use in Edinburgh; partly because they were not demonstrative, and partly because, being given at rarer intervals and in conjunction with one or more colleagues, they could not, from the nature of things, approach to the characters of a complete course.

Not that I wish to underrate such clinical lectures in London as I refer to. In proportion to the ability and experience of the lecturer such discourses have their high value. But referring, as they do, to cases which are not present before the student, and which many of the audience may perhaps never have seen at all, they might often, except for the effects of voice and manner, be as well read as attended. Such lectures are in reality far more ambitious and involve greater talent and literary effort than ours, which are comparatively humble performances, standing much in the same relation to a course of systematic surgery as anatomical demonstrations to lectures on anatomy. But, simple as they are, they fill a place in the medical curriculum which, I believe, is second in importance to no other, and which cannot be filled adequately either by clinical lectures otherwise conducted, or by bedside teaching or tutorial instruction.

My own conviction of the importance of the subject is, at least, sufficiently shown by the fact that upon the question whether or not arrangements could be made to enable me to conduct my course here exactly in the same manner that, following the example of Mr. Syme, I had found so advantageous in Edinburgh, depended my acceptance or otherwise of the highly honourable offer of a clinical chair in King's College.

[In publishing this lecture I wish to add two remarks in order to avoid misunderstanding. First, that I do not omit bedside instruction, and always warn my class that no lectures can possibly take the place of their own individual work at the bedside, since it is essential, in order that the student may become a competent practitioner, that he should handle diseases as well as see them, and not only witness their treatment by others, but be personally concerned in their management by holding dresserships, &c., in our hospitals. Secondly, I desire to add that, since I used the expressions in Edinburgh above referred to, I have been informed that clinical surgical teaching in London has undergone considerable changes since I was a student, both as regards giving it a more demonstrative character, and in greater frequency and regularity of meetings of the classes. The London schools are both numerous and independent, and the changes to which I allude have, I understand, taken place in different degrees in different institutions. Hence, I can quite understand that my general remarks, made, as I would repeat again, without any view to publication, may have done individual injustice, for which no one could be more sorry than myself.]

CASE OF CEREBRO-SPINAL MENINGITIS, AND A CASE OF TUBERCULAR MENINGITIS, OCCURRING IN THE SAME FAMILY, AT THE SAME TIME, AND SIMULATING EPI- DEMIC CEREBRO-SPINAL MENINGITIS.

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ON September 3rd, 1876, I was called to see A. B., a delicate-looking boy, aged eight years. His illness had commenced seven days previously with vomiting and headache. For two months he had suffered from an abscess behind the left ear. I found him vomiting grass-green fluid. Solids and liquids were ejected as soon as swallowed. He complained of frontal headache and of general malaise. The face was pale, the expression bright and cheerful. The tongue was clean and moist. The pulse 112; the temperature 101° F. The abdomen was somewhat distended, and there was slight iliac tenderness. There was neither eruption, gurgling, nor diarrhoea. A purulent discharge was escaping from an abscess in the left mastoid process. The optic discs were natural.

On September 4th he was *in statu quo*. On September 5th there was a marked improvement. The pulse was 80; the temperature 99°. The vomiting was less frequent and less severe. The hydrocyanic mixture, which was ordered at the first visit, was repeated.

Diagnosis.—Considering the previous history, and the progress of the case, I came to the conclusion that the symptoms were due to an extension inwards of the inflammatory mischief in the mastoid cells, an opinion which was shared in by my friend Dr. Page, who saw the case with me, and took charge of it after this date, and to whom I am indebted for the following notes.

On September 6th there was a slight internal squint of the left eye.

On September 7th the squint had disappeared. He was very much better. The headache had gone. The vomiting had ceased. The pulse and temperature were normal.

On September 8th Dr. Page was asked to examine A. B.'s sister (X. Y.), a delicate scrofulous girl, aged nine years. She had been more or less ill for seven months with an abscess in the left tibia. He found her complaining of headache and great debility. She had several times vomited her food. For several nights she had been feverish. The tongue was clean; the bowels costive. A well-marked rose-coloured rash, exactly resembling that of typhoid, was present on the abdomen. The pulse was 110; the temperature 101°.

On September 9th a second crop of rose-spots appeared on the abdomen. The headache was intense; the fever greater. Dr. Page, considering this a case of typhoid, came to the conclusion that the boy, A. B., had passed through a mild attack of the same disease.

