scapulo-humeral type of progressive muscular dystrophy. Whether the glandular disorders bear a causal relationship to myopathy or are secondary to it, or whether both are due to a common cause, is uncertain, but the writers conclude that the combination is too frequent to be a mere coincidence.

**CONTROL OF THE PNEUMOTHORAX TREATMENT OF PULMONARY TUBERCULOSIS.**

This treatment has fallen into desuetude largely because of the difficulty of controlling and observing the effect of air introduced into the pleural cavity. Hirsch (ibid.) describes how the injection of air should not only be controlled at the time, but should also be carefully and persistently followed up either by repeated radiography or by frequent examination of the lung by means of the fluorescent screen. As regards the subsequent study for the determination of the amount of collapse, restitution, etc., the X-ray examination gives the following data: The degree of pneumothorax and its distribution, the condition of the lung as to collapse, mobility, etc.; the condition of the pleural cavity as to the presence of effusion; the displacement, if any, of the heart and other mediastinal contents; the position and movement of the diaphragm; the occurrence of subcutaneous emphysema; the extent to which absorption has taken place, a moderate amount of gas, say 600 c.c., being all absorbed in two weeks; and finally the progress of the disease.

J. D. C.
Hip-Joint.—Resection of this joint is reserved for serious cases where it is necessary to operate in order to save life endangered by septic absorption. Before proceeding to resect for infection of the hip-joint it is advisable to try the effects of drainage both from the anterior and posterior aspects of the joint. When these measures fail it is necessary to resect.

This operation was performed in six cases, and the author not only saved all his patients, but obtained better functional results than he had expected. A posterior incision was used, reaching from the posterior superior iliac spine to the great trochanter, the attachment of muscles to the latter being carefully preserved. The neck of the femur is best divided close to the trochanter, after dislocating the head of the bone backwards; the acetabulum is now exposed, and diseased or loose fragments of bone can be removed. If the tissues are offensive, pure carbolic acid is applied. The wound is partly closed after ample provision for posterior drainage.

The subsequent attitude of the limb is important; the upper end of the trochanter with its muscles should be pushed well into the acetabulum, and the limb then fixed in pronounced abduction by a plaster casing which should extend from pelvis to foot, a window being left for the changing of dressings. In five of the six cases thus operated on a moderate amount of movement was present, and the patients were able subsequently to walk comfortably, with slight abduction of the limb and with the foot everted.

Knee-Joint.—To obtain a good result in the knee, ankylosis must be osseous and the limb should be straight without much loss of substance. If too much bone has to be sacrificed on account of the disease or damage, the result may be bad. In order to maintain greater length it may be possible to use for the ankylosis one condyle alone, if the other is destroyed; in such cases special care has to be taken afterwards to prevent displacements. Excision of the knee-joint was performed in twenty-one cases. These were all cases of suppurating joints which had been drained by other surgeons without success and without being sufficiently immobilised; in most of the cases also there was a degree of septicemia. In such cases amputation of the limb or excision of the joint are the only alternatives, and the author considers that excision is the less taxing of the two.

In recent cases it is advisable to examine the joint with the X-rays in the first instance, and then, if the infection is not severe, to drain the joint low down on either side; afterwards the limb should be immobilised. When the bony lesions are marked, or if the infection is already severe, excision of the joint should be done at once. In the case of foreign bodies the procedure recommended is to open freely by a transverse incision across the patellar tendon and to leave the joint open; later, secondary suture can be done or the joint may be excised.
The author employs a horseshoe-shaped incision for excision of the knee-joint. The patella is removed, and the ends of the bone are sawn across just beyond the diseased or damaged part; silver wire is used for suturing the bones together. Pockets of pus should be carefully looked for in the supra-patellar pouch and towards the back of the joint, and separately drained.

In infected cases the wound is left open, or a single stitch may be placed to unite the cut edges at the centre of the flap. In spite of the presence of pus, union is rarely delayed beyond two months, although retraction of the flap may prevent early healing. In a series of twenty-one cases all the patients survived with a useful limb, with the exception of one patient, who died six months later from the original septicæmia.

