

EPITOME OF CURRENT MEDICAL LITERATURE.

MEDICINE.

104. Lumbar Puncture and Meningitis.

REGINALD WEBSTER (*Med. Journ. of Australia*, November 27th, 1920) records a series of experimental investigations into the part played by lumbar puncture in precipitating meningitis in animals rendered artificially septicaemic, and makes a plea for the conservative use of diagnostic lumbar puncture. As a result of his researches, he feels warranted in urging that the lumbar puncture needle should not be employed, except in the presence of definite clinical signs of meningitis, and in deprecating its use as a possible royal road to the diagnosis of an obscure condition. Lumbar puncture in the presence of a septicaemia may operate in two ways to promote infection of the meninges: (1) by impairing the integrity of the choroid plexus and meningeal lymphatics; (2) by extravasation of blood, which itself may be infective, within the cerebro-spinal space. Haemorrhage within the dura mater, apart from infectivity, aggravates the effect of withdrawal of cerebro-spinal fluid, for it is the equivalent of the "bland irritant" introduced into the spinal canal in the work of the different experimenters quoted. It is not suggested that spinal puncture, in the presence of a septicaemia, invariably leads to meningitis; but evidence is adduced to show that when conditions as regards severity of the septicaemia and pathogenicity of the causal organism for the meninges are favourable, there is a definite risk attached to the operation of lumbar puncture. As regards pneumonia in children, the fact that the clinician maintains a constant look-out for complications such as meningitis and arthritis, is a tacit recognition of the haemic nature of the pneumococcus infection; unless the bacteriological condition of the blood has been carefully investigated, a measure possible as a routine only in hospital practice, lumbar puncture should not be lightly undertaken. As long as the results of pneumococcal meningitis remain as disappointing as they are at present, the withdrawal of a cloudy fluid does nothing more than establish the diagnosis; there would be no objection whatever to the puncture if a purulent fluid could always be foretold, but how rarely does it materialize even when confidently anticipated? Once the decision to perform lumbar puncture has been reached, it would seem wise, unless the fluid is definitely turbid, to take off just sufficient for laboratory examination.

105. Pathogeny and Treatment of Diabetes Insipidus.

NASSO (*La Pediatria*, September 1st, 1920) records the case of a girl of 8 years who developed, at 4 years, symptoms of diabetes insipidus, the average amount of water swallowed being from 11 to 14 litres and the average amount of urine passed from 12 to 15 litres in the twenty-four hours. Intramuscular injection of pituitary extract was followed by rapid improvement, the amount of urine falling to 4 to 5 litres a day and the amount of water taken to 3 to 4 litres. Nasso concludes that the pathogenesis of diabetes insipidus is connected with pituitary insufficiency, and that the treatment should be based on a proper use of pituitary extract.

106. Purpura in Cerebro-spinal Meningitis.

ACCORDING to BONNAMOUR (*Lyon Méd.*, December 13th, 1920), who records an illustrative case, contrary to what occurred in the United States during the epidemics of 1805-1811, in Ireland in 1866-67, and in Germany from 1886-87, purpura until recently has been very rarely observed in cerebro-spinal meningitis in France, where it was noticed for the first time by Rist and Paris in 1902. Since then, and particularly since 1909, its frequency has decidedly increased, so that Netter found it in 13 per cent. of the cases of cerebro-spinal meningitis in 1913 and in 20 per cent. in 1917. It was first observed at Lyons during the war, especially among the soldiers, while it remained rare among the civilian population. Purpura may appear at any stage of cerebro-spinal meningitis. It most frequently appears between the second and fifth day of the disease, but it may precede the meningitis, or, as in Bonnamour's cases, be almost the only symptom of cerebro-spinal meningitis which was not discovered till the autopsy. Lastly, though more rarely, purpura may occur by itself without any meningeal localization in association with septicaemic phenomena such as arthritis, fever, and

general disturbances. Lumbar puncture in such cases always shows a clear, sterile fluid, whereas blood cultures and examination of the petechiae yield meningococci. In a case of severe purpura lumbar puncture should always be performed and a culture made from the serum of the skin lesions, so that, if necessary, intrathecal combined with intravenous or intramuscular sero-therapy may be employed.

