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## IMPRESSIONS OF CONTINENTAL CLINICS.

by

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#### INTRODUCTION

When proceeding home on leave at the end of 1929, the Council of the University was good enough to grant me three extra months for the purpose of visiting the principal European Clinics. I was mainly interested in hospital organisation, theatre technique, management of lying-in wards, and last but not least, radium. Under the circumstances I was fortunate in being able to visit Clinics in the following places—Vienna, Paris, London, Copenhagen, Lund, Amsterdam, Frankfurd, Leipzig, Berlin, and Dublin; I will however confine myself to the continental Clinics.

Any of our graduates proceeding to Europe will find that Vienna may be easily reached from Adriatic ports, such as Venice, or in about 24 hours from Genoa, and about 1½ to 2 days from Marseilles. Under the auspices of the American Medical Association of Vienna, newly qualified men will find that they are able to take out courses in almost every subject; in addition the Association provides valuable information with regard to rooms, and such matters.

The northern capitals may be included in a circular tour, beginning at Copenhagen, and passing on through Germany and Holland; there are a great variety of routes, of which particulars may be obtained at any of the tourist agencies.

#### VIENNA.

This city is very popular among American Medical men, who have organised post-graduate teaching under the auspices of the American Medical Association of Vienna. The Association has its club room

over a café which is very convenient for those wishing to obtain their meals quickly. There is a library containing medical books, papers, and fiction books (in English). The subscription to the association is \$15. Medical men are welcome to witness operations in the clinics, but a warning is issued to the effect that silence is expected among the visitors.

With regard to classes, I would advise our graduates to spend a few days looking round, before deciding what to do. It should be born in mind that the standard of knowledge, and, experience of graduates varies enormously, and that teaching has to be regulated accordingly. As regards cost, the classes appear to be worked out on the basis of about £1, per hour, approximately; and the cost to the individual per lecture depends on the number taking out the course.

The two main obstetrical and gynæcological clinics in Vienna are —Wertheim's (now the Kermauner) Clinic, and Schauta's (now the Peham) Clinic. These two clinics are situated in the same grounds, the Peham to the right, and the Kermauner to the left. In appearance the two buildings are similar; and one cannot help wondering whether they were so built in order to promote friendly rivalry between them; they are separated by a smaller building—which is, I understand, the nurses home.

From the point view of the Gynæcologist, Vienna has been most famous in modern times for its elaborate operations, namely the hysterectomy, and interposition operations, described by Wertheim, and the vaginal hysterectomy of Schauta. The Viennese, and in fact the German speaking countries generally seem to have a special aptitude for operations which involve an extensive dissection; and their success in this direction is probably due to the fact that the several steps in the operations have become as much a matter of routine, as heavy gun drill in the Royal Navy.

I had the pleasure of seeing Dr. Heidler operate in Wertheim's Clinic on several occasions, and he was very kind to me during my visit. I may say that the theatre sister in this clinic is one of the most capable I have seen. As regards technique, all swabs are fitted with small metal rings so that they can be hung up on a rack on the wall, and counted at a glance. The instruments not in immediate use are kept in a large tray at one end of the operating table, while those in use are at the other. The operator stands at the left-hand side of the patient, the sister on his left, with access to both the patient and the instrument table. There were usually four nurses in the theatre, one of whom was made responsible for taking the patient's pulse rate at regular intervals.

The larger gynæcological wards are used for conservative treatment; operation cases are moved from the general wards, and do not

return there. There are about 20 beds in the general wards. After operation, the patient is brought to the recovery room, where a sandbag is applied to the wound for 24 hours. Laparotomy cases are allowed up on the 4th day, and home on the 10th to 12th. Prolapse cases stay in bed 8 to 10 days. Third class patients pay about 9/per day. Many of the continental hospitals have a device by means of which the patient's own bed may be moved into the operating theatre. It consists of four wheels attached to a low frame, in such a manner that it can be slipped under the bed, and the frame "jacked up" until the bed is raised from the ground; it is an excellent arrangement, and saves the patient a considerable amount of jolting, a factor of importance after certain operations.

At the moment vaginal hysterectomy is very popular for non-malignant conditions; for malignant disease the Kermauner Clinic performs Wertheim's operation, while the Peham performs that of Schauta.

Speaking generally, the Vienna school, by combining operation with X-rays or radium, seems to be able to obtain about 58% of cures in operable cases of carcinoma of the cervix: the absolute cure rate (i.e. all cases seeking admission) varies from 28% to 32%. In carcinoma of the body the cure rate in operable cases is about 60%.

As regards maternity work, one is impressed with the lack of privacy in the Viennese wards, the majority of which are very large. On admission the patient to taken to a small bathroom, and washed (lying down) by means of a shower. She is then taken to the general labour ward, which contains from 10 to 15 beds; there she is examined, and if the case is normal, she is not moved for delivery. Abnormal cases are attended in a small operating room off the labour ward. There appear to be strict regulations with regard to visiting the labour wards, but in at least one of the clinics patients are examined without gloves being worn. Probably the explanation is a desire to economise. The wards are large, and, generally speaking screens are conspicuous by their abscence.

The methods of treatment employed in the Vienna obstetrical and gynæcological clinics are most like what we are used to in Dublin than are those of some of the other continental clines, such as Paris. There are, of course, such differences as the employment of Stroganoff's treatment for eclampsia instead of Tweedy's.

In this disease Cæsarean section is not resorted to except in the case of elderly primiparæ, when there is a chance of saving the baby. But labour may be assisted by forceps; and when coma is very deep, the cervix may be incised. The Kielland forceps is very popular in Vienna at the moment, and in fact appears to be the only type used in some of clinics.

I would like to take this opportunity of thanking Professor Kermauner and the Staff of his Clinic for their kindness to me during my visit to Vienna, and Professesor A. F. Dixon for having given me valuable introductions.

As regards amusements, I have no doubt that in summer many enjoyable excursions could be arranged to places of interest, which include the battlefields of Aspern and Wagram. The scenery along the right bank of the Danube is charming. Semmering, which is about 3,000 above sea level, is a favourite resort both summer and winter; it is particularly popular during the latter season as a health resort and as a centre of winter sports. The city itself is, of course, cold and somewhat unpleasant in the winter, but exercise (and falls) can be obtained on one of the largest artificial outdoor ice rinks in Europe.

I am indebted to Dr. T. P. Wu for the following notes on Childwelfare work in Vienna, Austria.

Child-welfare as is well understood in modern medicine, starts with the unborn child. In the 34 municipal ante-natal clinics every needy women is entitled to apply for advice and instruction. Vienna accepts, and accepts rightly that an expectant mother has the first claim on the state to provide her assistance, if not on humanitarian grounds at least as mother of the future citizen. She is kept under careful medical supervision, and systematic blood examination is done with a view to combat the incidence of hereditary syphilis. If the women, who apply in these centres, do not get an allowance from the insurance fund, they receive, following confinement, a sum of 10 sch. a week for four weeks from the municipality. The municipality also maintains a number of maternity homes and lying-in hospitals in different parts of the city. Fully 2/5ths of all legitimate children and 1/2 of all illegitimate children are born in the city maternity homes. remaining births are also kept under observation. Registrars of birth keep the welfare centres informed about the birth of every child, and the latter in turn send out health visitors who are in constant attendance by day and night, to render help in case of necessity, to look Thus, not a single child is born without offer of after the child. assistance from the municipality. Moreover every mother, irrespective of financial status, gets a complete set of babies' outfit after the birth of the child. In 1928, 11,808 packets were distributed, which means that 59.92 per cent. of the babies born in Vienna during that year got the clothing outfit. In these centres lectures and demonstrations are regularly given about the methods of rearing children and things connected therewith.

To further the cause of child-welfare in a most systematic and efficient way the municipality in 1925 established a Children's Reception Office. It functions with striking success. All children from boyhood and girlhood to fourteen years requiring assistance are classified. The

infants, children of pre-school age or school-going age are all sent to different institutions where they stay until a suitable place is found for At the end of 1927, 14,892 children were cared for, and a maintenance allowance of 45 schiling a month was paid by the municipality for each of such children. The latest addition to the children's homes is the Hapsburg Castle, which the municipality acquired in 1927. Sick children are placed in nursing homes or hospitals. is a special hospital for children with venereal diseases. If children cannot be placed with foster parents, they are admitted to the city orphanages. The child-welfare work is further supplemented by 125 nurseries and homes, where in 1928, 11,975 children were accommodated, and 90 dining-rooms, where meals are served to more than one-tenth of all school-children (15,000), 81.9 per cent, being free because of the poverty of the parents. The municipality has seven Recreation Homes on the boundaries of Vienna and send out children for holidays during the Summer vacation. In 1928, 26,495 children, that is to say more than one-sixth of all Vienna school children, had a holiday at the cost of the municipality. Thirty-one play-grounds thirteen skating rinks and eighteen free baths further serve to advance the health of the children.

#### PARIS.

In Paris I had the pleasure of calling on Dr. Gregg, of the Rockefeller Foundation. Dr. Gregg was most kind, not only in the matter of giving me advice as to where to go, but also with regard to introductions, and I would like to thank him for all he has done for me.

To the visitor, the subject of greatest medical interest in Paris is, of course, the Radium Institute, and I was fortunate enough to have an opportunity of seeing something of the technique. Paris has also got two maternity hospitals which bear names that are famous in obstetrical literature.

#### THE BAUDELOCQUE HOSPITAL.

I understand that there are approximately 190 maternity beds, and 25 gynæcological beds in this hospital; and that about 3,400 cases are attended annually. There also appears to be a large out-patient department.

The labour ward proper is situated on one side of a corridor, and is devoted entirely to the treatment of normal cases. It is a large ward divided up into a number of cubicles. The lower half of each bed is detachable, and when removed, leg rests can be attached to the upper end. Across the corridor immediately opposite the labour ward there is a small theatre which is used for obstetrical operations, forceps, version, and so forth. Major operations such as Cæsarean section are performed in the main theatre.

