was made on himself. For a period of nine years he drank a large quantity of Erlangen beer daily. On stopping the liquid his weight fell fourteen pounds in seven days. If, however, more water was taken, but without alcohol the weight increased again. Within five weeks he reduced himself to the extent of twenty-three pounds, the chest measurement diminished by two and three-fourths inches, and that of the abdomen by five and one-fourth inches, and the difficulties attending respiration disappeared. Similar experiments carried out on colleagues who were likewise heavy men, had similar results. The disappearance of fat on the withholding of fluids he endeavours to explain on the hypothesis that the cells whose province it is to decompose albumen, when a large quantity of fluid is taken, expend part of their energy in the combustion of fat. The fat they consume is replaced by fat from the tissues.

**SACCHARIN IN THE TREATMENT OF THRUSH.**—The antifermentative action of saccharin suggested to Dr. Fourrier, of Compiègne, its use in the treatment of the frequent and troublesome affection due to the presence of the *oidium albicans*. He has tried it in ten cases of thrush following on measles, applying a solution of saccharin by means of a brush. In eight cases the milky patches disappeared in from twenty-four to thirty-six hours; in only two cases did they persist as long as three days, and the delay was then probably due to imperfect mopping out of the mouth. He made a solution of one part of saccharin in fifty of alcohol, and used a teaspoonful of this alcoholic solution in half a glass of water, applying it four or five times daily. He points out that a stronger solution is apt to prove irritating, and is therefore to be avoided.—*Medical Press and Circular*.

**ANTIPYRIN IN NERVOUS AFFECTIONS OF THE EYE.**—Dr. R. Rampoldi (*Annali di*

*Ottalmologia*), in a case of amblyopia from secondary absolute glaucoma, associated with occlusion of the pupil and of the anterior chamber by total posterior synechia, performed an iridectomy, without any relief to the pain. As the patient refused to submit to enucleation, and as his suffering was intense, antipyrin was given in doses of three grammes daily. After the second dose the pain entirely ceased, and did not recur.

**CHOREA CURED BY ANTIPYRIN.**—Legroux (*Berl. kl. Woch.*) considers that antipyrin in doses of fifteen grains three times a day is the most effectual remedy in chorea. He thus cured six cases within a month. Grun (*Centrl. fur Nervenheilk.*, 148) and Lilienfeld (*Centrl. fur die Med. Wissensch.*, 1888, 748) also report on the good effect of this drug.—*London Med. Recorder*.

Dr. Clouston, of Edinburgh, has published his experience with paraldehyde. He likes it far better than any other pure hypnotic. Very often the patient is asleep in five minutes after the drug is given. It is very rare that it produces disagreeable effects. It does not interfere with the appetite for food next morning, nor disturb the stomach or bowels. In some cases it restores to the brain the habit of sleep, and it may be discontinued without leaving a drug habit. The doctor found it of no use, but rather injurious, when given in the day time. The dose varies largely according to the case. Too small doses are apt to excite the patient. He begins with 40 minims to ʒi. and goes up to ʒii. in ordinary cases. In very many cases of confirmed insomnia, in melancholia, and in acute mania, three, or even four, drachms are required.

A writer in the *London Med. Press* states that when an impassable urethral stricture exists, and the surgeon, after performing external urethrotomy, is unable to find the urethral opening, suprapubic tapping can be done, and the bladder catheterized from behind, forwards. The sound is passed forwards to the stricture, another instrument passed from the front, and the intervening stricture-tissue incised.

**CORROSIVE SUBLIMATE SOLUTION.**—15 grains of corrosive sublimate dissolved in one quart of water gives a solution of 1 in 1000.

**ANOTHER USE FOR THE PHONOGRAPH.**—While the deepest tone that our ears are capable of recognizing is one containing sixteen vibrations a second, the phonograph will record ten vibrations or less, and can then raise the pitch until we hear a reproduction from them. Similarly, vibrations above the highest rate audible to the ear can be recorded on the phonograph, and then reproduced by lowering the pitch until we actually hear the record of those inaudible pulsations.

**A PHOTOGRAPHING-PHONOGRAPH.**—M. Leon Esquive, a Mexican, it is stated, has perfected a marvellous invention in electricity and photography. By speaking in a photophone transmitter, which consists of a highly-polished diaphragm, reflecting a ray of light, this ray of light is set into vibrations, and a photograph is made of it on a traveling band of sensitized paper. Now comes the wonderful part. If the image of this photographic tracing is projected by means of an electric arc or oxyhydrogen light upon a selenium receiver, the original speech is then heard. It is evident that there is no limit to the development of this peculiar combination of methods. This is very important—if true.

**A HOUSE-FLY EPIDEMIC.**—A common appearance upon window panes in autumn is that of dead flies, each surrounded by a cloudy spot. These insects are the victims of a bacillus or microscopic fungus, whose scientific name is *Empusa muscæ*, which is nearly related to the mould which attacks bread, and also to the silk-worm fungus so much dreaded by silk culturists. In autumn the spores of *Empusa muscæ*, floating in the air, come in contact with the soft bodies of the flies, into which they sink their roots, or, rather, develop that branching, net-like growth known as mycelium. As the growth extends through the body the insect loses the power of flight, and settles down to die on the window pane. The fungus continues its growth in the dead body and scatters its

spores in all directions, forming the cloud-like spot which surrounds the insect. Other flies visit the pane, and the spores find lodging between the abdominal rings and in other unprotected parts of their bodies, and thus the disease spreads, sometimes to an enormous extent.—*Popular Science News.*

**SULPHONAL** in night-sweats is reported upon favorably by Dr. Bottnich in the *Therap. Monatshefte*. He administered to a lady, eighty years of age, who had passed many sleepless nights, fifteen grains of sulphonal as a hypnotic. She had suffered from such profuse night-sweats that she was frequently compelled to change her night-dress twice during one night. The sulphonal had the effect of rapidly stopping the sweats, and further investigations proved that in most cases night-sweats could be overcome by taking thirty grains of sulphonal at bed-time.