107. The Diphtheritic Heart and its Treatment.

AASER (*Tidsskrift for Den Norske Laegeforening*, September 15th and October 1st, 1920) has studied the cardiac complications of diphtheria, and compared the mortality of this disease, as treated at Ullevaal Hospital, at different periods. He classifies his material in four groups, according to the extent and severity of the disease, and he finds that in the pre-serum days—that is, between 1890 and 1894—the mortality was as high in the second group of cases as it was in the fourth group—that is, the most serious cases—treated with serum in the period 1915-1918. But though the increasing dosage of serum undoubtedly reduced the mortality, it did not banish the cardiac complications of diphtheria. Indeed, these would appear to be more frequent, and the author suggests that this fact may be correlated with the presence of 0.5 per cent. of carbolic acid in the serum used in Norway. Though some of it may be deposited as "carbolic acid albumin" and is filtered off, enough may be left to cause serious injury. In addition to prophylactic measures, such as absolute rest, morphine is an invaluable remedy for children as well as adults, reducing as it does restlessness and insomnia. Adrenalin given subcutaneously is remarkably effective in some cases, but useless in others. An ice-bag placed over the heart sometimes has a definitely stimulating effect on the heart and also exerts a restful influence, particularly in children. It is also necessary to keep the organism adequately flushed with fluids.

108. Familial Spastic Paraplegia.

DE STEFANO (*La Pediatria*, October 1st, 1920) gives an account of two families in one of which four members and in the other two were affected by spastic paraplegia. In the five cases which came under the author's observation congenital syphilis was present, and in three there was consanguinity of the parents. From observation of the cerebro-spinal fluid in his cases de Stefano concludes that the condition is due to a direct action of the syphilitic virus on the meninges, followed by more or less extensive degeneration of the nervous system. Familial spastic paraplegia, which was first described Strümpell in 1880, is characterized by the association of the familial character of the disease with spastic paralysis, which is almost constantly accompanied by disturbance of the intelligence and often of speech. It is to be distinguished from the spastic tabes dorsalis of Charcot or spastic contracture of the lower limbs in the adult due to primary sclerosis of the pyramidal tracts.

109. Nitro-benzol Poisoning Treated by Blood Transfusion.

HINDSE-NIELSEN (*Ugeskrift for Laeger*, September 9th, 1920) considers that the treatment of poisoning with nitro-benzol (mono-nitro-benzol, nitro-benzine, oil of Mirbane, $C_6H_5NO_2$) should include transfusion of blood when the symptoms are severe and a fatal issue seems probable. In this connexion he records the case of a servant girl, aged 19, who took a tablespoonful of nitro-benzol in the afternoon, vomited soon afterwards, and was admitted to hospital the same evening in a state of delirium and unconsciousness. She was extremely cyanosed, the mucous membranes being of a dark-blue colour. There was a bluish froth about her lips, and her breath smelt of oil of bitter almonds. Her stomach was repeatedly washed out, and oxygen was administered, but her condition remained critical. Accordingly, 600 c.cm. of her blood were withdrawn, and an intravenous injection of 1 litre of citrated blood (0.4 per cent. sodium citrate solution) obtained from a nurse was given. During this procedure the colour of the patient's skin changed to a rosy tinge. Ultimately complete recovery was effected without signs of embolism or thrombosis. With reference to blood transfusion, the author emphasizes the advantages of collecting the blood from the donor in ten separate vessels instead of in one large vessel. In the latter case coagulation in part of the

blood is apt to extend to the whole quantity. But when several vessels are used, coagulation in one does not spoil the results for the remainder; in the author's case coagulation did occur in one, but not in the remaining nine vessels.