This hospital has a very fine obstetrical museum, containing many interesting specimens, including contracted pelves.

Particular attention is paid to the isolation of tubercular patients, and a special ward containing eight beds is used for the purpose. An attempt is also made to place the babies of tubercular mothers in a country home when ever possible (Grancher system).

The cases of eclampsia average one per year.

In this hospital I was most impressed by the attention that was given to tuberculosis.

### THE TARNIER HOSPITAL.

This is an impressive-looking building, particularly inside; it is situated in the Rue d'Assas, not very far from the Pantheon, as distances go in Paris.

The annual confinements number about 2,500.

There is a fine antenatal clinic, which is conducted in a large ward of 12 beds. The patients undress in a special room outside the ward, and then come in, and lie down on the beds until their turn has arrived for examination. The beds are divided off from one another by curtains so that adequate privacy is ensured. This arrangement is very advantageous to the doctor on duty, as he can pass quickly from one patient to another, and at the same time make a thorough examination. Waiting cases are accommodated in a large ward, situated in a different part of the building from the labour ward, which is at the end of the first floor corridor. In shape, the labour ward resembles a large operating theatre, and has space for about six beds. Unlike the Baudelocque, the ends of the beds are not detachable. The theatre is next to the labour ward.

I had the pleasure of meeting Professor Brindeau who very kindly showed me a film illustrating normal labour. The patient is delivered on her back, the fingers of the right hand are used to dilate the vulva anteriorly, while posteriorly the fingers of the left hand retard the advance of the head. The Professor appears to be very keen on the teaching of obstetrics, and the film I saw was excellent.

I was introduced to his first assistant, who speaks excellent English, and who very kindly showed me over the hospital. With him I was present at a Cæsarean section. It was a lower segment operation under spinal anæsthesia, the lower segment being opened by the elliptical incision. The French operators appear to wear very thick gloves.

I understand that the Paris School incline more to radical treatment in midwifery than we do; particularly in such conditions as eclampsia, and accidental hæmorrhage. The new symphysiotomy operation is popular, it is said that no belt is necessary, the after treatment simple, and that the patient may get up on the 14th day.

#### RADIUM CLINIC.

The consultation rooms of the clinic are in the Rue d'Ulm, a few minutes walk from the Pantheon. The Medico-Chirurgical Service of the Curie Foundation is in the Rue Antoine-Chantin.

The treatment of carcinoma of the cervix as described by Lacasagne (1929) is somewhat as follows:—

About 66 milligrams of radium are used, being distriubted in six tubes, each being 2.0 cms. long. Four of the tubes contain 13.3 mgms. of radium, the other two  $6.6\overline{6}$  mgms. each. Three tubes are inserted into the cervix and uterine cavity, one lying above the other; a gum elastic catheter forms the container. The remaining three are placed one in each lateral fornix, and one in the middle line below the cervix. Radium is never placed in front of, or behind the cervix. tubes are protected by a screen of cork covered by collodion; the corks in the lateral vaginal fornices are held apart by a spring. The radium in the uterus has a screening equivalent to 1mm. of platinum, that The treatment extends over a period of in the vagina to 1.5 mm. five to six days. The dosage may be up to 8,000, or 9,300 m.e.-h. If there is stenosis of the cervical canal, radium is applied vaginally until such time as the growth has sufficiently retrogressed to allow of access to the uterine cavity.

Local treatment combined with either X-rays, or radium externally, is the treatment of choice under most circumstances.

The external application of radium is carried out by means of 4 grams of radium, forming the so-called "bomb." The bomb is placed at a distance of 6 to 10 cms. from the skin, and daily exposures are given over period of a fortnight to three weeks. Although the bomb has not been tried out sufficiently, as yet, the results so far appear to be encouraging. The treatment is easily carried out, and the dosage can be satisfactorily determined. By this method, the treatment of several advanced cases has been very encouraging. A 48% cure (5 year) was obtained in operable, or border-line, cases treated during 1923.

The Paris school believe that external irradiation is indicated in all except the very earliest cases of cancer of the cervix.

For the purpose of actually handling the radium a special table has been made, which affords the operator a maximum of protection. Radium tubes are always manipulated by forceps, never with the hand.

### SWEDEN AND DENMARK.

Owing to the kindness of the Master of the Rotunda, I received an invitation to join the Northern Tour of the Gynæcological Visiting Society, and I greatly appreciated the kindness of the President, Prof.

Blair Bell and the Hon. Secretary, Dr. Eardley Holland, during my visit to Copenhagen and Sweden.

## COPENHAGEN.

This it is an extremely attractive city, beautifully laid out, possessing handsome buildings, and statues; and there are many castles of historical interest in the vicinity. In connection with their hospitals, two points are worthy of note, firstly—they are mostly fine buildings, (see Figures 1, 2), and, in the new hospital, expensive fittings, and sound proof floors have been provided: Secondly—there appears to be a tendency to build their hospitals in spaceous grounds, and away from the more crowded parts of the city.

It is a curious fact that some of the best organised clinics are to be seen in the smaller countries such as Denmark. I was specially interested in the Danish system of midwifery training, both of students and midwives.

In the Juliane Mariesvej there are twin maternity clinics. On entering the main building, the Clinic of Prof. Gammeltoft, which is devoted to the training of students, is on the left, while that of Prof. Hauch, on the right, is the widwives' training school.

Students' Training:—Students appear to do about 5 hours' midwifery per week over a period of  $1\frac{1}{2}$  years. A special feature seems to be the amount of teaching carried out on the phantom.

Students do not personally conduct cases until after they are qualified, although they may visit the labour wards. In addition to the Professor, the assistants also hold clinical classes in the wards. As soon as a student qualifies he is obliged to reside for one month in the hospital, and conduct 25 maternity cases; during this time he is usually allowed to apply the forceps, or perform a version. The Professor spends about 1½ hours daily in the wards and personally inspects every placenta. Patients go home on the 10th day. The name of everyone who has come into contact with the patient is entered on the maternity case sheet.

On account of her enormous practical experience, the head midwife is regarded as the best person to teach normal midwifery.

One method of teaching deserves special mention, because of its somewhat unusual nature. Periodical class examinations are held, but the students do not sign their papers; they are therefore not afraid to expose their ignorance, which necessarily is dealt with in a merciful manner.

Midwives' Training:—Midwives were first introduced into Denmark in 1537, and carried out their duties under the authority of the clergy. Midwives are trained for two years, and it costs a midwife 1,500 to 2,000 kroner to qualify, i.e.:—

(The value of the kr. is a little over 1/-)

A nurse in general training gets 2 months in the puerperal wards.

Midwives are allowed to stitch perinæums, but are not allowed to perform operations unless medical assistance is not available. Operations are, however, taught, since in the outlying islands, especially in winter, a midwife may have to rely entirely on herself. Midwives are not regarded as good post partum nurses.

The proportion of midwives to the general inhabitants is 1 to 3,000. The Danes have a high sense of cleanliness, and their puerperal sepsis mortality rate is about 1 to 1,000. The maternal mortality rate from all causes varies between 2 and 3 per 1,000.

We also visited the Gentofte Amtsygehus, which is the most modern hospital in Denmark. Here we were received by the Chief Surgeon, Dr. Helsted. In this hospital special care has been taken to secure adequate ventilation and to reduce noise to a minimum; special sound-proof material has been placed on the walls and floor. As a result, voices do not carry, and footsteps are almost inaudible.

The entire hospital seems to have been planned with the greatest care, and leaves little to be desired.

We also saw something of their radium work. The amount of radium available in the women's hospital is about 2 grms, for emanation, and 1,800 milligrams of the salt. In the treatment of carcinoma of the cervix 70 m.c.d. are applied to the interior of the cervix, and 70 in the neighbourhood of the external os. It is allowed to remain in this position for 24 hours, and repeated in 12 days. In carcinoma of the body of the uterus, 30 to 35 m.c.d. are applied to the uterine cavity, and 35 outside the external os. Unfortunately I am unable to give any of the statistics.

## LUND (SWEDEN).

Lund is the seat of one of the principal Universities in Sweden, and is a quaint old city. It is quite close to Malmo (half an hour by rail), and altogether only about two hours' actual travelling from Copenhagen. But there is the inevitable passport and customs' examination to be gone through, formalities which usually take up quite a considerable time.

The tourist cannot fail to be interested in the enormous clock which has been erected in the aisle of the cathedral. In addition to telling the time, it indicates various saints days, and the position of the sun and moon. But the principal feature of the clock is its behaviour at midday—firstly—two knights on horseback smite each other twelve times with their swords. Then—just above the face of the clock, a herald emerges on each side, and commences to play a quaint little medieval tune; while the wise men from the East parade

in front of a statuette of the Virgin and Child, placed just above the centre of the clock face. It may be mentioned that although the knights record all the hours, the wise men, and the heralds only appear at noon.

In Professor Essen Moller's Clinic, the theatre arrangements were on the twin principle, that is, there were two similar theatres, separated by a sterilising room. Such a plan permits of a considerable saving of time, because as soon as one case is finished, the Professor can at once start the next case in the other theatre, without having to wait the usual 20-30 minutes, (which is occupied in cleaning up, getting one patient out of the theatre and the other into it). We had the pleasure of seeing Professor Essen Moller operate. He appeared to have a very competent staff of assistants, and the theatre sister and nurses were smart and efficient.

It may be of interest to mention that in both Copenhagen and Lund the theatres appeared to be staffed by a sister and at least three nurses. There were over 20 people watching the operation, but within a few minutes there was absolute silence. Professor Essen Moller seldom speaks himself while operating, and on this occasion the spectators were so interested that they unconsciously followed his example. Someone remarked that he was a man that one would choose to perform an operation on one's own family for he had brought carefulness to a fine art. For example, the abdominal wall was neatly closed, the rectus sheath being brought together with interrupted catgut sutures, during the insertion of which the skin and fat were held back by a special retractor. The skin wound was then put on tension by another retractor, and the edges brought together by a subcuticular suture, and finally Michel's clips (Wachenfelt's modification) were inserted. It must be something of an ordeal to operate before a number of other gynæcological surgeons, who, although they will appreciate the difficulties better than a class of post-graduates, must nevertheless constitute a critical gathering, at all events, from the point of view of the operator.