Shoulder-Joint.—The indications for excision are necrosis or comminution of the head of the humerus, and ankylosis associated with necrosis and fistulae. The author has tried both anterior and posterior routes of access, but, unless enlargement of the original wound is sufficient, prefers the anterior incision. When the articular surface alone requires removal the results are excellent, but if the bone has to be divided below the surgical neck the results are bad. In cases of ankylosis, just sufficient bone should be removed to give free movement, and exercise must be commenced soon after the operation. Excision of the shoulder-joint was performed in fourteen patients, all of whom survived with a varying degree of movement, although the author does not differentiate between movements at the shoulder-joint and of the scapula.

Elbow-Joint.—The main difficulty in this joint is to know how much bone to remove, as, especially in young soldiers, there is a great tendency for new bone formation and ankylosis. The best level to divide the humerus, according to the author, is just below the condyles; the olecranon should always be removed, preferably on a level with the articular surface of the radius. The author prefers a posterior incision, and in the case of infected joints the wound should be left open. Seventeen patients were operated on, and all survived; in most of the cases, however, the subsequent movements at the elbow-joint were limited.

Wrist-Joint.—The author has had experience of six cases. A posterior incision was used, and one or both rows of carpal bones were excised. Excellent results as regards movement were obtained in cases of recent infection, when exercises were begun soon after the operation. When the tendons and wrist-joint were stiff, from the effects of an old-standing infection, the results of excision as regards movement were disappointing. In a chronic case of this kind a more favourable result was achieved by the grafting of a portion of fat-bearing tissue between the ends of the bones.
SAPHENO-PERITONEAL ANASTOMOSIS FOR ASCITES.

Ruotte in 1907 suggested that ascitic fluid might be drained off into the general circulation by means of a union between the saphenous vein and the peritoneal cavity. It was proposed also to do the operation on both sides at one or two sittings. About twenty of these cases have been reported, chiefly from continental clinics. No attempt in this series was made to select the cases, and as the operators were not specially skilled in blood-vessel suture the results must be considered distinctly encouraging, a marked improvement following in one-half of the cases. In some cases patients who had been bedridden were able to resume their occupations.

The type of case suitable for this operation is the ascitic patient, with portal obstruction, and who is unable to stand the constant loss of fluid necessitated by repeated tappings. As compared with the Talma-Morrison operation, the operation of sapheno-peritoneal anastomosis is much less severe, and can be done under local anaesthesia.

Bernheim (Amer. Journ. Med. Sci., June 1916) records a case which is interesting on account of the technique adopted, although, unfortunately, the patient died one week after the operation. In this particular case a Talma-Morrison operation had been previously tried unsuccessfully. The operation was rendered easier as the sac of an inguinal hernia was present on the left side.

Under local anaesthesia 6 inches of the saphena vein were exposed, and at the lower end of the wound the vein was divided and both ends tied. The peritoneal sac was next exposed by a 2-inch incision placed over the external abdominal ring. A small hole was made in the sac, and two gallons of fluid were drained off. The next step was to undermine the skin between the two incisions, and to pull upwards the lower end of the vein beneath the skin so that it lay close beside the peritoneal sac. A lateral anastomosis was then completed between the vein and the peritoneal opening, a fine straight needle and blood-vessel silk being employed. Prior to the suture it was noted that the valves were competent, as there was no bleeding. At the same time the patency of the vein was demonstrated by injecting upwards a small amount of saline solution. A lateral anastomosis was preferred, as the junction could thus be more easily made, and also the opening could be made larger than with an end-to-end union.

The operation was confined to one side, as the other leg was oedematous. The patient did well after the operation, in spite of a slight leakage of ascitic fluid, but died about a week later, with symptoms suggestive of morphia poisoning. There was nothing in the clinical features to suggest that the operation had been the cause of death.
A Review of Over Fourteen Thousand Surgical Anaesthesias.