110. Smoking and Mental Activity.

BAUMBERGER and MARTIN (*Journ. of Industrial Hygiene*, October, 1920) give a first report concerning the industrial efficiency of persons using tobacco in different amounts. The output curves of a small group of Morse code telegraphic operators were examined; the occupation of these workers demanded concentrated attention and delicate neuro-muscular co-ordination. It was found that the heavy smokers of the group showed a higher output rate at the beginning of the day than the light smokers, but that their rate fell off more markedly in the later hours, and that their production for the day was definitely less than that of the light smokers. The heavy smokers showed also less ability than the light smokers to respond to increasing pressure of work in the late hours of the day by handling their full share of the work presented to them. These results are in accord with the suggestion advanced by other investigators, that strenuous mental work is likely to be affected adversely by heavy smoking.

111. Chrysarobin and Psoriasis.

WARD (*British Journ. of Dermatology*, October, 1920) relates the case of a man, aged 38, who had suffered intermittently from psoriasis since he was 17, in whom a fresh outbreak of psoriasis papules developed as the result of using a chrysarobin ointment twice as strong as usual—10 grains instead of 5 grains. The fresh lesions were successfully treated by application of the milder ointment.

112. Malaria caused by Injection of Human Serum.

VAN DIJK (*Nederl. Tijdschr. v. Geneesk.*, September 25th, 1920) records the case of a nursing sister, suffering from a severe attack of influenza, whom he transfused with the blood of another sister convalescent from the disease. Three weeks later the first patient developed a typical attack of tertian malaria. She had never had a previous attack, and there was no malaria in Rotterdam at the time. It then transpired that the donor had suffered from malaria, though her last attack had occurred seven months previously; malarial parasites were found in her blood.

SURGERY.

113. Detachment Fractures following Strain.

USLAND (*Medicinsk Revue*, August-October, 1920) discusses the mechanism and treatment of detachment fractures caused by sudden violent exertion. One of his patients, aged 17, tried to kick a football with his right foot, but expended much of the force of the kick on the ground. Violent pain was at once felt in the left inguinal region; he collapsed, and could not stand up again. A skiagram showed a detachment fracture of the small trochanter on the left side. He was kept in bed with the left leg raised and immobilized with sandbags for nearly three weeks. Uneventful recovery followed, and a skiagram showed solid bony union. The author records two cases of detachment fracture of the tuberosity of the tibia, one of which was treated by operation (osteosuture with silver wire and chromic acid catgut), the other with plaster-of-Paris immobilization for six weeks. In both cases complete recovery was effected. Reviewing his own experiences and the literature of the subject, the author notes that, as a rule, the symptoms are slight and medical aid is not sought. The patient continues his exercise, sparing the affected limb when it hurts; in the course of about a year spontaneous recovery is complete. When the symptoms are severe enough to lead to a medical examination, a correct diagnosis and proper treatment soon result in complete recovery. The author points out that in the case of the leg it is better to immobilize the limb with plaster-of-Paris for five to six weeks than to neglect immediate adequate treatment, and merely to impose a general interdiction on all exercise for a couple of years.

114. Pepsin Treatment of Ozaena.

DE LEVIE (*Nederl. Tijdschr. v. Geneesk.*, December 18th, 1920) describes Griessmann's treatment of ozaena, which proves very effective owing to its combination of a chemical with a mechanical factor. A powder containing pepsin is insufflated into the nostrils, which are also irrigated with

a solution containing pepsin. The pepsin exercises a digestive action on the nasal crusts, as has also been found *in vitro*. Crust formation no longer takes place, for the pathological secretion combines with the powder before this can occur, and it is thus very easy to clean out the nose by irrigation. Griessmann states that a few days after the use of the powder the crust formation and foeter considerably diminish. De Levie, who employed the method in fifteen cases of ozaena, fully confirms Griessmann's observations, the results being much more satisfactory than those obtained by any other mode of treatment. He modified the original method by using a weak saline solution for nasal irrigation.