The labour wards are similar to the theatre in general plan; there is a ward for private cases—one for attending new-born babies, and about 10 isolation wards.

The Professor is appointed to the University by the Government, and he is ipso facto Chief Gynæcological Surgeon to the Government Hospital, retiring at the age of 65. He is allowed to operate and attend cases outside, but he does not do so to any extent, because he has ample accommodation for patients in the hospital. There is a special department for the Professor's private patients.

In this Clinic, and in many of the German Clinics, there is a special department for first class patients. This is undoubtedly a step in the

evolution of medical treatment, for equipment has now become so expensive that few nursing homes can hope to be as efficient as a modern hospital, and consequently the latter must provide accommodation for all classes.

Poor patients may be taken in free, or charged from 1 to 4 kroners a day, at the discretion of the Professor. Private patients are charged the equivalent of about £4.4. per week. The average number of maternity cases treated is about 2,000 per annum. Approximately 90% of all labours are in hospital: in Stockholm 94%.

The student's course of training lasts longer than in most countries. His pre-clinical studies are of about 4 years' duration; the ensuing clinical work takes about another 4 to  $4\frac{1}{2}$  years, but not more than 3 years must elapse between the first and last examination. Examinations are passed separately; they consist of clinicals or orals only, no paper. The student may present himself for examination when he likes, and presumably the Professor takes him round the ward for his examination. Medicine and surgery must be passed first. In obstetrics, the student first attends lectures and demonstrations on the phantom before proceeding to conduct normal cases. The student conducts 50 maternity cases, and performs 70 gynæcological examinations. I understand that the obstetrical course is regarded as efficient, and consequently has undergone little change of late years.

I regret that I have no particulars with regard to the training of midwives, of which there are about 3,000 in Sweden. They are allowed to put on forceps in outlet cases.

The population of Sweden is approximately 6,000,000.

#### HOLLAND.

Holland is a country of canals, windmills, and cheeses-Amsterdam, for instance might well be called the Venice of the North. tour of the city can be made by boat, and pleasure trips made to the island of Markham, where the old Dutch costumes are still preserved. The Dutch farm houses are a model of cleanliness, built in pyrimid shapé, each house provides accommodation for the cattle and horses in the winter; the apex of the pyriamid is a hay loft, beneath which lies the principal living room. The sleeping accommodation consists of a cupboard in the wall, (the bed itself somewhat resembling a ship's bunk, there is a little shelf set apart for the baby); another section of the house is devoted to cheese making. Instead of fences, the fields and gardens are surrounded by little canals, and the farmer can thus take his cabbages to market by boat. The canals are of course constructed for the purpose of drainage, some being at a higher level than others, the windmills being used as pumps for the purpose of driving water from a lower level canal to a higher; much of the country being below sea level. I understand that the Government have now a scheme on hand for reclaiming a large portion of the Zuyder Zee—it is a good method of dealing with unemployment. In former times vessels used to reach the port of Amsterdam via the Zuyder Zee, now all the principal shipping goes to Amsterdam via the large canal which has been constructed between this city and Ymuiden, on the North sea.

In the Dutch hospitals which I visited, I was impressed by two things, firstly—the care that was taken of the patients, and secondly the hospital equipment. For instance two items may be mentioned which will illustrate both points—I. Specially constructed hot water bottles are always ready in the wards, the stoppers are never removed, and the bottles are kept in a special oven which is electrically heated; the bottles are thus ready for use at any hour of the day or night. 2. In the labour wards, sets of infants clothes are kept in a specially constructed hot cupboard; warm dry clothes are thus available whenever a child is born.

#### Amsterdam,

Professor A. H. van Rooy, of the University Obstetrical Clinic was exceedingly kind to me during my visit to this city. He has a large and well equipped Unit which, I understand is situated in the same grounds as the Medical and Surgical Units of the University. The entire Hospital appears to be administered by a Director, but the internal administration of each Unit is in the hands of the Professor, both as regards Saff, organisation, and technique. The Professors, I believe, rank equally with the Director and have the right of direct approach to Government should occasion demand it.

Although the Professors are all Government servants they have the right to do private practice. Unlike many of the continental hospitals, there is no provision made for better class patients, and the staff are obliged to have their nursing home elsewhere.

In the Maternity Wards from 1,500 to 2,000 cases are attended every year. The Nursing Staff appear to be competent, and sufficiently numerous—for instance—the theatre is run by a sister, and about 4 nurses, there is a gynæcological sister, and a regular labour ward staff on eight hour shifts. Nurses with 3 years general training do 1 year at obstetrics and gynæcology; but girls seeking a midwives diploma only, are obliged to do 3 years.

Students have a seven years course in the Medical Faculty, the last four if which are devoted to Clinical work. Regular lectures in obstetrics are attended in the fifth or sixth year. During the final year, the student lives in hospital; he is attached to the surgical wards for three months,—the medical,—obstetrical,—and gynæcological, for similar periods respectively. That is he does three months resident in obstetrics, and three months in gynæcology, and during this time special courses are given in these subjects. At the end of each three monthly course

the student has to pass a class examination, after passing which he is signed up and allowed to proceed to the next subject.

Maternity patients are delivered on which ever side the back of the fætus is directed towards, with the object of facilitating the progress A light chain is attached, to the foot of the bed, it is fitted with a special handle on which the patient may pull during the second stage; this appears to possess many advantages over the roller towel arrangement commonly used for this purpose. The lying-in wards are all fitted with a babies bath, placed in full view of the bed-, so that the mothers shall have the advantage of seeing the babies bathed, and of learning how to attend to them. The Dutch Clinics claim that they are very successful in the rearing of premature infants. University Clinic the infants are under the care of a special pediatrician, and are placed firstly in a closed incubator, later the incubator is opened, and when the baby is strong enough, it is placed in an ordinary cot. The feeding is carried out with a rubber catheter. The hospital also conducts an ante-natal department, some of the patients attend at 14 day intervals, some weekly, and some every few days, according to their state of health.

On the Gynæcological side post operative cases do not at once return to the general wards, but to a separate ward where they are under the care of a specially trained nursing staff for about three days. I was greatly impressed with the care which was taken in the closing of the abdominal wound after laparotomy, the Professor has a special technique of his own, and a most able Assistant. Cases of carcinoma are treated in a special ward, and the word cancer is not mentioned, the patient herself being informed that she has an inflammatory disease. Cases of adenocarcinoma are treated by operation followed by deep X-rays, while epithelioma cases are treated by radium alone. The Professor does not believe that radium is the treatment of choice in the former condition. The Clinic has, I understand, the use of 300 milligrams of radium. Diathermy is used in the treatment of pelvic inflammation.

I wish to take this opportunity of thanking Professor van Rooy and his Staff for their kindness to me and for showing me the details of their most interesting Clinic. Visitors to Amsterdam will find no difficulty in making themselves understood, as most of the Medical Staff speak English.

I also visited a smaller midwifery hospital situated in another part of the city. It seemed to be fitted out with the same attention to detail which is noticeable in the University Clinic. As the Dutch themselves say, they have only a small army and navy, and consequently have more money to spend on medicine.

#### THE HAGUE.

The new children's hospital is very well worth a visit, it is equipped on the most modern lines, and everything has been done to secure efficiency and to make the children as happy as possible. I am indebted to Dr. T. P. Wu for very kindly translating a portion of the Report of the Hospital.

Extracts from the Report of the Children's Hospital The Hague.

There is a great difference between the diseases of children, and those of adults, as far as supervision is concerned. A great many children are admitted to hospital suffering from constitutional disorders; their health is undermined from the start, by unhygienic surroundings, bad food, and ignorant management. Thus, in children of this type, acute illness may at any time occur, necessitating the child's admission to hospital. Although under the good care and careful nursing in hospital, the acute stage may be controlled, a complete cure is not quickly attained; and if the child is discharged before its strength has been securely built up, the apparent cure will only last a short time, and the child will soon be back in hospital again.

As regards chronic infections such as tuberculosis, the patient requires much care, long treatment, and special hygienic conditions.

Thus we see that a children's hospital is of great importance, and its value is increased by its having a sanatorium character. Such a hospital is a great boon to all those who, owing to living in bad surroundings, and so forth, are unable to give their children the care and attention that is required.

In the construction of a children's hospital, in order to obtain the greatest benefit from it, the following points should be considered.

- all the characteristics of a sanatorium,—thus, in the first place, the ground should be properly chosen. The hospital should be built on an elevated position, and away from the industrial centre of the town. It should be so situated that it will obtain the maximum value from the sunshine, and not be exposed to unpleasant winds.
- 2. The building. It should be built in such a way that light can enter from both sides. Wide verandahs, or shaded balconies, should be constructed for open air treatment, and for the application of physical theraphy in the widest sense.
- 3. Departments, and wards. The nursing quarters, the wards, and rooms for treatment, should be properly situated, and separated from one another. In the quarantine ward of this hospital, each child is given a separate compartment, which is isolated from the others by a glass partition.

4. The nursing staff. A better, more efficient, and more conscientious nursing staff is required for the supervision of children than of adult patients.

I was greatly impressed by the quarantine ward described in the third paragraph, I understand that every child on admission passes through this ward, remaining in quarantine for some days, then if no infectious illness develops, the child is transferred to the ward where its particular illness is treated.

The quarantine ward is divided down the centre by a passage way off which the glass compartments, or cubicles open. Each cubicle is complete in itself, it has its own bed pan, flushing apparatus, and so forth. The advantage of this system is that efficient quarantine is provided without additional nursing staff being necessary, for one nurse can inspect the whole ward. The children seem to be well provided with toys, and in many places nursery rhymes are illustrated on the walls of the hospital.

The Hague is quite an attractive city, in its own way, and the Peace Palace is well worth a visit, from the point of view of the tourist it does not possess the advantages of Amsterdam.

