

whose *nature* it was to carry everything by force, was amongst the foremost to endeavour by experiment to compel Nature to reveal her secrets to the experimenter, to the manipulator of the scalpel, to him who determines the functions of the head by cutting it off in a living animal. It is quite a mistake to suppose that Haller or Hunter had overlooked the experimental in physiology; a genius like Hunter's overlooks nothing. Such men do not remain contented with truisms. In a word, having exhausted the resources of the minute anatomy of his day, of the descriptive in so far as was known to him, and of the philosophic anatomy of tissue in the light he viewed it,—which, it is true, was neither accurate nor profound,—he, of necessity, had recourse to experiment. Bichât, with other and stronger lights,—for he held in his hand the torch of genius,—followed in the same track. But his was no hap-hazard course; he followed a direct aim, and with what success need not now be told. The gleanings he left were carefully collected, and made the most of, by a school of which Magendie was the undisputed leader. That physiology made some progress from this movement, I am free to admit. Still there remained much to be done. Bichât had methodized it, arranged it, added new facts, worked it up into a system, and given it a language of its own. Genius, far-seeing as it always is, led him to neglect, to overlook no mode of inquiry. The chemistry of the day he employed as he best could; it was coarse, and in many things visionary. The microscope had not been improved, and therefore in his hands led to no important results. Even the principles of general physics had not been applied in a correct way to the phenomena of life, and thus was he compelled to adopt, as a starting-point, in his view of living nature, an unknown principle—the vital, whose field of operation and of influence over living beings he, notwithstanding, narrowed to the utmost of his ability. The character of the science of his day left him no choice other than the investigating the results of the action of that principle, which with him stood in the place of the first of secondary causes. When simple observation failed, he tried the microscope, chemical analysis, and the corroborative information to be derived from experiments on living animals, and from human and comparative pathology. He started, it is true, with an hypothesis; but so did Newton. The theories of a vital principle and of gravitation are both liable to be set aside by higher generalizations.

(To be continued.)

## REPORT OF A CASE OF ANEURISM OF THE ABDOMINAL AORTA.

By G. P. GIRDWOOD, Esq., M.R.C.S.,  
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W. S—, a sergeant in the 1st Battalion Grenadier Guards, aged thirty-six, came under my care on the 10th of September last. He had been in the regiment eighteen years. The patient was, when a young man, rather dissipated, and addicted to the pleasures of the fair sex, but has latterly been a sober steady man; he is now married, and has two children; he is a spare man—never was stout; has not lost flesh lately; complains of occasional pain in the back, opposite the second lumbar vertebra; also pain in the right side, extending across to the left, referable more particularly to the region of the liver. After eating, the pain in the left side is considerably increased. He suffers from flatulence, and is sometimes sick after taking food; complains of a disagreeable taste in his mouth in the morning; tongue slightly furred; bowels confined—sometimes for several days at a time; pulse 70, quiet and normal in its pulsation. The pain in the right side is increased by pressure; the conjunctivæ are slightly suffused with a yellowish tint, the skin generally presenting a dull aspect; the urine sometimes loaded with lithates, at other times perfectly clear, and, when clear, passed in much larger quantity than when thick (about six pints in the twenty-four hours). Blue-pill and aloes every night, with carbonate of soda and gentian during the day, relieved him of his more urgent symptoms in the course of a fortnight.

Sept 26th.—He retained occasional pain in the region of the liver and back, as well as the yellowish appearance of the conjunctivæ and skin; for which symptoms the remedies mentioned were occasionally had recourse to during the succeeding six weeks.

Nov. 12th.—His symptoms have become gradually more urgent; the pain in the back more constant, but alternating with pain in the testicles, and that pain noticed more particularly in the right testis. Both testes are flaccid and atrophied; the lithic acid in the urine is more constant; he is visibly losing flesh; no disease of heart or lungs can be detected. It may be remarked, that slight touching of the scrotum or testis causes great pain, whilst firm pressure does not. Pressure in the region of the kidney causes pain there. No particular spot along the spine can be found tender. Percussion along the spinal column produces no increase of pain. There is no albuminuria. The same treatment adopted before now returned to, with the addition of a belladonna plaster to the back, have given no material relief, although persevered in till Nov. 30th, but have lessened the irritability of the stomach, and increased his appetite. At this time he was put upon quinine-and-iron.

The man has become weaker, and the tenderness of the scrotum not only there increases, but extends to the thighs and lower part of the abdomen. The glands in both groins are somewhat enlarged, and are rather painful to the touch. Pain extends along the inner side of both thighs; it is, however, a cuticular pain, not increased by firm pressure, but is so by slight touching. The urine has become clear and free from deposit, is greater in quantity, and free from albumen.

The quinine-and-iron was continued till Dec. 19th, with but little change except increase of appetite; but still weaker condition of body, and increase of pain, with restlessness at night, for which blue-pill and Dover's powder were given at bed-time; and this treatment was continued till Dec. 29th, when, the pain and restlessness at night increasing, a larger dose of Dover's powder was given at bed-time, and the quinine-and-iron continued. The symptoms become more and more aggravated, and the yellowness of the conjunctivæ more apparent. The lithic acid has again appeared in the urine, but is not constant—one day the deposit being very large, and the next day absent altogether.