Alice Magaw (Western Medical News, May 1916), anæsthetist to the Mayo Clinic, gives her experience in general anaesthesia. At the St. Mary's Hospital in Rochester preference has always been given to open ether. In 1905, out of 3080 anaesthetics ether was administered in 2847. In 14,380 anaesthetics the author has had no death directly due to the anaesthetic. The preference for ether as the anaesthetic has become greater every year, and the open method of administration is the method of choice. Other methods of inducing, or as preliminaries to, general anaesthesia have been thoroughly tried, such as nitrous oxide gas or injection of scopolamine and morphia, but these modifications have proved less satisfactory on the whole than the drop method, which has now been used for ten years. In goitre cases $\frac{1}{2}$th gr. of morphia and $1\frac{1}{30}$th gr. of atropin are given half an hour before the operation.

The author employs two 4-ounce ether cans, one with a large dropper to be used till the patient is under, and the other with a small dropper to be employed during the course of the operation. An ordinary cork is fitted into the can with a groove cut on either side, one groove being filled with absorbent cotton-wool, which should project for an inch beyond the cork.

An improved Esmarch's inhaler is used with two thicknesses of stockinet. The ether is first administered slowly in drops, as in chloroform anaesthesia, until the face is flushed, and then a few layers of gauze are added and the ether given a trifle faster until the patient is under; thereafter return is made to the same covering as at first, and a regular drop is continued during the operation. A much deeper narcosis is needed to start an operation than during its progress. Only the inexperienced take the pulse or touch the cornea during an operation when giving ether.

Suggestion is a great aid in producing a comfortable narcosis. The anæsthetist must inspire confidence and study the temperament in each case, deciding which mode of suggestion will be most efficacious—the abrupt, crude, and very firm, or the reasonable, sensible, and natural. In most cases the latter mode is by far the best. The patient should be "talked to sleep" with the addition of as little ether as possible, but the patient himself should not be allowed to talk, as by so doing he is more apt to become boisterous; further, the patient should never be told to breathe deeply, as this induces a feeling of suffocation and a tendency to struggling. Patients can be brought under ether in this way in from three to five minutes, and they do better if the operation is started at once. There is no single infallible sign of complete anaesthesia. If the jaw is relaxed and in place, respiration deep and regular, colour normal, quality of pulse good, then there need be no fear about the rate of the pulse or the pupils.
During thirteen years at St. Mary's Hospital all patients have been anaesthetised on the table in the operating-room, and preparation of the patient has been carried out at the same time. The simultaneous preparation of the patient is one of the important factors in inducing anaesthesia, for it diverts the patient's attention and less anaesthetic is needed.

The position of the patient should be adjusted during the preparation. It is an advantage, for instance, to place the patient in the Trendelenenburg position before narcosis is completed, as the deep respiration helps to empty the pelvis, and the intestines can be more easily packed off when the abdomen is opened.

J. M. G.

OBSTETRICS AND GYNECOLOGY.

UNDER THE CHARGE OF

A. H. F. BARBOUR, M.D., AND J. W. BALLANTYNE, M.D.

CLINICAL SIGNIFICANCE OF LUTEIN CYSTS OF THE OVARIIES.

Professor Paul Bar has an article (Arch. mens. d'obsté. et de gynéc., ann. v. pp. 49-58, January-March 1916) on the clinical significance of lutein cysts of the ovaries developing after the removal of a hydatidiform mole of the uterus, and Professor Bar never writes on any subject connected with either the physiology or the pathology of pregnancy without aiding in the elucidation of some of the many problems with which these subjects teem. It is so in the present instance, although as a matter of fact the particular problem dealt with is one of the most obscure. There is, indeed, so much that is obscure about hydatidiform moles, about lutein cysts of the ovaries, and about their association together, as to justify the use of the word mysterious; and if one adds to these the problem of the chorioepithelioma and the origin of malignancy the mystery becomes very dark. The clearing up of the mystery will yet be accomplished, and in the meantime every advance in that direction deserves to be chronicled.

Is there more than an accidental relationship between the mole and the ovarian luteinic cysts? There are not yet great numbers of published cases, but Bar thinks that the fact that 59 per cent. of lutein cysts accompany hydatidiform moles negatives the idea of fortuitous coincidence, and it is difficult to avoid such a conclusion. But what is the nature of the bond or connecting link? Professor Bar turns first to physiology and states the aphorism (it may almost be called):