treatment for hypertrophied prostate—at least in all such cases where the enlarged middle lobe causes the trouble, as in the majority of cases.

Extirpation of the entire gland he believes to be unjustifiable; the prostatic capsule should not even be opened on account of the venous plexus of the prostate, injury to which is apt to cause serious complications.

To facilitate the operation the author has constructed a special pair of forceps, somewhat resembling strong polypus-forceps with a sharpened edge. There is only a slight hemorrhage. The drainage of the bladder acts beneficially upon the cystitis generally present in these cases.

Comparison with other methods, such as injections of ergot, electrolysis, and galvano-cautery after Bottini are made in favor of the author's method.

Special attention is given to the bodily condition and habitus of the class of patients generally suffering from hypertrophied prostate.—*Deutsch. Zeitschr. f. Chir.*, Bd. 25, Hft. 1 and 2, December, 1886.

W. W. VAN ARSDALE (New York).

ABSCESSSES, TUMORS.

I. Inflammation of the Cavum Retzii or Prevesical Space. By Dr. O. PINNER (Frankfort on the Main). The writer publishes a case illustrating the condition in question, gives a detailed anatomical description of the parts referred to, with an account of his own dissections, and finally adds some general remarks suggested by his case and by one quoted from Gruber.

A man. æt. 45, who had suffered from muscular rheumatism, suddenly fell sick with pains in the lower region of the abdomen, which increased in intensity during the following days. Palpation could not be endured. No fever. Urine normal. After thirteen days infiltration of the region above the symphysis appeared, with elevations of temperature to 38.6° C. Fluctuation appeared. Aspiration revealed pus. The abscess subsequently reached considerable dimensions, measuring 27 cm. across. Incision vented fetid pus, and laid bare the

margin of the rectus muscle. The abscess cavity led underneath the rectus to the symphysis and under the rectus of the other side. Burrowing had also occurred in the cellular tissue beneath the skin towards the scrotum. Irrigation and drainage. In the course of recovery two further abscesses appeared situated in the deltoid muscles and between the tibia and fibula respectively. The cicatrix from the abdominal incision was finally only a few centimetres removed from the symphysis. Total time of illness five months. After comparing the anatomical descriptions of the tissue-spaces situated in front of the bladder given by different authors, the writer details his own methods of investigation. In order to study the prevesical space, he made an incision in the middle line above the symphysis, inserted a drainage tube, and injected soft plaster-of-Paris under considerable pressure.

The submuscular space proved difficult of demonstration, owing to the readiness with which the injected matter found its way into the prevesical space. It could, however, be accomplished by inserting the canula through the rectus into the space in question at a point situated above the semi-circular lines of Douglas.

The author is of opinion that these two distinct spaces should not be confounded, but differentiated clinically as well as anatomically.

The muscular space is bounded anteriorly by the posterior aspect of the rectus muscles, centrally by the linea alba, laterally by the external margin of the sheath of the rectus, below by the symphysis, and posteriorly by the transverse fascia of Cooper. The two submuscular spaces are but incompletely separated from each other by the connective tissue representing the linea alba, and therefore inter-communicate.

The prevesical space is bounded anteriorly by the os pubis and its branches, above by the transverse fascia, posteriorly by the fascia propria and the bladder, below by the pelvic fascia. The designation *Cavum Retzii* should be used only for the prevesical space.

In pathological conditions these two spaces are even more readily distinguished, in consequence of the thickening of the dividing tissues.

Phlegmons of the prevesical space are more frequently due to the

extension of inflammatory processes of the bladder, the rectum, the prostate, the broad ligaments, the iliac fossa, or the pubic bone. Phlegmons of the submuscular space, on the other hand, are more frequently due to other causes, such as traumatisms; or they may occur after fevers and diseases attacking the entire system; in which case there is some lesion of the muscles; or they may occur spontaneously without a known cause.

Phlegmons of both spaces present only general symptoms in the first stages; later on the symptoms of tumor in the hypogastric region appear. The symptoms belonging to both affections in the first stages are pain in the lower portion of the abdomen, pain on motion, great sensitiveness to pressure on the abdomen, so that a flexed posture of the knees and hips is sustained and no covering can be borne.

Local swelling may be apparent after a few days or not till after some weeks, and in some very acute cases the disease may set in with rigors and high fever.

The shape, extent and form of the disease varies, however, in the two affections.

Inflammation of the submuscular space is characterized by the shape of the tumor resembling the sheath of the rectus; and may be bilateral from the start or attack both sides consecutively. The apex of the tumor points to the symphysis; it is attached to the muscle and may be moved laterally with the integument. The space between the bladder and the symphysis is free, at least at first.

Tumor of the prevesical space, on the other hand, resembles the well-filled bladder. The apex points upwards. Palpation proves the tumor to originate from the pelvis. The recti can be brought into prominence above the tumor. Rectal examination enables the tumor to be felt. Bladder symptoms may also be present. Either affection may end in resorption or suppuration.

If incision is not made, the submuscular abscess generally perforates through the skin; or it may perforate into the abdomen. After recovery a hard mass may long be felt in connection with the rectus.

The prevesical abscess may perforate through the skin, into the abdominal cavity, or into the rectum, the bladder, the vagina, the ure-

thra, or through the incisura ischiadica, into the scrotum, or along the thigh.

Differential diagnosis from peritonitis, neuralgia, intestinal catarrh, must be made in the first stages. Later on affections of the bladder, tumors, intraperitoneal localized exudations, may come in question.

Exploration with the aspirating needle is recommended, and early incision to prevent perforation into the abdomen. Drainage may be assisted by a prone position—*Deutsch. Zeitschr. f. Chir.*, Vol. 23, Hft. 5 and 6, June, 1886.

W. W. VAN ARSDALE (New York).

BONES, JOINTS, ORTHOPÆDIC.

I. Fracture of Thigh, Reabsorption of Callus on the Seventieth Day during an Attack of Erysipelas. Dr. FERRET (Paris). A youth, æt. 17, with a good previous history sustained a fracture of the middle third of the thigh during the first week of February. Put up and extended with Tillaux's apparatus it got well without any shortening. When on April 6 consolidation was perfect and the patient was getting about, an attack of erysipelas came on, starting from a spot chafed by the diachylon plaster. It was very severe, and on the sixth day the limb was found bent almost to an angle of forty degrees at the seat of fracture. The callus had all disappeared and there was complete mobility in every direction. The erysipelas was well on April 18, but there was deep pain in the situation of the fracture and to this was added, on the 22nd, both swelling and fluctuation. One hundred grammes of pus were let out by the aspirator. As a fresh accumulation took place, a large opening was made into an abscess cavity where the two ends of bone were found close together, the upper one completely denuded to the extent of 4 cm. Resection was performed, iodoform applied and the limb placed again in the apparatus. At the end of May the wound was healed, and the consolidation was once more perfect.

This sort of case is very rare. The more frequent ones are those in which the callus slowly softens and disappears on account of a generally bad state of health. Out of three cases which Dr. Ferret has