115. Acute Necrosis of the Pancreas.

MOCZIA (*Il Policlinico*, Sez. Prat., November 1st, 1920), who records an illustrative case in a woman aged 40, agrees with Mayo-Robson that the symptoms of haemorrhagic pancreatitis are so indefinite as to render the diagnosis impossible. He regards, however, the following symptoms as suggestive: localization of pain and muscular resistance a little above and to the right of the umbilicus; a contrast between the gravity of the general condition and the relatively slight objective signs; intense cyanosis of the face and subnormal temperature, together with indicanuria and defect of the pancreatic function shown by steatorrhoea, glycosuria, and azoturia. A past history of recurrent attacks of epigastric pain with vomiting, icterus, etc., and signs of a tumour between the xiphoid cartilage and the umbilicus makes the diagnosis still more certain.

116. Syphilis of the External Ear.

LUND (*Ugeskrift for Læger*, October 21st, 1920) has observed in a year no fewer than 13 cases of syphilis of the external ear, the disease being secondary in 9 cases and tertiary in 4. He calculates that syphilis of the external ear occurs in about 2 per cent. of all cases of syphilis. As many as 9 of his 13 patients were women, and he notes that this preponderance of females has been observed by other writers, who explain it as the result of wearing long hair over the ears. One of the author's patients illustrated this point well; her hair formed a caked pad covering the ear. With regard to the differential diagnosis, most writers attach importance to enlargement of the adjacent lymphatic glands, but the author could find no great enlargement of the glands in the mastoid, submaxillary, or retromaxillary regions in any of his cases, which showed only slight general polyadenitis. In one case the papular eruption was confined to the external meatus; there was no middle-ear disease, no general secondary eruption, and no marked adenitis; Wassermann's reaction was negative, but syphilis was diagnosed because of the history, the specific appearance of the papules, and the recovery effected by antisyphilitic treatment. The author can find a record of only one similar case; the diagnosis was clinched in this case by the development of a typical secondary eruption a week after the appearance of papules on the ear (Beck, 1911). Syphilis of the external ear being comparatively refractory to general specific treatment, this may have to be supplemented by local application of calomel in the form of a powder, an ointment, or a solution of salvarsan in a compress. Local treatment with silver nitrate or concentrated chromic acid, as recommended in the textbooks, provokes pain without any therapeutic compensation.

117. Varicose Veins Treated by Intravenous Injections of Sodium Bicarbonate.

SICARD and PARAF (*Bull. Soc. Méd. des Hôp. de Paris*, November 18th, 1920), impressed by the results which followed injections of luargol, have treated many cases of varicose veins by intravenous injections of a 10 per cent. solution of sodium bicarbonate. To avoid silica contamination the solution should be sterilized in hard glass. The most important practical detail is to ensure that the solution should go into the vein alone and not the surrounding tissues, otherwise a troublesome slough may follow. The results were very successful, and no embolism, no toxic symptoms, and no widespread thrombosis was ever observed. Injections are given every day or every other day according to the necessities of the case. They are said to be painless, and the treatment requires no laying up, and can be carried out without interfering with the patient's work. After injection a brief cramp is sometimes noted. Varicose ulcers—at any rate, those up to a 5-franc piece in size—are very favourably affected, and the cosmetic effect is also satisfactory. Where there is a tendency to relapsing phlebitis injections are contra-indicated. As to the duration of the cure, cases which were injected in 1917 and 1918 still remain satisfactory.

