TRANSACTIONS
OF THE
PHILADELPHIA ACADEMY OF SURGERY

Stated Meeting Held March 6, 1922

The President, Dr. John H. Jopson, in the Chair

MALIGNANCY OF THE UNDESCENDED TESTIS

Dr. Benjamin Lipshutz read a paper with the above title, for which see page 260.

GASTROSTOMY

Dr. Thomas A. Shallow read a paper with the above title.

ACTINOMYCOSIS

Dr. Penn G. Skillern, Jr., presented a man, twenty-eight years of age, who was first seen November 30, 1921, with an inflammatory induration of the floor of the mouth, both sides, bounded by the horseshoe curve of the mandible and pointing in the midline midway between the chin and the hyoid bone. At this spot the abscess was incised, liberating a quantity of foul, creamy pus with the stink of a colon bacillus infection.

At first sight this infection suggested Ludwig's angina, but the tongue was not pushed up or fixed. Skiagrams of the teeth for root abscesses and for salivary calculus were negative. A month later—December 30th—the abscess had cleared up and the wound was healed; there remained, however, a slight induration of the tissues around the incision such as frequently follows incision of an abscess of this type. The patient was discharged, cured of the abscess.

About two months later—on February 20, 1922—the patient reported again with an induration the size of a walnut in the submental region, pointing at the site of the former incision, midway between the chin and hyoid bone. Again the mass was incised, but only a few drops of thin, whitish pus escaped, and the greater part of the indurated area remained. Inspection of two of the three drops of pus showed in each a few granules the size and shape of the head of a pin and grayish-yellow in color. The patient was now questioned relative to having worked around a barn or stable. He stated that in July, 1921, he decided to fix up an old stable for a studio. He therefore spent the first two weeks of that month cleaning manure from the ground floor of a stable that had been used for fifteen years, and washing down its walls. The manure was caked to a depth of from six inches to a foot, and it took him two days to remove it. Toward the end of the next month—August—he broke off the crown of a front tooth and went to the dentist, September 1st. About two months after cleaning the

stable he noticed that when lifting his chin up to shave he experienced a "drawing" sensation in the submental region. This condition remained stationary for two weeks when the patient "caught cold," whereupon the submental region began to swell until it became very hard, but it did not pain until a week later.

Having obtained in the reconstruction of the history data so suggestive of infection with *Actinomyces bovis,* the reporter sent the few drops of pus to a laboratory. Examination of a granule crushed between slides revealed the presence of a ray-fungus.

The patient was immediately started upon ascending doses of a saturated solution of sodium iodide, and now, after two weeks of this treatment, the swelling has diminished to the size of a pea, and the incision is closed.

With regard to the treatment of actinomycosis, Doctor Skillern said that the potassium iodide does not act on the organism itself, but seems to enable the tissues to overcome the disease. It is useless in small doses. Ochsner recommends the treatment of Bollinger, who taught that if we treat cases of actinomycosis exactly as the disease is treated in cattle, the patients will recover just as regularly. Ninety grains of iodide are given in one-half pint of milk, followed by one pint of hot water, every eight hours, for four days; omit for one week, then repeat until there is no sign of the disease for at least a month. Repeat the course once or twice a month after the patient has apparently completely recovered. Fördel, in 1908, showed at the German Surgical Congress six cases of actinomycosis cured by cacodylate of sodium internally, which he believes preferable to the iodides. Kolmer, in Keen's Surgery, states that if the iodides fail, the surgeon may try an autogenous vaccine, and cites Malcolm's case of two years' duration, in which, iodide being swallowed month after month and pound after pound, two sinuses and a nodule gradually healed under weekly subcutaneous injection of a vaccine containing 4,000,000 to 5,000,000 actino-fragments. Collie reports a case of actinomycosis successfully treated by a vaccine, which was prepared by Sir Almroth Wright. In this case, too, the iodide had been given freely, but wholly without effect. He was first given a stock, later an autogenous vaccine, and about seventeen inoculations were required to effect cure.

Dr. Robert H. Ivy said that these cases are rather rare, particularly in this country, and that he was surprised that Doctor Skillern's case had healed so quickly under the potassium iodide treatment; thinks this was because of its superficial nature. The most recent literature on the subject tends to the belief that potassium iodide has been overrated in the past, and inclined to a greater dependence on free drainage, X-rays and radium, and possibly vaccine therapy. A recent paper by Colebrook in the *London Lancet* divides the organisms into four types which have cultural differences, but which give rise to the same clinical picture. Doctor Ivy said that last year he had a case of actinomycosis involving the parotid region which was more resistant to any form of treatment than the case reported by Doctor Skillern.