#### GERMANY.

## Frankfurt A/M.

Professor Ludwig Seitz, Stadt Krankenhaus.

There are about 300 beds in this hospital (120 maternity, and 180 gynæcological) and approximately 2,000 maternity cases are treated per annum. The Staff of the Clinic is over 20; there are six paid assistants who live in the hospital, each being appointed to a particular part of the hospital or "Station" for a certain time. The main "Stations" are as follows:—

- 1. Obstetrical. 2. Gynæcological. 3. Carcinoma.
- 4. X-Rays. 5. Septic. 6. Pathological.

There are in addition some other "Stations" to which members of the Staff may be appointed.

The hospital is composed of Medical, Surgical, and Obstetrical Units, its organisation appears to be somewhat similar to that in Amsterdam, namely it is administered by a Director, but the latter is apparently not concerned in purely medical matters. The Staff are paid by the Government, and the hospital itself is partly under the State, and partly under the government. There is accommodation for first, second, and third class patients.

1st Class pay about £1, per day to the hospital, and a maternity fee to the Professor of about £30. (600 RM).

2nd Class pay about 10/- per day, and £15, to the Professor.

3rd Class patients pay 5/- per day. The Staff, I un stand, do little, if any work outside the hospital, at least The Staff, I underfar as the Professor and the paid Assistants are concerned. Students appear to reside in hospital for a short period, (about 10 days). The maternity wards are not very large, the babies are kept in a separate nursery, but are brought to the mothers at feeding times. The patients get up on the fourth day, and go home on the tenth. Rickets is rare, but eclampsia fairly common (say 40 cases a year); the latter disease is treated, I understand, by Stroganoff's method, and-or —Cæsarean section. The lower segment operation has been adopted to the exclusion of the classical. There is a very elaborate X-ray plant, both for deep theraphy and diagnosis. Early cases of malignant disease of the uterus are treated by operation and X-rays, and radium; late cases by X-rays and radium alone. The clinic appears to be most famous for its X-ray work. There is a modern and well equipped The city itself presents many items of pathological department. interest including the Gothe House, old streets, and Town Hall. Heidelburg, an old University city, is within easy reach by rail, as is also the famous tourist centre Wiesbaden.

#### LEIPZIG.

The University-Frauenklinik (Prof. Dr. Hugo Sellheim) is one of the largest women's clinics I have seen. It consists of three blocks, A.B.C. respectively, forming three sides of a rectangle, the fourth side being formed by the road. Immediately opposite the hospital (across the road), is a building corresponding approximately in length with the middle block (B. block); this building is devoted to housing of the Staff (medical). The space enclosed between the road and the hospital forms an attractive garden. There are in all I understand, about 380 beds, and a large staff, on the usual continental lines, consisting of a Professor who directs the Clinic, an Associate Professor, and numerous assistants, and juniors. Patients are admitted on what appears to be a somewhat similar arrangement to that of Frankfurt, namely as 1st, 2nd and 3rd class, the first two paying a fee to the Professor for medical attendance. The division of the hospital into three blocks is probably with the idea of providing accommodation for three separate types of case, namely (1) 1st and 2nd class patients, (2) maternity (3rd class), (3) Gynacological cases. There is special accommodation for maternity cases admitted with temperatures. The hospital has its own Pathological Department, which appeared to be well equipped. Students attend lectures in the hospital for about a year, during which time they conduct a limited number of cases. After qualification but before a state certificate is granted, each graduate must reside for a year in a hospital, four months of this time must be spent at medicine, but the remaining eight months may be spent in any departments which he wishes. This system of a year's residence in hospital probably explains the need of so much staff accommodation. A separate stairway is provided for students, in order to avoid their using the main stairs of the hospital.

Approximately 4,000 maternity cases are attended each year, including about 30 to 40 cases of eclampsia; this disease is said to be more common in northern Germany. The labour and lying-in wards are on the twin system, that is, two complete floors, one above the other. Each labour ward is sub-divided into three small wards with two beds in each, I understand that large labour wards are not approved of; there is also a private labour ward, and a room that is used for forceps application, and other obstetrical operations. special feature of this hospital is the equipment of a small room near the labour ward, to represent a bedroom in a private house; it is used for the purpose of teaching students how to conduct midwifery cases in the patient's home. The assistants appear to do 24 hours on duty in the labour wards, and 24 hours off duty, and there is always one assistant available for the two labour wards. This Clinic also appears to have the usual German policy of having medical officers attached to certain departments, or "stations" as they are called; there are rooms for a Medical Officer, and rooms for a sister on every floor, or "station," and also a nice staff mess room in the hospital. Special accommodation for unmarried pregnant women is a feature of many of the continental maternity hospitals; a woman may come into hospital as early as the third or fourth month, and remain there until after her baby is born, naturally the hospital authorities expect her to do house work in the Clinic as long as she is able do to so. The accommodation appears to consist of a dormitory, to which is attached a wash up room, no basins are allowed in the dormitory in order to avoid splashing of the walls and floors. It is not to be supposed that these women have a comfortable life in the hospital, but it is at least a refuge which is easily entered, and where their health is attended to during pregnancy.

The most noticeable feature on the Gynæcological side is the very large operating theatre, I would estimate it to be about 42 feet long, 27 feet wide, by 18 feet high. There is a special open passage way running the length of the theatre, the openings, three in number are large enough to permit the passage of trolleys; this passage way is rendered necessary by the fact that there are at least two operating tables in the theatre, and each table must be readily accessible to a trolley which should not pass near to another table that might be in use. Leading off the theatre is a room almost as large, it is fitted up with wash basins at one end (next the theatre), and it also contains two operating tables for use in minor cases. As may be expected there is an up to date equipment in the X-ray department for the treatment

of malignant disease, I understand that radium is also used when possible, either before or after operation.

### BERLIN.

## Universitats-Frauenklinic.

This hospital is not so big as the one at Leipzig, but appears to be undergoing reconstruction, incidentally, I was told that it was Prof. Stoekel who designed the latter, when he was Professor at Leipzig, and I have no doubt that he will be responsible for many improvements in the Berlin Hospital. There are about 200 beds, and approximately 2,000 maternity cases are attended annually in the hospital, and about 1,800 on the district.

Students attend three cases in the wards, and are then allowed to conduct cases on the district. For teaching purposes, there is an excellent theatre to which patients can be brought when it is desired to demonstrate a special type of case. The labour ward is of the large type, and leading off it is an operating room for forceps and another for obstetrical operations. The lying-in wards are somewhat small, and when the central heating is turned on, to our way of thinking they are stuffy; the babies are kept with their mothers in the lying-in wards. The patients are delivered on their backs; cases of contracted pelvis (necessitating delivery by Cæsarean section) average about 20 per annum, and eclampsia cases about the same number. I gather that the treatment of the latter condition tends towards the active side. at Leipzig, there is a special isolation block for the treatment of maternity cases admitted with a temperature. The operating theatre is of average size, but containing two operating tables, which are illuminated by a reflected light; after operation patients do not return to the general wards for three days. There is a modern X-ray department.

Many members of the staff live in the hospital, and I had the pleasure of meeting Dr. Mickulitz at his rooms, and he was kind enough to show me their radium technique, which was of considerable interest.

## Charité Frauenklinic.

It was very fortunate in seeing Prof. Wagner perform a Wertheim's operation, and as one would expect from a former member of this famous Vienna Clinic (Wertheim's), the operation was performed with skill and rapidity—neither he, nor his assistants, wore gloves. The Clinic is of moderate size, containing both maternity and gynæcological wards.

In conclusion, I wish to thank the Professors and Staffs of all the Clinics which I visited for their kindness and hospitality to me, and to express my regret for any mistakes that may appear in this paper.

## CURRENT SURGICAL FALLACIES.

## Kenclm H. Digby.

(It is proposed in this series of notes to have a tilt at certain views on surgical matters which are generally accepted, but which, it is alleged, are inaccurate).

No. 1 That the vermiform appendix is a vestigial relic in man.

## THE FALLACY.

Darwin in his "Descent of Man" wrote:—(1) "It appears as if, in consequence of changed diet or habits, the caecum had become much shortened in various animals, the vermiform appendix being left as a rudiment of the shortened part. That the appendix is a rudiment we may infer from its small size and from the evidence.... of its variability in man..... Not only it is useless, etc....... "Such a view could not fail to be popular with surgeons. Later Sir Frederick Treves declared (2) that the appendix was "obsolete and out of date" and that "it is safe to predict that in the intestine of the man of the future there will be no such structure hanging from the caecum." These early views are still held by very many medical men.

THE FACTS (3).

A.—Although the lumen of the human vermiform appendix is reduced as compared with the caecum, the wall is considerably thickened by the addition of a new, submucous layer of lymphoid tissue. The vermiform appendix should be renamed the lymphoid process of the caecum.

B.—The majority of mammals present a single blind process, the caecum, at the beginning of the large intestine: the majority of birds present a pair of blind processes or caeca. The caeca in birds are lined throughout with lymphoid tissue in the submucosa\*: the mammalian caecum nearly always has lymphoid tissue at its apex; sometimes this forms a tonsil-like organ projecting into the lumen of the caecum, at other times the caecal lumen at the apex is reduced, but the walls are thickened with the lymphoid tissue, and a vermiform appendix appears.

C.—The possession of a vermiform appendix is not confined to men and the higher apes. A well developed vermiform appendix is to be found in the following species:—

Most rodents: Rabbit (Lepus Cuniculus)
Hare ( ,, )
Lagomys pusillus.
Beaver (Castor Fiber).
Canadian Porcupine (Erythrizon Dorsatus).

<sup>\*</sup> It is interesting to note that the lymphoid cacca of birds are liable to inflammatory diseases e.g. blackhead and Quail disease just as is the lymphoid apex of the mammalian excum in appendicitis.

A few ungulates: Peccary (Dicolyles).

Tapir (Tapirus Americanus).