118. Intestinal Obstruction due to Gall Stones.

ACCORDING to PINARDI (*Il Policlinico*, Sez. Chir., November 15th, 1920), who records two cases, the diagnosis of intestinal obstruction due to gall stones has hardly ever been made before operation, as there are no pathognomonic symptoms. Cholelithiasis fairly frequently causes symptoms of transitory or permanent intestinal obstruction. In some cases there is a dynamic paralytic ileus due to localized or generalized peritonitis following cholecystitis. More frequently there is a mechanical ileus due to occlusion of the duodenum or colon by peritoneal adhesions or to compression of the intestinal walls by a gall bladder distended by calculi or a mixture of bile and pus. Pinardi, however, does not discuss this form of intestinal obstruction, but only that form due to arrest of gall stones in the lumen of the intestine. This variety of intestinal obstruction, though known for a long time, is relatively infrequent. Among 1,152 cases of intestinal obstruction Leichtenstern found only 20 examples, Gonzales collected only 67 cases from the literature, and among over 400 cases of intestinal obstruction operated on at the Ospedale Maggiore, at Turin, Pinardi found only three cases due to this cause. The condition is most frequently, if not exclusively, found in persons over 40, especially of the female sex. The most frequent site of obstruction is the lower end of the ileum.

119. Treatment of Orchitis in Mumps.

IT is asserted by BALLENGER and ELDER (*Journ. Amer. Med. Assoc.*, November 6th, 1920) that the present method of treating orchitis caused by mumps is inadequate, as is shown by the large number of atrophied testes observed. The plan which they have adopted is to incise the tunica albuginea and relieve the pressure, and at the same time allow the escape of some of the toxic substances produced by the organisms which cause mumps. This must be done early in the disease before the necrotic process has become established, just as in strangulated hernia the operation should be performed early if resection of the intestine is to be obviated.

120. Long-standing Dislocations of the Hip.

BUCHANAN (*Surg., Gyn., and Obstet.*, November, 1920) believes that hip dislocations may be considered old at the end of four weeks; after that time reduction by manipulation is rarely successful, owing to a formation of connective tissue which fills the acetabulum and binds down the head and neck. Reduction by open incision is to be preferred in nearly all cases of old hip luxations, and with modern methods is attended with little danger. Preliminary traction by Buck's extension is of advantage. The replacing of the head after the acetabulum has been emptied and the head and neck have been released is best accomplished by manipulation or the use of levers; these may be combined with traction both by the surgeon's arms and by a band fixed to the patient's thigh and passing round the surgeon's neck and shoulder. In 45 cases reported the result was often ideal, and in 80 per cent. good.

121. Local Anaesthesia for Abdominal Operations.

WIDERÖE and BORCHGREVINK (*Norsk Mag. for Laegevidenskab*, November, 1920) trace in detail the development of local anaesthesia in major operations, pointing out the salient features of the most modern methods. To show the extent to which local has replaced general anaesthesia in abdominal operations, they analyse the material operated on between April 1st, 1919, and April 1st, 1920, at the second department of Ullevaal Hospital. Here 1,548 operations of all kinds were performed, 28 per cent. under general anaesthesia, 5 per cent. under ether or ethyl chloride partial anaesthesia, 3 per cent. under local anaesthesia plus partial general anaesthesia, 47 per cent. under local anaesthesia, and 17 per cent. without any anaesthesia. In 422 of the 1,548 operations, or 27 per cent. of the total, the operations were laparotomies. Of these, after the exclusion of 251 appendectomies, 67 per cent. were performed under local anaesthesia, supplemented in some cases by a little ether inhalation. The authors discuss separately the operations on the stomach, intestines, biliary organs, and the female reproductive organs, and show that only in 4 out of 28 gastro-enterostomies was general anaesthesia adopted. They also preferred to operate on the biliary organs under local anaesthesia. But most of their 251 appendectomies were performed under general anaesthesia, only 22 being performed under local anaesthesia. Gynaecological intrapelvic operations were also usually performed under general anaesthesia, but in two cases ovarian cysts were successfully removed without pain under local anaesthesia only.