COMPOUND LUXATION OF ELBOW WITH RUPTURE OF BRACHIAL VESSELS

Dr. Edward B. Hodge presented a woman aged fifty-five years, who was admitted to the Presbyterian Hospital, January 11, 1921. While standing on a chair, her heel had gone through, and she fell on left arm, tearing it across the bend of the elbow.

On admission to hospital there was found a three-inch tear which ran from the middle of the bend of elbow inward and slightly downward, with condyles of humerus protruding, brachial vessels torn, but not bleeding, brachialis and part of biceps torn and median nerve intact across wound. Debridement of wound with ligation of vessels. Section of muscle removed, sterile on culture. Wound swabbed with Dichloramine-T, capsule and muscles sutured with chromic gut, skin with silkworm gut, and rubber tissue drain down to muscles. Dressed in Jones' position.

There was good recovery with reaction to 101°, slight drainage and no local reaction. Drain removed in forty-eight hours. Slight motion of elbow begun on sixth day. Hand remained warm and of good color, but radial not palpable until thirteenth day. Temperature 100°+ on third day and was never quite normal until just before discharge.

On eleventh day, cramp and pain in right calf with general swelling and tenderness, but no enlargement of saphenous or tenderness in its course. L. 20,000 on twentieth day, leg less swollen and no pain. Elbow healed and quiet and motion from acute flexion to 90°. Temperature, 100°–102°, now falling.

On the twenty-sixth day severe cramp-like pain in left calf, swelling and moderate tenderness with some fluid in knee-joint, temperature up 1°, pulse soft and rapid. Hæmoglobin, 40 per cent.; red blood-cells, 3,250,000; leucocytes, 46,800. No chest signs. Patient gravely ill for a few days. The œdema extended up on to buttock and loin. Then slow, but steady, improvement up until discharge. Out of bed end of eighth week and walking a while later. Elastic support controlled swelling in legs well.

Three months after accident she is in greatly improved general condition, though still anæmic. Arm shows motion from acute flexion to 160°.

The rarity of the original condition alone would warrant report. In spite of the sterile culture from the muscle and clean wound healing, there was probably present slight infection in the wound. In the presence of old cardiac lesion and anæmia, this was the probable cause of the phlebitis.

BACKWARD LUXATION OF FOOT ON LEG WITH FRACTURE OF FIBULA

Doctor Hodge presented a woman, forty years of age, who twisted her left ankle. In trying to recover her balance, something happened to her right ankle and she fell to the sidewalk with the right foot in the street. Probably the heel of the shoe caught on the edge of the

curb putting the foot in strong plantar flexion and her weight in this position caused the injury.

When seen fifteen minutes afterward, backward luxation of the foot on the leg was evident. The outline of the articular surface of the tibia could be seen as well as felt, extending nearly an inch over the posterior projection of the heel.

Under gas, reduction was effected less than an hour after the injury. After flexing the leg on thigh to relax the calf muscles, plantar and dorsal flexion of the foot with extension brought easy reduction.

X-ray showed a fracture of the fibula three inches above the lower end, but no other gross lesion. The patient was treated in her home by the use of a fracture box for a few days until the swelling had subsided. Then a split cast was applied. This was removed daily for massage and active motion. Weight-bearing was not allowed for six full weeks as patient was uncertain on crutches and left ankle had been weak for years. Baking and massage were used after fifth week. By these means, swelling and stiffness were greatly reduced and full motion early obtained without pain. After eight weeks, the patient passed from observation, walking well without support and having full painless ankle motion.

Dislocation at the ankle is quite unusual—extremely so without accompanying fracture. This is the only case in the writer's experience. Reduction may be as difficult as it was easy in this case—incision is not infrequently required and difficulty in reduction increases rapidly with lapse of time.

Points emphasized here are rarity of injury and excellent function resulting from early reduction and early active motion.

BILATERAL CONGENITAL ABSENCE OF PATELLA

Dr. Joseph M. Spellisy exhibited a photograph of bilateral congenital absence of patellæ in a patient about seventy-five or eighty years of age who was in the service of Dr. Wm. Barton Hopkins some fifteen years ago. This man also had a varus deformity of both feet and could not walk well, but he could flex and extend his knees to normal extent despite the absence of knee caps. Doctor Spellisy also presented röntgenograms of another instance of congenital absence of both patellæ which he had observed in a little boy in his service at St. Joseph's Hospital. He regretted that the child's residence, at a distance from Philadlephia, made it impossible to present him. The films exhibited showed not only the absence of patellæ, but other congenital abnormalities, distortions of fingers and toes and of both elbows. The latter enjoyed but imperfect extension.