Some marsupials Vulpine Phalanger (Trichosurus Vulginus).

Koala (Phascolarctus Cinereus). Wombat (Phascolymis Wombat).

Most lemurs—Lemur Macao.

All the anthropoid apes—Orang.

Gibbon.
Chimpanzee.
Gorilla.

Homo Sapiens.

D.—The lymphoid vermiform appendix reaches its highest and most complex state of development in the purely vegetarian rodent, the rabbit. There is no reason to imagine that the enormous caecum of the rabbit has shrunken from something still more immense.

- (1) Darwin "Descent of Man" 2nd edition 1874, p. 21.
- (2) Treves "Surgical Treatment of Typhlitis," p. 14.
- (3) Digby "Immunity in Health," 1919.

No. 2 That in the usual type of case of dislocation of the shoulder joint, the head of the humerus passes through a rent in the capsule.

#### THE FALLACY.

Let us quote from one of the latest text books (1) on the subject of dislocation of the shoulder joint. "The weakest spot in the capsule lies between the subscapularis and teres major tendons, and it is usually at this point that the head of the humerus escapes from its capsule," and later speaking of Kocher's method of reduction "The first movements put the rent in the capsule on the stretch, the second levers the head of the humerus down till it is opposite to the opening, the third relaxes the opening and makes the head pass through into the joint."

There is a coloured plate in one of the New Sydenham Society's publications (2) displaying a dissection of a subcoracoid dislocation showing a rent in the capsule.

THE FACTS.

- A.—The capsule of the shoulder joint is so loose that, unsupported by muscles as in some cases of paralysis, the head of the humerus falls right away from the glenoid cavity.
- B.—If the muscles are removed from the shoulder joint in a cadaver so that the humerus is only attached to the shoulder girdle by the capsule and its associated ligaments, it is possible to produce

a subcoracoid dislocation of the shoulder joint without rupturing the capsule anywhere.

- C.—The large one-third-of-a-sphere head of the humerus is far too blunt to puncture a tough capsule.
- D.—The hole shown in the coloured plate from the New Sydenham Society publication is literally not half big enough to permit the escape of the head. Nor is the head, in the plate, represented as lying outside the capsule! It is possible that the normal orifice of the subscapularis bursa has sometimes been mistaken for a rent in the capsule.
- E.—The fact that subcoracoid dislocations may usually be reduced with great ease and without anaesthesia is not compatible with a head being forced through a rent in the capsule.
- F.—The trivial violence which, in cases of recurrent dislocation of the shoulder, causes the accident, and the extreme ease of replacement does not fit in with the idea of the large humeral head being forced through a capsular rent.
- G.—If the usual view is correct, namely that a subcoracoid dislocation starts as a subglenoid one, we should have to imagine a rent in the inferior part of the capsule, but this is negatived by the exceeding redundancy of the lower fibres of the capsule and by the fact that no rent has been described.
- H.—Did the humeral head in actual fact pass through a rent in the capsule, it is very unlikely that mere traction would effect a reduction, as we all know it sometimes will.
- I.—At open operations for unreduced dislocation of the shoulder joint the head is found within the capsule. This appeared to be the case in a recent operation at the Civil Hospital where a subcoracoid dislocation of the shoulder joint had occurred two months earlier.

From these facts and considerations the conclusion seems to be irresistible that the usual subcoracoid dislocation is an *intracapsular dislocation*, and that the obstacles to reduction in a recent case are the contracting tone of the muscles and the edge of the glenoid fossa.

- (1) Souttar—" The Art of Surgery," p. 173, 1930.
- 2) Helferich "On Fractures and Dislocations," plate XXIX.
- (3) Private case—Mr. T. D. S. ———. (17/5/31).

#### CASES FOR DIAGNOSIS.

[We are printing below three Clinical Cases for diagnosis. These cases have been submitted to us along with the solutions, and members of the society who are at presest in the Clinical period are invited to send in solutions. We are offering a prize of \$50 to the student who sends solutions which in the opinion of the Editor are the best. Solutions must reach the Editor on or before Monday, 25th January, 1932. The results and solutions will be published in the next issue of "The Caduceus."—Ed.]

## CASE (A).

A Chinese gentleman, 52 years of age, somewhat fat and without previous history of diarrhea or abdominal trouble was stretching his arms at 10 o'clock one morning when he was suddenly seized with a pain in the epigastric region. (He had slept well the previous night and his bowels had opened naturally in the early morning). took breakfast—a single bowl of rice. The pain became gradually He took some Chinese medicine and vomited. At 3 p.m. he was seen by his doctor. He was then in a very collapsed state and was given a quarter of a grain of morphia, from which he had no relief. By the evening he had not vomited again but the pain was very bad and then was felt to be worse in the left side. Pain was also felt in the back. The urine was distinctly high coloured and contained a trace of albumin. The abdomen was distended but not very rigid. The pulse was ninety per minute. The patient was not anæmic; some degree of cyanosis was noted. There were no abnormal physical signs in the chest. The hernial orifices were normal. There was some result from an enema.

## CASE (B).

A young man between 20 and 30 years of age, who had previously enjoyed good health except for a few weeks of fever four years before, attended his father's funeral. On his return from the funeral he felt some uneasiness in the right iliac fossa and then experienced a severe rigor lasting for half an hour. Four more rigors followed during the night, and then one rigor occurred each day for the following nine days. The uneasiness in the right iliac fossa which persisted for two more days, on the third day of the illness amounted to pain, but from the fourth to the 8th day of the illness all pain vanished. 9th day about titien time, the pain returned, but this time it was higher up beneath the costal margin and was especially noticed when the patient took a deep breath. During this ten day illness the patient had never vomited except after Chinese medicines. The bowels had acted normally every day, but the motions were black possibly due to some ingredient in the Chinese medicines. He had suffered from occasional headaches, and his food had consisted of sweet potatoes, macaroni and such like.

On the tenth day the temperature was 103° and the pulse 144 per minute but a strong beat. The abdomen was supple and moved

well on respiration. Beneath the right costal margin there was a slight sense of resistance and tenderness on palpation. The area of splenic dullness was increased but the spleen was not palpable. There was no jaundice and the urine was free from bile though highly coloured. When blood was squeezed into the end of a finger the nail appeared red and slightly cyanosed.

## CASE (C).

This patient was an English girl 18 years of age, with no previous history of illness except for a "sprained" back at the age of 14. She was a rather thin girl, somewhat narrow chested and with a bright red cheeks.

She was awakened on Sunday night with severe epigastric pain and vomiting. She had taken nothing likely to disagree with her on the Sunday except a single doubtful plum. She was admitted to hospital and remained under observation. During her first six days in hospital her temperature varied from normal in the morning to 99° or a little over in the evening. Her pulse on admission was 140 but fell in a day or two to round about 80. Her vomiting continued and was very persistent, and sometimes but not always bilious. She took little by the mouth and for some time received only glucose and sodium bicarbonate solution by the rectum. Yet she continued to vomit. The pain remained throughout the six days but was sometimes worse than at others. It was not relieved by heat. At the onset it had been bilious, but it soon settled in the right iliac fossa, to the right side of the umbilicus and in the left iliac fossa, but was greatest in the right iliac fossa. Tenderness and rigidity had the same distribution. It was noted at times when the patient was unawares that the rigidity was greatly diminished to gentle palpation. abdomen was in no way distended. No tumour could be felt. No abnormal reflexes were present. The chest appeared normal on examination. The urine contained neither pus, albumin nor sugar but there was a large amount of acetone present and also phosphatic crystals.

On rectal examination the uterus was not tender, but the peritoneum on each side was very much so. Solid fæces were felt. The bowels were cleared occasionally with enemata. There were no ova nor parasites seen. The tongue throughout was red and clean, but after a few days faintly suggested a strawberry tongue.

The patient's menstruation had been irregular and scanty, but the last period 14 days previous to admission had been in no way irregular. There was a leucorrhœal discharge, showing bacilli but no gram negative cocci. The blood was taken on Tuesday and on Thursday. No malaria parasites were seen. The total whites on the first occasion were 7,600 per cu. mm. and on the second occasion 5,800. The differential accounts showed nearly 50% of lymphocytes.

#### TWO CASES OF ANEURISM.

bv

## K. C. Mak.

#### Case 1.

Aneurism of the External Carotid Artery.

This patient L.H., a male of 30 (Surgical Report Number 232/30), presented himself at the Out-Patient Department on July 11th, 1930, with a swelling on the left side of the neck. The case was diagnosed as aneurism of the external carotid artery, and patient was admitted into Ward XXII, under the care of Prof. Digby. His appearance on admission is shown on Figure 1.

Patient's complaint started one and a half months ago, when he felt difficulty in turning his head. This was preceded by a short period of fever and rigor, with accompanying pain in the bones. To his surprise, a small swelling was noticed on the left side of his neck, thus accounting for the stiffness he experienced. It steadily increased in size in spite of the local application of herbs recommended by his doctor. At first, the swelling was not painful and not tender to the touch. A month later, it had reached an appreciable size, and patient began to have symptoms of dyspnæa and difficulty in speech and deglutition.

Patient was a cook by profession and had to do a moderate amount of work that required occasional muscular strain. He smoked a little but did not drink. He was exposed to V. D. some time in June 1929, but could give no history of chance or gonorrhœal discharge.

On examination, a swelling was noticed on the left side of the neck, measuring  $3\frac{1}{4}" \times 2"$ , with an oval outline not very sharply defined from the surrounding skin. It was tender and painful, but was not hot and did not pit on pressure. It was somewhat firm and was situated under cover of the sterno-mastoid muscle, being adherent to the deeper structures. The overlying skin was freely movable and did not show lesions of any kind. The cervical and axillary glands on both sides of the body were not enlarged. There was nothing abnormal in the thyroid gland.

Certain characteristics of the swelling were soon observed. (1) It was lying in the course of the external carotid artery, and had an expansile impulse synchronous with the action of the heart. (2) A thrill could be detected when the palm was placed over the swelling. (3) On applying a stethoscope a distinct systolic murmur was heard. (4) The pulsation of the left superficial temporal artery was somewhat delayed in time, and its volume diminished. The diagnosis of aneurism was therefore confirmed.