OBSTETRICS AND GYNAECOLOGY.**122. Polycystic Ovarian Changes.**

AMOR (*Gaceta Médica de México*, April, 1920, and *Journ. Amer. Med. Assoc.*, October 2nd, 1920) emphasizes the clinical distinctions between sclero-polycystic ovaritis of gonorrhoeal origin and cystic degeneration of the ovaries of non-infectious origin. The former condition, he says, is characterized by rapid development of the sclero-polycystic change, this being accentuated by the premature menopause which is frequently induced; no surgical intervention is of use unless the whole organ is removed or panhysterectomy performed. In non-infectious cystic degeneration, on the other hand, the condition, which is associated with neuralgic pains, is generally traceable to repeated pelvic congestions and a nervous or gouty diathesis; ovariectomy does not always effect a cure, while relief is often obtained as a result of simple laparotomy, ignipuncture of the ovary, stretching of the anus, or section of the sacral sympathetic.

123. An Unusual Mechanism of Labour in Placenta Praevia.

KATZ (*Zentralbl. f. Gynäk.*, October 9th, 1920) records two cases of placenta praevia in which the placenta was expelled before the foetus from the uterus. In the first patient, a 9-para, aged 41, haemorrhage, speedily followed by rupture of the membranes, occurred a week before term; the placenta was almost immediately expelled into the vagina, and its maternal surface presented at the vulva. The foetus, which presented by the breech, was born within a few minutes, enveloped in membranes which were intact save at the point of the original rupture. In the second, a 5-para, aged 30, had at term slight pains and some bleeding, followed three days later by a sharp haemorrhage and on the fourth day by rupture of the membranes. A severe bleeding now occurred, but became suddenly arrested; at the same time the vagina was found to be occupied by placental tissue, above which a knee was palpable. Extraction was performed through the placenta; in this, as in the first case, the subsequent course was satisfactory. Prolapse of the normally placed placenta is very rare, but Simpson in 1871 was able to collect 141 cases of birth of placenta praevia before that of the foetus.

124. Unusual Case of Urethral Stricture.

HEINRICHSORFF (*Zentralbl. f. Gynäk.*, September 25th, 1920) records the case of a female patient, aged 65, admitted to hospital for retention of urine, due to an almost impermeable urethral stricture. Death took place two days later. At the autopsy the bladder showed great hypertrophy, the ureters and renal pelvis were distended, and there was double pyonephrosis. Serial sections through the stenosed part of the urethra and its internal orifice showed the existence amid thickened scar tissue of a fistulous communication between the bladder and vagina. The author concludes that the original cause lay more probably in obstetric trauma than in a gonococcal periurethral abscess.

125. Calcified Tubal Mole.

MAXWELL (*Surg., Gyn., and Obstet.*, October, 1920) records the case of a woman, aged 55, in whom laparotomy was performed for carcinoma of the cervix. The left tube was found to end in a calcified spherical mass about 3 cm. in diameter, closely adherent to the omentum. After removal the swelling, which was cut with a saw, was found to consist of a calcified shell about 5 mm. in thickness, containing a semi-translucent jellylike substance, with a thin, bright yellow layer just inside the capsule. Microscopical examination showed the presence of degenerated chorionic villi and the remains of a decidual reaction. Probably an ampullary pregnancy had been transformed into a tubal mole in which adherence of the omentum had prevented tubal abortion, and which subsequently became calcified. The patient had been sterile for twenty-five years; no history pointing to past tubal gestation was elicited.

126. Conjunctival Chancre in a Midwife.

GÉRARD (*Gaz. des Prat.*, August 1st, 1920) records the case of a healthy midwife in whom a series of conjunctival lesions were not recognized to be those of primary syphilis until thirteen weeks after their appearance. The only possible source of infection is said to have been the projection into the eye of amniotic fluid; this, however, is reckoned never to contain spirochaetes.