**TO SOFTEN AND PRESERVE THE SURGEON'S HANDS.**—Meyer recommends careful washing with some easily foaming soap, and, following that, one of these ointments:—

R Lanolin puriss.,	5xij
Vanillin	gr. iss.
Ol. rosæ,	gtt. j.—M.
R Lanolin,	ʒiij.
Paraffin liquid,	ʒvi.
Vanillin,	gr. iss.
Ol. rosæ,	gtt. j.—M.

—*Berlin Klin. Wochens.*, No. 2, 1889.

**BRAIN EXPLORING.**—By DR. SOUCHON. —In view of the frequency with which the presence of abscesses, cysts, and effusions are found, post-mortem, in the brain, in situations in which they might have been reached by the aspirating needle, he considers capillary exploration a simpler, readier, and less dangerous method of searching for such fluid collections within the skull.

He proposes that, after the hair has been snipped from the selected spot by sharp scissors, and the scalp has been rendered aseptic, a hole shall be made through the soft parts of the scalp with a sharp-pointed aseptic bistoury. Through this, the bit of a watchmaker's drill is to be introduced, and a hole drilled through



the skull, the bit being guarded to prevent it penetrating into the brain substance.

This bit being withdrawn, the needle of a hypodermic syringe (*twice as large as the ordinary needle*) is to be introduced into the brain. If a tumor is present, the needle will convey a feeling of resistance; if no solid tumor is present, the needle must be gradually forced more and more deeply into the brain, the piston being retracted at intervals in order that any liquid at the point of the needle may be withdrawn and examined. Dr. Souchon has convinced himself by experiments on dogs that such a procedure is quite safe. He points out the advantage, that several points in the brain may be explored at the same sitting. He thinks the day will come when the skull will be drilled in cases of cerebral hemorrhage, and the blood aspirated here as in other situations. The editor of the *Med. Jour.* says: If Dr. Souchon's suggestions prove to be reliable, the method will be of great value in the application of electric currents to different regions of the brain, the insulated electrodes being introduced through the drill-holes into the brain, and the effects of the stimulus noted, as regards muscular movements, sensations, etc. This would lead to great advances in cerebral localizations.—*Med. Med. and Surgical Journal.*

**SULPHONAL IN INSOMNIA.**—E. H. Kisch reports the results of his administration of sulphonal in 24 cases. The most favorable action was seen in 12 nervous individuals suffering from insomnia, the result of various conditions of excitement. In these a dose of from 7 to 15 grains was sufficient, after one-half to two and one-half hours, to produce sleep, lasting through all, or the greater part, of the night. He admits that the psychic influence of the administration of a hypnotic must be taken into account in many of these cases. In 6 cases there was no hypnotic action obtained even in doses of 30 grains. In 3 cases—i.e., 12.5 per cent.—unpleasant effects were observed. One of these patients was suffering from hemiplegia, the result of an apoplectic stroke, which had occurred a short time before. Morphine had proved valueless in producing sleep, but 15 grains of sul-

phonal induced sleep lasting the entire night. On the next morning, however, the patient was completely aphasic, and this condition gradually disappeared only after 8 to 10 hours, the patient meanwhile feeling very weak. The second patient, after taking 45 grains in divided doses during the night, felt wretched and exceedingly weak on the following morning, and complained of a feeling of great depression and as though the senses were leaving him. The pulse was also retarded, beating only 38 in the minute. The third patient, a man of sixty-two years of age, had often used morphine and chloral for sleep without effect. After 15 grains of sulphonal deep sleep came on, lasting the whole night. On the next day, however, the patient was horrified to find that he had had a nocturnal seminal emission, the first for over ten years. He also felt sleepy the whole day, and stupefied, and could not get up.—*Berlin klin. Wocher.*, No. 7, 1889.

**CHLORIDE OF AMMONIUM IN NEURALGIA.**—W. T. Greene, M.D., writes: A gentleman recently called at my house, who said he had been suffering from neuralgia in the head and neck, left side, for fifteen weeks without a day's intermission, and that the pain was getting worse instead of better. He said that he had been prescribed for by several medical men, with scarcely any alleviation of his sufferings. He produced a bundle of prescriptions which rang the changes upon sulphate of magnesia, quinine and iron. I made him up a mixture of chloride of ammonium, twenty grains to the dose, which he took away with him. The next evening the gentleman called to say that he had taken what I had given him, and, for the first time for fifteen weeks, had passed a day without pain, having felt an improvement after taking the first dose of the medicine. He begged for another bottle as he was afraid the neuralgia might return, so I gave it to him, but he did not take the whole of it, and has had no return of the neuralgia since. Chloride of ammonium is a very simple, most valuable, and strangely neglected drug, which I have never known to fail in the treatment of neuralgia.—*Med. Press*, London, Sept. 12.