The girl, X. Y., continued to suffer from the same symptoms until September 19th, when she became comatose. I saw her on September 21st; she was quite unconscious; the pupils dilated and insensible to light; constant nystagmus of both eyeballs was present. The media of the eye were unusually clear; the veins of the fundus large and markedly congested. There was no oedema of the disc; no tubercles on the choroid. Every now and again convulsive twitchings occurred in the right arm and leg. The flexors were alone affected, but the convulsions had no definite character. The urine and faeces were passed involuntarily. There was no cough, and the lungs were healthy. The pulse was 120; the temperature 102.4°.

At the same visit, I also examined A. B. He had continued to convalesce until September 18th. On the morning of that day he was very weak and low-spirited, and complained of pain and stiffness in the muscles of the back of the neck. It was noticed, too, that the head was slightly retracted. I found him in great suffering, the expression pitiable in the extreme, the attitude most peculiar. He was unable to lie on his back, because of pain and tenderness over the region of the sacrum, but lay on his belly, resting partly on the palms of his hands, chiefly on a pile of pillows placed under his chest and chin. The head was completely retracted, the occiput being between the shoulders. The spine was arched back to a great degree. Had he been on his back, the position would have been that of complete opisthotonos. Every now and again an increase in the tonic spasm occurred, the head became more retracted, and the back more arched. There was not then, nor at any period of the case, any spasm of the muscles about the mouth. A well-marked stridor accompanied inspiration, and the boy complained of difficulty in breathing. There was also considerable difficulty in swallowing, caused, no doubt, "by the larynx being firmly pressed against the spinal column by the extreme tension of the anterior muscles of the neck (sternothyroid, thyro-hyoid, and sterno-hyoid)."¹ On examining the sacrum nothing abnormal could be detected. The slightest touch on each side of the middle line caused intense agony. No pain was complained of when percussion was made over the spines of the vertebrae. The pulse was 120, very weak; the temperature 101° F. Warm fomentations over the sacral region, and a mixture containing opium and chloral hydrate, were prescribed.

We again changed our diagnosis, regarding both cases as epidemic cerebro-spinal meningitis. In the case of the boy the diagnosis of cerebro-spinal meningitis was fully warranted by the symptoms. In the girl the symptoms were chiefly cerebral, but cases in which coma and cerebral symptoms have been the leading features are described.² It must, how-

¹ Ziemssen's Cyclopædia of the Practice of Medicine, vol. ii., p. 709.

² Russell Reynolds, vol. i., p. 501.

ever, be admitted that in such cases the onset is generally sudden, the symptoms intense from the first, and the duration short—a few days.

The fact that the two cases occurred at the same time and in the same place led us to believe that they depended upon one and the same cause. Hence the diagnosis, *epidemic cerebro-spinal meningitis*. The extreme rarity of this disease in England was, of course, against this view. Some cases, however, had been reported in the medical journals shortly before the occurrence of this case, and I myself had met with one in hospital practice. The presence of the rose-coloured rash which led Dr. Page to suspect typhoid, though undoubtedly very rare in epidemic cerebro-spinal meningitis, has been observed.³

On September 21st the boy was worse; the pain in the back was excruciating. The dose of the narcotic was increased, the warm fomentations were discontinued, and ice-bags substituted. Champagne in small quantities was prescribed.

On September 23rd he complained of shooting pains in the lower extremities, and of pain in the abdomen about the region of the umbilicus. There was very marked hyperæsthesia of the skin of both thighs and legs. Marked reflex movements and complaints of pain were caused by tickling the soles of the feet. There was, too, some difficulty in making water. It may here be noted that this symptom did not recur.

On September 28th he was *in statu quo*, taking plenty of nourishment, and soothed by the narcotic.

On September 29th the girl died. The condition of coma had continued since September 19th. No fresh symptoms worthy of mention had developed.

Autopsy.—The post-mortem examination was made thirty-six hours after death. The body was extremely emaciated. The scalp and calvaria were intensely congested. The membranes of the brain and the vessels on the surface of the convolutions were gorged with blood. The convolutions were flattened to an extreme degree, and the sulci effused. The membranes over the hemispheres were fairly normal. At the base the membranes were greatly thickened, opaque, and crowded with tubercles. These appearances were most marked in the Sylvian fissures and over the posterior half of the base. The membranes about the optic nerves and optic commissure were little affected. An excess of fluid escaped from the lateral ventricles, which were somewhat dilated. The brain-substance was markedly soft and oedematous. The corpora quadrigemina and cerebellum seemed normal. The spinal cord and its membranes were normal. There was no purulent formation within the skull. No tubercles were found, even after careful examination, in any other part of the body. There was an unhealthy ulcer in the left tibia, and the bones of the left wrist were carious. The result of the post-mortem was to make us adopt our original diagnosis—that the cerebro-spinal meningitis from which the boy was undoubtedly suffering was not epidemic, but was due to extension inwards of the diseased action in the left temporal bone.