An aneurism may be defined as a localised collection of blood communicating with the lumen of an artery. Clinically, it may be divided into three types viz, the fusiform, the sacculated and the dissecting. A diagram of these is given in Figure 2.

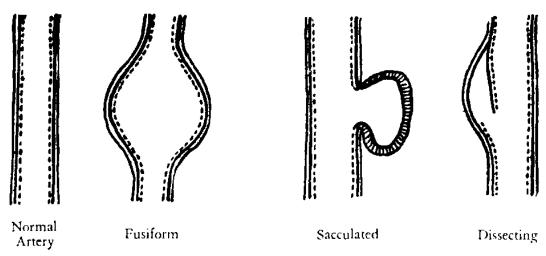


Figure 2. Showing 3 types of aneurism.

Aneurism may occur in most parts of the body, like the aorta, the popliteal, the axillary, the gluteal arteries, etc. But an aneurism of the external carotid artery is rare, there being only two such cases in the records of the Surgical Clinic. The first case was admitted some time in 1922, but the patient refused operation. It is in the present article that an attempt to describe the second case is made.

Of the causes of aneurism we may mention (1) increase of arterial pressure due to alcoholic and sexual excess, and severe muscular strain, especially type (2) Weakness of the vessel wall due to atheroma and syphilitic arteritis. Clinical findings showed that the patient had a strongly positive Wassermann Reaction. Evidently our method of cure depended not only on ligaturing an artery but also in removing the cause as far as possible. In this case the cause was probably syphilis.

It was decided to ligature the common carotid artery of the left side by the Hunter's method, and to supplement this by a modified Wardrop's operation by tying some of the branches of the external carotid artery itself. Anti-syphilitic treatment would also be carried out as a post-operative treatment.

The various methods of ligature of an artery in a case of aneurism would require so much description, that they are out of place in such a short article like this. For convenience, an illustration of these methods is given below (see figure 3).

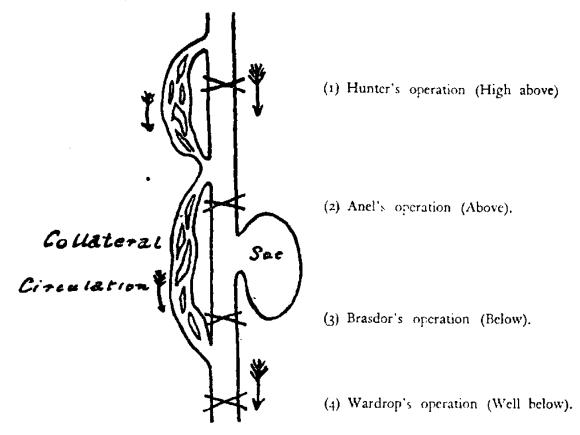
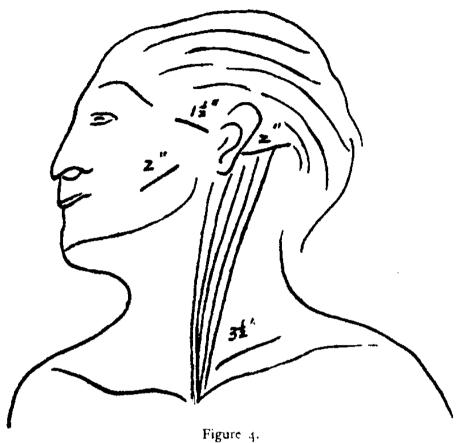


Figure 3.

The patient was operated on June 22nd, local anaesthetic (.2% Barker's solution) being used throughout the operation. A collar incision 3" long was made on the left side of the neck, starting ½" above the medial end of the clavicle, to an inch from the coracoid process, passing laterally and slightly upwards. This was to avoid opening the aneurism. The platysma muscles and the supraclavicular nerves were divided and the anterior margin of the sterno-mastoid muscle muscle exposed and retracted backwards. All bleeding points were caught and ligatured. The pulsating common carotid artery was found without trouble, and the omo-hyoid muscle exposed. The artery was thrice ligatured below the aneurismal sac and the omohyoid with a No. 3 chromic catgut.

The pulsation of the sac did not cease entirely. The second step of the operation i.e. the ligature of the branches of the external carotid artery was therefore carried out. The platysma was accordingly sewn up with plain catgut, and the skin incision closed with Michel's clips. The external maxillary, the superficial temporal, and the posterior auricular arteries were in turn exposed and ligatured, (the incisions are shown in Figure 4). The pulsation of the sac was now hardly appreciable. The skin incisions were then closed with Michel's clips and patient was carried back to the ward, after aseptic dressings had been applied.



Convalescence was rapid and uneventful. On June 27th five days after the operation, the skin incisions were found to be uniting perfectly, the clips having been removed the day before. was appreciably diminished in size and the pulsation had stopped. It was getting hard undoubtedly from the coagulation of the blood No symptoms of cerebral anaemia could be noticed. temperature was normal and the general condition of the patient satisfactory. The operation was a success.

As a post-operative treatment Mercury and Potassium Iodide were given to the patient. Two injections of N.A.B. were also carried out, beginning with .45 gm. By the middle of August the sac was already reduced to half its former size. The patient felt better in many respects, there being no difficulty in speech and deglutition and no dyspnæa. Movements of the neck were more free and not accompanied by pain. By September 5th the patient was looking practically normal, there being only a very small indefinite swelling at the neck reminiscent of the former aneurism, and several scars—the sites of former incisions. He was discharged on the same day with the instruction that he should come back to our Venereal Clinic and be under anti-syphilitic treament for two years.

The patient was seen some time in December, about three months months after the operation. He was looking normal in every respect, the sac having practically disappeared.

#### Case 2.

## Arterio-venous Aneurism

This patient S. C. was admitted into G. C. H. with a stiff right knee, following fracture of the right femur caused by a bullet. He was a man 40 years of age, looking somewhat thin and anæmic. He was a farmer by occupation, living in the district of Ching Yuen.

His chief complaint was that he was unable to walk a considerable distance without feeling exceedingly tired, and that there was limping, and weakness and of the right knee. This condition had lasted for two months, and, in spite of treatment showed no signs of improvement. According to his statement, he was shot down five months ago, by a gang of bandits who were then plundering his village. There was much bleeding from the right knee and patient was unable to walk after the accident. A Chinese doctor was consulted and the wound gradually healed, the patient being confined to bed for three months. After that, he was able to totter about slowly, but his limping and weakness were present from the very start.

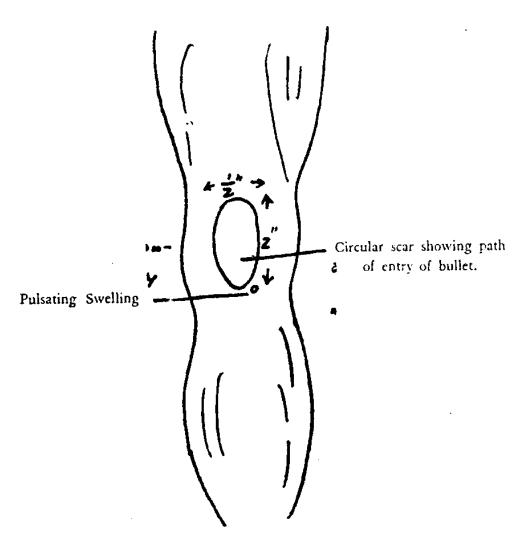


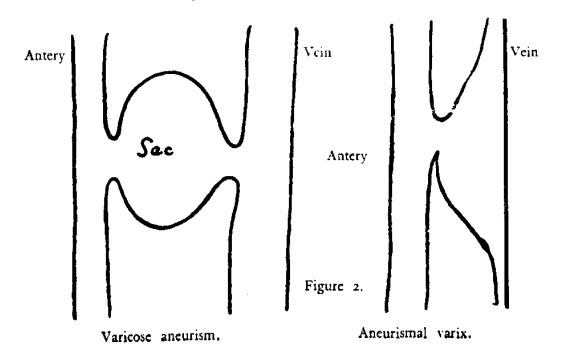
Figure 1. Back of right knee.

On examination, there was no shortening of the affected limb at all. Patient was able to extend his knee perfectly but could only flex it to an angle of 45 degrees. The patella was displaced medially for a distance of half an inch. Two circular scars were seen, one in front and one behind the knee, showing the path of the bullet. The knee jerks were present on both sides.

X-ray examination showed an imperfectly united fracture of the lower end of the femur with medial displacement of the patella. No bony or bullet fragments could be seen.

The presence of an arterio-venous aneurism—the real cause of patient's trouble and the menace to his life was not discovered until one afternoon, when Prof. Digby made a careful examination of patient's knee and noticed an expansile swelling there. It was elliptical in shape, measuring 2" × 3/4" and only slightly raised above the surface of the skin. On listening with a stethoscope a continuous systolic murmur with a marked systolic exacerbation at one point was heard. The pulse of the right tibial artery was found to be very feeble and its volume diminished. It was said that the veins of the leg were abnormally distended, in spite of the comparatively small size of the aneurism. The condition was therefore diagnosed as an arterio-venous aneurism, caused by the simultaneous injury of the popliteal artery and vein by a high velocity bullet.

An arterio-venous aneurism may be defined as a condition in which an artery communicated directly with a vein, following an inury involving both vessels at the same time. It is divided into two types, the varicose aneurism and the aneurismal varix. The former differs from the latter merely by the fact that a false sac intervenes between the two vessels, whereas in the latter there is none.