Dr. A. P. C. Ashhurst said he had seen many years ago, one case of congenital absence of the patella on Dr. G. G. Davis' service at the Orthopædic Hospital, which was associated with hyperextension of the knee; he had also seen a number of other cases in which it was thought for a long time there was no patella but in which it was found that a patella subsequently developed.

NON-ROTATION OF COLON

DR. E. J. KLOPP presented a man, aged twenty-nine years, who, having had no serious illness, was attacked September 28, 1921, at 6 P.M. by colicky pain in the region of the umbilicus, which continued more or less constant, until at the end of two hours it disappeared. He was seen by Doctor DaCosta, who made a diagnosis of appendicitis. He was admitted to the Jefferson Hospital, where the reporter operated upon him. No rigidity, pain radiated downwards and upwards, from umbilicus. Temperature, 98°; pulse, 80; respiration, 24; leucocytes, 15,500. Gridiron incision. Upon careful examination, they failed to find the appendix or the cæcum. Incision was enlarged sufficiently to introduce the hand, and palpate the large intestine, which was to the left of the median line and adherent. They were unable to pull it toward the right side. The small bowel which was found in the right side of the abdomen was rather large. In passing the hand toward the upper right quadrant of the abdomen some abnormality was felt. Because of the fact that some of the pain radiated toward the liver an upper right rectus incision was made, hoping to find the cæcum, but did not find it in this location. They saw the duodenum which was not covered by the colon or the transverse mesocolon. The patient took anæsthesia badly, so that no further exploring was done. The gall-bladder and stomach were negative. Both wounds were closed. Nothing removed. Day following operation temperature was $102^3/_5$; pulse, 120; respiration, 30. Temperature became normal on sixth day. He was discharged from the hospital, October 20, 1921.

Cases of non-descent of the cæcum are not infrequent. The appendix may be adherent to the gall-bladder, stomach or duodenum. Occasionally the appendix is to the left and above the umbilicus. Delatour reported such a case in the ANNALS OF SURGERY, January, 1915. The tip of the appendix was adherent to the left kidney. He reported one case of incomplete descent, and one case of non-rotation with the appendix in the left iliac fossa. In the same number of the ANNALS OF SURGERY, Downes reported a case of gastric ulcer with non-rotation of the colon. He performed an anterior gastro-enterostomy with an eight-inch loop with good results.

C. H. Mayo, *Med. Rec.*, March 2, 1912, reported in detail five cases of left-sided appendicitis operated upon in St. Mary's Hospital, three for appendicitis, two for acute abscess. One case diagnosed before operation—from physical signs and X-ray. He states that up to that time approximately 300 cases of complete transposition of the abdominal viscera had been reported in literature. He says that non-rotation of the colon should be considered probable when no colon is found on the right side, and positive if the duodenum is movable—it has a mesentery when it merges directly into the jejunum, and when it is uncovered by transverse colon or its mesentery.

Röntgenologic Report.—Patient was referred to the X-ray service of Jefferson Hospital, with the request to locate the appendix if possible. He was given the usual test meal, and in six hours the barium completely emptied through the ileum and small intestine, unable to locate the cæcum. The patient returned after a few days with the intestinal tract empty of the barium. He was given another barium meal which showed the stomach practically normal, tendency to be over rather to the left and high, with the pylorus patulous, and the duodenum patulous with no tendency to abnormality. Barium meals passed down from the stomach into the small intestine, entering the colon somewhere in the pelvis in the mid-line. A colon injection showed that the barium meal took the course shown on the plate. The previous operation made it difficult for them to palpate, but they determined that the colon was on the left side and the small intestine on the right side. There was complete non-rotation of the colon.

In reviewing the literature it appears that the majority of cases are not a complete but a partial non-rotation of the colon with incomplete descent. Often there is a high cæcum with a retrocæcal appendix.

Doctor Ashhurst said that several years ago he saw an operation done for chronic appendicitis in which the appendix could not be found. Subsequently, Doctor Ashhurst operated on the same patient for intestinal obstruction and found non-rotation of the ascending colon. The patient died. In the last volume (volume v) of the Medical and Surgical Reports of the Episcopal Hospital, Doctor Voglein reported a patient of Doctor Deaver's with the same condition who was completely relieved of his obstructive symptoms by a cæco-sigmoidostomy.