Subsequent progress of A. B.'s case.—On Oct. 1st he was much better; free from pain; the arching of the spine much less. On Oct. 4th he could turn himself on to his back, and seemed in every way wonderfully improved. On Oct. 8th I was called up at 3 A.M. to visit him. The vomiting had suddenly returned, and he was complaining of headache and pain in the abdomen; the abdominal pain seemed increased by pressure. The pulse was 120; the temperature 101° F. A full dose of morphia in a wineglassful of champagne was administered. At 10 A.M. he was free from pain and quite cheerful; the pulse had fallen to 100. On Oct. 9th he seemed greatly better; the pulse and temperature were normal; he could turn and move about without any difficulty, though the head was still slightly retracted. At our evening visit we found a marked change for the worse: the patient was collapsed; pulse 130, barely perceptible; the retraction of the head and spine was as bad as ever; he complained of severe shooting pains in the spine and legs; the hyperæsthesia of the thighs and legs had returned. On Oct. 10th he died. He was quite sensible and in extreme pain until the very last. I may, perhaps, here remark that there was never any paralysis, never any tenderness on percussion over the spines of the vertebræ.

The post-mortem was made forty hours after death, in the presence of Drs. Page, Drummond, and Rowell. The body

was wasted to an extreme degree. Rigor mortis had passed off. The scalp and calvaria were natural, with the exception of the abscess in the left mastoid cells. The middle and internal ear seemed natural. The seventh nerve, at its entrance to the temporal bone, was red and swollen; it was fully twice the size of its fellow on the opposite side. The membranes adjacent to the diseased bone were inflamed, but there was not, so far as we could make out, any direct communication between the mastoid abscess and the cranial cavity. The membranes over the hemispheres were in places thickened and opaque. The membranes at the base were also slightly thickened. Over the inferior surface of the cerebellum there was a layer of greenish-yellow lymph. There were no other marked lesions within the cranial cavity. There were no tubercles, and the brain itself was healthy. The spinal membranes in their entire length were in a state of intense purulent inflammation. An eggcupful of thin, purulent fluid escaped when the membranes at the lower end of the spinal canal were opened. An abscess the size of a walnut, consisting of thick creamy pus, was embedded in the midst of the chorda equina. The cord itself was healthy. The other organs were healthy.

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CASE OF INGUINAL PARAMETRITIS PUERPERALIS.

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S. S—, aged twenty-five, has had three children, the last born four weeks and four days before her admission into the hospital. She recovered well until a week after her confinement, when she had a prolonged rigor. Shortly after this rigor she noticed a lump in her right groin, which, however, gave her little trouble at first. A fortnight after her confinement she left the house; and in two or three days after this, the lump in the groin began to swell and be painful.

Extending from near the right anterior superior spine to the body of the left pubic bone is a prominent half-pear-shaped mass, the smaller end being near the iliac spine. This mass communicates a feeling of being filled with fluid. At its broadest part it is two inches and a half, measuring upwards from Poupart's ligament. Per vaginam, the uterus and all that can be felt is found to be soft, mobile, and healthy. Only, in the right anterior quarter of the pelvic brim, pressing high up, the finger meets fulness, produced by the above described swelling overhanging the horizontal ramus of the right pubic bone.

The abscess was laid open, with antiseptic precautions, and dressed. The finger introduced into the cavity of the pus found it to be limited to the region of the external visible swelling.

Since the evacuation of the abscess the patient has made uninterrupted and satisfactory progress.

Remarks.—There can be no doubt that this is a case of puerperal abscess, nor that it is of uterine origin. It is also certainly parametric, not perimetric, the cellular tissue in the region of the inguinal canal being affected. Further, the abscess exists while the uterus and its immediate neighbourhood is, as far as the most careful examination can show, in a perfectly healthy condition.

The word parametric is, in this case, used in a somewhat strained manner, but yet quite in accordance with true theory. It is, of course, understood that the prefix *para* merely implies the fact of the abscess being in the cellular tissue not intraperitoneal; but the rest of the word (*metric*) implies that the suppuration took its causal origin in the uterus.

There are two ways of explaining this origin. One is that the termination of the round ligament was, separately, inflamed, and that the abscess arose in consequence of this inflammation, and around its termination in the inguinal canal. There are no facts leading up to this explanation, nor parallel with it. The other explanation is more in accordance with the history of other parametric abscesses, such as those in the sheath of the psoas muscles and even in the cellular tissue around the kidneys, and many abscesses with which surgeons are

³ Flint's Practice of Medicine, p. 64.