The fact that the distal pulse was weak and that the limb was feeble showed clearly that most of the arterial blood had gone into the vein directly, and was carried back to the heart, without doing its normal amount of work by nourishing the tissues that the artery supplied. As the aneurism was but small, an operation was not indicated at this time. A Hunter's operation, involving the ligature of the femoral artery in the adductor canal might, and most probably would, do more harm than good. In an ordinary case it requires six weeks for the collateral circulation to develop. If an operation be performed more of the arterial blood would go down the vein directly and danger of gangrene of the lower limb would be very great. Moreover, a Hunter's operation requires two collateral circulations and the dangers are further increased. What appears to be a more satisfactory operation would be quadruple suture of the vessel walls. An operation was not done and patient was discharged on July 26th. He was asked to come back in three months to sec if any enlargement of the aneurism had taken place, when appropriate measures towards curing the condition would be carried out.

#### Comment.

- (1) Aneurism appears to be rare in our clinic of something less than fifty beds.
- (2) Cases have occasionally been reported where aneurisms have been opened as abscesses with disastrous results.

## References.

Russell Howard, The Practice of Surgery. Thomson and Miles, Manual of Surgery.

## MEDICAL DOSES FOR SENIOR STUDENTS.

by

## K. V. Krishna, M.B., B.S.

The following is a list of doses arranged in a manner which one of our former students has found very easy to memorise. It has been suggested that this method may be of help to many of our student readers, and with this aim in view it is published, on the understanding that this Journal can take no responsibility of the accuracy of the doses or data.—Ed. Caduceus.]

EFFERVESCENT (granular).

ACIDUM DILUTUM.

ACIDOM DILUTOM.		EFFERVESCENT (granular)	•
Ac Hydrocyanic dil	2-5 m,	Caff Citrate	}
Ac Hydroiodic dil	5-10 m.	Lith Citrate	1
Ac Hýdrochlor dil	1	Sod Citro-tartrate	1 60-120 gr.
Ac Nit, dil	1	Sod Phosph (antacid)	•
Ac Nit. HCl dil		Sod Sulph	1
Ac Phosph dil	> 5-20 m.	Mag Sulph (antacid)	60-180 gr.
Ac Sulph dil	\	Sod Phosph (aperient)	}
*Ac Sulph aromat	}	Sod Sulph	150-240 gr.
Ac Hydrobrom dil	15-60 m.	Mag Sulph (cathartic)	1/2-1 OZ.
Ac Acetic dil	30-60 m.	EXTRACTS.	,-
* = not dilutum		Belladonna	)
AQUA,		Cannabis Indica	1
Aq. Laurocerasi	1/2-2 dr.	Nux Vom	1/4-1 gr.
Aq. Anithi	$\frac{1}{2}$ -2 oz.	Opii	1 /4 . 5
Aq. Anisi	∫ 72-2 0Z.	Strophanthus	ļ
*Auranti Floris	1	Euonymi	1-2 gr.
Camphoræ		Aloes	1-4 gr.
Carui		Cascara Sagrada	1 4 5
Chloroformi	1	Colocynth Co.	1
Cinnamoni	1-2 OZ,	Ergot	
Foeniculi	1	Gentian	} 2-8 gr.
_		Hyoscyami	1
Menth Pip Menth Viridis		Rhei	1
*Rosae			7
Nosac	)	EXTRACTUM LIQUIDUM	•
*=must be diluted with	h twice its bulk	Ipecac	½-2 m.
of water just before	usc.	Nus Vomica	í-3 m.
CONFECTIO.		Cinchona	5-15 m.
Piperis	)	Opii	5-30 m.
Sennae	60-120 gr.	Ergot	10-30 m.
Sulphuris	)	Cascara Sagrada	)
DECOĈTA (7 in all)	1/2-2 oz.	Glycyrrhiza	1/2-1 dr.
Buchu	)	ETHEREAL EXTRACT.	,
Ergotæ	1/2-2 02.	Felicis Liq.	45-00 th
Scoparii	) 1	INFUSUM,	45-90 m.
Aurantii	)	Digitalis	2-4 dr.
Aurantii Co.		Adren Hydrochlor	) 2-4 (1.
Calumbæ		Potassae	} 10-30 m.
	}		
Chiratæ	1	Morph Acetat	1
Cinchona Acidum	1/ * 0"	Morph Hydrochlor	10-60 m.
Gentian Co.	1/2-1 oz.	Morph Tart	) }
Quassiæ	1	Calcis Saccharatus	13-60 m.
Rhei		Ethyl Nitris	) -3 ***
Rosæ acidum		Bis, et Ammon Cit	}⁄2-2 dr.
Senna		Hydrarg Perchlor	)
Uvæ Ursi	1	Hydrogen Peroxide	2-4 dr.

Senna, S.D. ± 2 oz.		Pot Permang Ammon Acetat	2-6 dr.
INJECTIO HYPODERMICA	3 5-10 m.	Ammon Cit	2-6 dr.
Strychnine	3/4%	Mag Carb	1-2 OZ.
Apomorph	1%	Calcis N.B.—Strength of those w	I-4 OZ.
Morph	2.5%	Atropine, Morphine	Pot. Per-
Cocain	5%	mang, strychnine	
Ergotæ	33%	trini is 1 in 100.	
LAMELLÆ.	3374	MEL (HONEY).	
Atropine	1/5,000 gr.	Boracis	1 ju 10
Physostigmine	1/1,000 gr.	Oxymel Scillæ Oxymel	⅓-1 dr.
Homatropin	1/100 gr.	•	½-2 dr.
Cocaine	1/50 gr.	MISTURA.	
LIQUOR	1/ ) S	OL. Ricini	* * 0#
-	$\frac{1}{2}$ -1 m.	Sennæ Co. (Black draught)	1-2 OZ.
Atropin Sulph Trinitrini	½-1 m.	•	
Arsenicalis	) ~	OLEUM.	
Arsen Hydrochlor	2-8 m.	Fixed or expressed oils.	
Sodii Arsenatis		Crotonis	½-1 m.
Strych Hydrochlor Liq Ferri Perchlor	5-15 m.	Phosphoratum	1-5 m.
Arsen et Hydrarg Iod	5-20 m.	Chaulmoogra	5-10 m
Sodii Chlorinata	10-20 m.	(increased to 30-60 r	n).
VOLATILE, ESSENTIAL	OR	Morrhuæ	1-4 dr.
DISTILLED OILS,		Ricini	1-8 dr.
Anithi		Olivæ	4-8 dr.
Anisi	1		,
Cajaputi	•	SYRUPUS.	
Carui		Acid Hydroiodici	
Caryophylli Cinnamoni		Aromaticus Aurantii	
Coriandri		Aurantii Floris	
Eucalypti	} ½-3 m.	Calcii Lacto phosphatis	l
Juniperi Lavandulæ		Ferri Iodidi	
Limosis	1	Ferri Phosphati Ferri phos c Quin et	-, •
Menthæ	•	Strych (Easton's Syrup /	> ½-1 d.
Piperitæ	-	Limonis	
Menthæ Viridis		Pruni Virginianæ Rhoeados	l
Myristicæ	)	Rosæ	
Terebinthinæ	2-10 m.	Scillæ	
(3-4 dr. as anthelm	intic)	Tolutanus Zingiberis	!
Gaultheriæ	5-15 m.	Cascara Aromatic	
Copaiba	1	Chloral	•/ a da
Cubebæ	} 5-20 m.	Codeinæ Phos	. ⅓-2 dr.
Santali	5-30 m.	Rhei Sennæ	
PILULA.		TABELLÆ.	
Phosphori	1-4 gr.	Trinitrini	1-2 dr.
Plumbi cum Opio Saponis Co.	2-4 gr.	(each has 1/130 gr.	4-4 W.
Quinine Sulph	2-8 gr.	of trinitriglycerine)	
	-		

Aloes Aloes et Asafetida Aloes et ferri Aloes et myrrh Colocynth Co. Colocynth et Hyos (Hydrarg (blue pill)	TINCTURA (simple).  Aconiti *Cantharidini *Iodi Mitis Strophanthus Belladonna Cannabis Indica Capsici
Ipecac cum Scillæ Scillæ Co. Ferri  (substitute for Blaud's pill)  PULVIS, Antimonialis Ipecad Co. 10% opium Opii Co. in each Kino Co. (5%) Scammoniæ Co. Creta aromat Creta aromat Creta aromat cum opio Jalap Co. Rhei Co.	Cocci Colchici Datura Digitalis Ferri Perchlor Gelsemii Lob Etheris Nux Vomica Opii Podophylli Scillæ Stramonii
Glycyrrhizæ Co.  SPIRITUS.  Anisi Cajaputi Campliorae Chloroformi Cinnamoni Juniperi Lavandulæ Menth Pip Myristicæ S.D. 30-40 m. Spt. Etheris Nitrosi Ammon Aromat Ammon Fetidus S.D. Etheris  SUPPOSITORIA.  Morphisæ Acid Carbolir Belladonna Arid Tannic Iodofirm Plhmbi Co.  SYRUPUS.  60-120 gr. 60-	#= complex tincture.  #= compound tincture.  Alstoniæ    Asafetida    Aurantii    Berberidis    Buchu    Calumbæ    Cascarillæ    Chiratæ    Cinnamoni    Cinchona    Hamamelidis    Hydratis    Hyoscyami    Jalapa    Krameria    Limonis    Myrrhæ    Quassiæ    Quillariæ    Quininæ    Senegæ    Serpentariæ    Tolutana    Zingiberis
Acid Hydroiodici TINCTURA Co. (compound).  Benzoin Co. (Friar's Balsam) Camphoræ Co. (paragoric) Cardomomi Co. Gentian Co. Jalapæ Co Lavandulæ Co. Rei Co.	NOT TAKEN.  Tr. Pyrethri. Tr. Iodi Fortis  TROCHISCUS.  Morphinæ has  I/32 gr.  Morph et Morph I/32 gr.  Ipecac Ipeca //12 gr.  Krameriæ et cocain 1 gr. 1/20 gr.  Ipecac Acid Benzoici Acid Carbolic Acid Tannici