127. Threatened Rupture of Uterus in Premature Birth by Transverse Presentation.

WERNER (*Zentralbl. f. Gynäk.*, October 23rd, 1920) alludes to a case, occurring in the Wertheim clinic at Vienna, of rupture of the uterus as a sequel to transverse presentation; labour occurred in the sixth month of gestation, and manipulative treatment was deliberately withheld in the expectation that spontaneous delivery would ensue. Werner records a personal case in which the circumstances were similar, but in which the sudden appearance of signs of impending uterine rupture caused expectant treatment to be abandoned. A primipara of 26, four days after the advent of pains and seventeen hours after rupture of the membranes, was found to have a transverse presentation, with vaginal prolapse of a hand; uterine contractions were strong and frequent, the patient felt well, having a pulse of 102, and foetal heart sounds were present. It was resolved to await spontaneous delivery, but an hour later the pulse increased in frequency to 120, the temperature rose, the uterus became contracted so that the foetal parts were no longer distinguishable, the prolapsed hand became livid and oedematous, and the foetal humerus was found to be fractured. At the same time the foetal heart sounds disappeared and Bandl's retraction ring became palpable; the external os was found to grasp the shoulder very tightly and not to be readily dilatable. Decapitation was performed by means of Franz's instrument, for which the author has a preference. The labour is stated in this case to have been premature, but duration of the pregnancy is not mentioned; the foetus was 35 cm. long and weighed 1,270 grams. The author concludes that in the case of premature labour it is not justifiable, even at the twenty-eighth week, to expect spontaneous expulsion; in such cases there is grave risk of a rupture of the uterus. With regard to the vaginal findings, he quotes a case of distension of the lower uterine segments with unruptured membranes (GOLDNER, *Monatsschr. f. Geburts. u. Gynäk.*, 1904, xviii, 4), and alludes to Murray's case (BRITISH MEDICAL JOURNAL, January 11th, 1902) of rupture of the uterus in the absence of cervical dilatation. On the other hand, spontaneous delivery, as a shoulder presentation, has been described in a child of $8\frac{1}{2}$ lb. at term.

128. Extended Hysterectomy after Radium Treatment of Cancer of the Cervix.

GRAVES (*Amer. Journ. of Obstet. and Gyn.*, November 1920) has operated on a number of cases of cervical cancer (whose operability was near the borderline) within a few days of the application of radium; of such operations, three consecutively were followed by acute post-operative peritonitis, fatal in one case. Since this experience the author has waited before operating for at least three or four weeks after the last radium treatment, as recommended by Wertheim. Several applications of radium were found to be followed in a few weeks by extensive parametrial sclerosis, but a single moderate dose interferes much less with the ease of the operation. In frankly operable cases Graves is not convinced of the value of preoperative treatment by radium.

PATHOLOGY.**129. Amyotonia Congenita.**

HOLMES (*Amer. Journ. of Dis. of Children*, November, 1920) has made full histological studies of the tissues obtained at autopsy in a child suffering from amyotonia congenita (Oppenheim's disease). The spinal cord was relatively large for the age of the child (18 weeks), and the anterior roots were diminished in size as compared with the posterior; there was no naked-eye or microscopic evidence of an inflammatory process, acute or chronic, or of recent degeneration. Myolization was normal, and the cells of Clarke's column were well preserved. In the anterior horn large cells were few, and in part were represented by cells of much smaller size, but similar appearance; cells of the normal size, although infrequent, showed the usual characters. The findings in the muscles were in accord with those made by PEARCE (*Ibid.*) in muscle fragments removed during life from another subject of this disease: areas consisting of bundles of hypertrophied but otherwise normal muscle fibres were mingled with small but otherwise healthy fibres which appeared to represent an imperfect stage of development. There was no evidence of a present or past degenerative process, no increase in connective tissue; there was no replacement of muscle tissue by adipose tissue, and the configuration of the brain was normal. In Holmes's case the microscopic appearances

of the musculature of the diaphragm were normal. In Pearce's paper records are given of five cases of amyotonia congenita: two were twins. Pearce agrees with Huenekens that clinically there is no sharp differentiation between the Werdnig-Hoffmann and the Oppenheim types of disease. In a subsequent paper (*Ibid.*, December, 1920) Holmes forms the conclusion that Oppenheim's and Werdnig-Hoffmann's diseases are extreme types of the same disorder, and that they are probably both related to the group of myopathies represented by Erb's juvenile form of muscular dystrophy and the hereditary form of Leyden and Moebius.

130. Gastric Papillomatosis.

DU BRAY (*Arch. of Int. Med.*, August 15th, 1920) records an interesting case of the rare adenoma of the stomach. Full notes are given of the clinical condition, on which a diagnosis of gastric carcinoma was founded. At operation the true nature of the neoplasm was suspected, and frozen sections confirmed the benign nature of the condition. The tumour mass, which measured about 4 in. in diameter, was found on the greater curvature, and appeared as closely-packed papillomatous growths thrown into folds, and resembling brain cortex in colour and contour. The individual papillomata traced to their bases appeared to be outgrowths from normal mucosa. Microscopically the sections showed a hypertrophy and papillomatous arrangement of the mucosa. The tubular glands were greatly elongated, with much branching and corkscrew formation. Stroma was minimal in amount, and there was no involvement of the musculature. Such benign tumours are frequently accompanied by no abnormal symptoms, and are mostly discovered *post mortem*.

131. Complement Fixation Reaction in Lupus.

ICHOK, GOLDENBERG, and FRIED (*C. E. Soc. Biologie*, November 6th, 1920), in view of the fact that it is difficult to give an experimental demonstration of the tuberculous nature of lupus, which is due either to the small number of tubercle bacilli contained in the lesion or to an attenuation of the virulence of such bacilli, set themselves to find out if the body of a patient affected with such an attenuated tuberculosis was capable of producing specific antibodies. The presence of such antibodies in lupus has been denied. The authors were fortunate in being able to examine no less than 104 cases of lupus. Using Besredka's antigen—an emulsion of tubercle bacilli grown in Besredka's egg-broth—and the usual complement deviation technique, they found that 69 serums gave a positive reaction (66.4 per cent.), 18 gave a partial reaction (17.3 per cent.), and 17 were negative (16.3 per cent.). Amongst their cases, varying from 10 to 74 years of age, not one presented clinical symptoms of a tuberculous localization other than in the skin. In the great majority of cases the disease had existed for more than ten years, sometimes for thirty to forty years. In spite of the more or less considerable extent of the cutaneous lesion and of its tenacity, the rest of the body always appeared free from tubercle. It may be that the body is somehow vaccinated by the circumscribed attenuated infection. Owing to its power of resisting tuberculous reinfection in the majority of cases, the body of a person with lupus is different from that of the normal unaffected individual, and this is corroborated by the positive sero-diagnostic reaction. It is an open question whether the presence of antibodies is an evidence of a still active focus of tuberculosis or of an active resistance preventing the extension of the tuberculosis to other organs.

132. The Meinicke and Sachs-Georgi Reactions.

HAJOS and MOLNÁR, jun. (*Wien. klin. Woch.*, October 28th, 1920), from a comparative examination of the Wassermann, Meinicke, and Sachs-Georgi reactions in several hundred cases, came to the following conclusions: (1) Meinicke's reaction, and still more so the Sachs-Georgi reaction, is a much simpler method than the Wassermann reaction. (2) The sensitiveness of the Meinicke and Sachs-Georgi reactions is somewhat less than that of the Wassermann reaction. (3) The Meinicke reaction is less specific than the Wassermann reaction, but the specificity of the Sachs-Georgi reaction is equal to that of the Wassermann reaction. (4) The Sachs-Georgi reaction can be employed for examination of the cerebro-spinal fluid, whereas the Meinicke reaction is not available for this purpose. (5) The Wassermann reaction cannot at present be replaced by the other two reactions, but the Sachs-Georgi reaction is a valuable supplement, and should always be carried out at the same time as the Wassermann reaction, as in many syphilitic cases it may give a positive result when the Wassermann reaction fails to do so.