		_	
Sennæ Co.	½-1 dr.	Catechu	
TINCTURA	2-4 dr.	Ferri Reducti Kino Eucalypti	ı gr.
(complex).		Krameriæ	. 8.,
Catechu		Santonini J	
Ergot Ammoniata		( Bi Carb	2 gr.
Guaiaci Ammon		Bismuthi Co. 🖟 Mg Carb	2gr.
Kino		( Cale Car	4 gr.
Opii Ammon	> 1/2-1 dr.	Guaiaci Resinæ	3 gr.
(Scotch paragoric)		Pot Chloras	36
Pruni Virg		Sulphuris	5 gr.
Quininae Ammon		VINUM.	
Valerianae Ammon	,	*Antimoniale	
SOLIDS. Atropine Sulph		Colchici	10-30 m.
Atropine Sulph	, ,	†Ipecac )	-
Hyoscyamine Hydrobrom	-1/200-1/100 gr.	Ferri	de
Hyoscyamine Sulph J		Ferri Citratis	1-4 dr.
Phosphorus	1/100-1/25 gr.	Quininæ	1/2-1 OZ.
Homatropine Hydrobrom	1/64-1/32 gr.	* = Emetic dosc 2-4 dr. as	expect m. iii
Physostigmine Sulph	1/04 1/3- 51.	1 year child emetic m	ı. Xv
Acid Arsenious		†Emetic dose	4-6 dr.
Strychnine	- 1/64-1/16 gr.	Emetic for 1 year child	i dr.
Strych, Hydrochlor	,	Calx Sulphurata	
Sod. Arsenious	1/40-1/10 gr.	Codeina	
Hydrarg Perchlor	1/32-1/16 gr.	Codeina Phosph	. 1/4-1 gr.
Hydrarg Todide Diapomorph Hydrochlor	1/25-1/8 gr.	Ext. Opii siccum Podophyl Resina	
(Heroin Hydrochlor)	1/25-1/0 gr.		1/
Arcanii Indii		Cupri Sulph	¼ -2 gr.
Pilocarp Nitras	1/20-1/5 gr.	(Astringent)	1/ , ar
Apomorph Hydrochion	1/20-1/10 gr.	Antimony Tart (emetic)	½-1 gr.
(injection emetic)		Digitalis Folio	
Antomony Tart	1/20-1/8 gr.	Glusidum	
(Diaphoretic, expect)		(saccharin)	
Cocaine	1/20-1/2 gr.	Ipecac	1/2-2 gr.
Apomorph Hydrochlor	)	Menthol	
(by mouth expectorant)	1/10-1/4 gr.	Opium Thymol	
Cocaine Hydrochlor	, -	lodoform	⅓13 gr.
Eucaine	)	Thyroidum Siccum	1/2-4 gr.
Morph Acetas ,, Hydrochlor	1/8-1/2 gr.	Hydrarg sub chlor	½-5 gr.
,, Hydrocinor ,, Tartrate	}	Ext. Eumony	1-2 gr.
Argent Nitras	1/4-1/2 gr.	Pot permang	)
	١	*Santonin	} 1-3 gr.
Acetanilidum		Squill Zinc Sulph (Tonic)	138
(Antifebrin)		Zinc Valerian	}
S. D. 8 gr.		$* = 1$ year $\frac{1}{4} \cdot \frac{1}{2}$ gr.	•
R. D. 20 gr. Alocs	2-5 gr.	2-5 years 1-2 gr.	
Camphora		Caffeina	)
Jalapa Resin		Ferri Reductum	
Lithii Carb	1	Ferri Sulph Hydrarg c cret	} 1.5 gr.
Phenolphthalein	Ĵ	Plumbi Acetas	ł
Caff Citras	2-10 gf.	Resorcinum	•

Amman Cork	`		
Ammon Carb	}	Quinine Hydrochi	)
"Beta Naphthol		,, ,, acid	1-10 gr.
Calcii Glycerophosph		,, Sulphas	)
Pypophosphis	1 10 55	Acid Citras	j
Podophylli	3-10 gr.	Acid Salicylicas	•
Rhubarb		Acid Tartaric	
Sodii Hypophosph	}	Ammon Chloride	İ
Zinc Oxide	j	Bismuth Carb	1
*= 15 gr. every hour for	3 doses	Bismuth SalicyI	İ
for hook worms.		Bis Subnitras	
Scam Resini	4-8 gr.	Butyl Chloral Hydas	i i
Alum (emetic)	)	Chloral Hydras	
Cupri Sulph (emetic)	İ	Jalapa	├ 5-20 gr.
Acid Tanni	i	Mag Carb Levis	
Ferri et Ammon Cit	5-10 gr.	Mag Carb Pond	
Ferri et Quin Cit	۲ ) <sup>19</sup> 61 ،	Mag Levis	
Lithii Citras	•	Mag Ponderosa	
Pepsin	!	Pot. Carb	
Veronal or Barbitone	1	Pot Nitras	
Acid Acetylsalicyl	``\	Pot Todid	ļ
(aspirin)	1	Sod Todid	
Acid Boric	1	Salol	ļ
Aeid Benzoic	1	Ammon Bromide	ì
Ammon Benzoas	]	Pot Brom	i
Borax	}	Sod Brom	
Calcii Chlorid		Pot Carb	- 5-30 gr.
Calc Phosph	5-15 gr.	Sod Bicarb	) J. g.,
Fel. Bovine Purificatus		Sod Carb	ł
Guaiacol Carb	İ	Sod. Benzoas	i
Hexamine		Trional	; 10-30 gr
Phenacetine		Calcii Lactas	10-20 gr.
Phenazone (antipyrin)	1	Ferri Carb Sacch	រំ
Sodii Sulphocarbolas	)	Sodii Chloras	•
Mag Sulph, R.D.	30-90 gr.	Sodii Salicyl	- 10-30 gr.
Sodii phosph	)	Sulphonal	ļ
Sodii Sulph	-30-120 gr.	Zinc sulph (emetic)	i
Carbo Ligni	60-120 gr.	Sod Citrate	, <b>1</b>
Mag Sulph, S.D.	)	Sod Cloride	/ / 10-60 gr,
Sod et Pot Tart	120-240 gr.	Urea	10 00 д1,
(Rochelle salt)	) ' "	Ipecac (emetic)	,
	,	Thymol	15-30 gr.
			<del>}</del>
		Chloralamide Pot Sulph	- 15-45 gr.
			!
		Calcii Carb Prep	ļ
		Pot Acetat Pot Citras	15-60 gr.
		Pot Tart Acidus	
		Sulph Precip	, 
			- 20-†o gr.
		Sulph Sublim Acid Sodii Phos	- C.
		seid Sodii Phos	30-60 gr.

# AN EASY METHOD TO STUDY THE TABLE.

1. Never start with the idea of learning every preparation on the table. There are many which one may never use in one's life time, yet they are included to make the table as complete as possible.

- 2. Do not be disappointed at not finding the drugs arranged alphabetically. No doubt that system provides an easy reference, but you can never be independent of such a list. The system adopted here will prevent you from making any serious blunder if the following method is adopted strictly.
- 3. Read the several headings quickly through. The headings of official preparations are arranged alphabetically and the other solids are arranged according to doses.
- 4. Take any official preparation, say acids (dil) and see under what dose the largest number of acids are found. Note any familiar to you or any one most frequently used. Notice the names of the others in the group but do not commit them to memory.
- 5. Next look at the other groups under acids (dil) and recognise any commonly used. Notice its dose and have a mental picture.
- 6. Remember always the position of the most potent ones. Imagine the doses to be like pigeon holes and in a surprisingly short time and without effort, you will be able to place most of the drugs in their proper pigeon holes. At the first reading note only the common preparations.
- 7. Always think of the pharmacological action and therapeutic use of each drug you note. This is an additional help to fix its position.
- 8. Take one or two headings a day and after looking through the list put down the different headings of doses on a piece of paper and try to sort the different preparations under each heading. With a regular practice of not more than a few minutes a day the whole table will become familiar to you in a few weeks time.
- 9. Take any hospital stock prescriptions and write down against as many preparations as you know their minimum and maximum doses. This will make the study of doses more interesting.

## Review of Books

"Handbook of Therapeutics": David Campbell. Messrs. E. & S.

Livingstone, 16 & 17, Teviot Place, Edinburgh. Price 12/6 nett.

In this book of 411 pages, the author has presented the subject of Therapeutics in a very concise and readable form. The first chapter is on the management of the patient and is followed by one on the prescription itself. The author here stresses the importance to the student of resisting the temptation of learning a few prescriptions by heart and rather urges them to learn to make up their own prescriptions. It is for this reason perhaps that very few actual prescriptions are to be found in the book, but one would have liked to have seen more space given to incompatabilities which more than anything cause doctors to use ready made prescriptions.

The subject matter is well set out, those chapters on Modes of Administrations of Medicine, and water as a therapeutic agent giving much useful and practical information not often found in text books. The chapter on Physical Methods of Treatment after dealing with Massage gives a short and up to date account of the theory underlying X-Ray and Radium Therapy.

The book is well printed on good paper and noticably free from typographical errors and misprints, but the "o" should be inserted in angstrom on page 90 in the next edition.

## Acknowledgments

The Journal of Bone & Joint Surgery.

Bulletin of the School of Medicine-University of Maryland.

Bulletin of The New York Academy of Medicine.

Fukuoka-Ikwadaigaku-Zasshi.

Chiba-Igakukwai-Zasshi.

Japanese Journal of Experimental Medicine.

Japanese Journal of Medical Sciences.

Journal of the British Social Hygiene Council, Inc.

The Bristol Medico-Chirurgical Journal.

The Middlesex Hospital Journal.

The Birmingham Medical Review.

The Queen's Medical Magazine.

The Post Graduate Medical Journal.

University of Durham N. College of Medicine Gazette.

St. Mary's Hispital Gazette.

The Hospital.

Manchester University—Medical School Gazette.

St. Bartholomews' Hospital Journal.

The Medical Journal of Australia.

Instituto Medico Sucre, Bolivia.

The Journal of the Ceylon Branch-British Medical Association.

Bulletin of David Gregg Hospital, Canton.

Lingnan Science Journal.