His case is very obscure, and I am at a loss to know what to make of it. I can find no tenderness on pressure of the abdomen, except in the region of the liver; no tumour in the abdomen. He still complains of cuticular pain about the scrotum, lower part of abdomen, and anterior region of the thighs; he describes it as gradually increasing. The pain in the back is now but little complained of. There is no displacement of any part of the spinal column, nor does he stoop; he walks perfectly upright, and his shoulders are equal in height. The weakness is so great, that he can only take a few steps without support, and is obliged to keep his bed. The malady has the character of neuralgic affection of the testis, under which view of his case, he was, after consultation, on the 4th of January, put upon quinine in large doses, to which, on the 12th, cod-liver oil was added. His sufferings continued to increase. The only effect of the quinine was an increase of appetite. It is now good; the bowels regularly opened daily; his tongue is clean; he looks more cheerful, and certainly clearer in complexion; but still his pain increases daily.

Jan. 15th.—I am still at a loss; and having shown the case to a friend, I have, by his recommendation, (there being considerable tenderness over the region of the kidney, which is increased on pressure, and the lithic acid deposit in the urine being more constant,) applied cupping-glasses over the loins, and put him on two grains of calomel and half a grain of opium three times a day.

16th.—He has less pain in the back than yesterday; also less pain in the testicles, and the tenderness in the legs is less; takes his food well, and altogether seems relieved; the lithic acid is still present in quantity. Continue the pill three times a day.

17th.—The pain still becomes less wearing, and he continues to take his food well; bowels are not opened. The pill continued.

18th.—Is much the same as yesterday; he is excessively weak; can scarcely stand without support; bowels still confined; gums slightly affected by the mercury. To take the pill twice a day; and an ounce of castor oil immediately.

19th.—Complains, this morning, of much tenderness over the abdomen; knees drawn up; pulse small and frequent, 96; the tenderness of the abdomen is cuticular, deep pressure not causing pain; the pain has returned more acutely down the inside of the thigh and scrotum; if the finger be drawn gently across any of these parts, acute pain is experienced, but not when firmly pressed; he has no pain at all in the back; is much weaker, but still continues to take his food; the bowels have been opened with the oil. Turpentine stupe to the abdo-

men; continue the pill twice a day.—Evening visit: The excessive tenderness of the abdomen and thighs is completely gone, but he complains of restlessness and pain, referred chiefly to the left iliac region. Ordered ten grains of Dover's powder.

20th.—Slept well last night, and awoke this morning considerably better; and after eating his breakfast, expressed himself much relieved. Immediately afterwards, he turned over in bed, and about nine o'clock died, without any premonitory symptom.

*Post-mortem examination, twenty-six hours afterwards.*—Body much emaciated, and apparently shrivelled and bloodless; a somewhat yellowish suffusion of the skin and conjunctivæ. Abdomen distended, and fluctuation most distinct; the muscles were rigid from rigor mortis, and particularly prominent. Cranium not examined. Thorax: Heart perfectly healthy, but nearly empty of blood. Lungs: Slight adhesions of old standing at the apices; the apices of both lungs slightly puckered, otherwise perfectly healthy throughout, but very bloodless. A tumour, about the size of a large orange, projected upwards through the aortic opening of the diaphragm, which, on examination, proved to be a sudden dilatation of the aorta, with the diaphragm pushed up over and adherent to it. Abdomen: Liver healthy; both kidneys healthy; spleen healthy in structure internally; cavity of the peritoneum distended with blood; the crassamentum had separated by coagulation. There was one line of coagulum leading from the spleen to the lower part of the abdomen, and another from the under surface of the liver, joining the general mass of coagulum existing in the lower part of the abdomen. The whole of the convex surface of the spleen was found adherent to the under surface of the diaphragm; the bands of adhesion were all infiltrated with coagula. The cellular tissue in the neighbourhood of the spleen, the kidney, and the supra-renal capsule on the left side conjointly formed a part of the wall of the aneurism which was found to exist. Part of the under surface of the left lobe of the liver, the lobulus Spigelii, the lobulus quadratus, the gall-bladder, and the vessels leading to and from the liver, the head of the pancreas, the duodenum, and the transverse colon, all matted and glued together, formed also part of the wall above and anteriorly on the right side. The diaphragm distended over the dilated walls of the abdominal aorta, and adherent to this a portion of the under surface of the stomach at its cardiac extremity formed the upper boundary on the left side. Laterally and anteriorly the crura of the diaphragm, the cellular tissue over the kidneys, thickened and infiltrated by adhesive inflammation, formed its boundary. The dilated aorta, the duodenum and pancreas, and cellular tissue of the mesentery formed its wall anteriorly. There were prolongations of the sac downwards, involving the origin of the psoas magnus muscle on each side, and causing adhesive inflammation even of the muscular structure between and posterior to the transverse processes of three upper lumbar vertebræ posteriorly. Posteriorly the sac was completed by the bodies of the last dorsal and three upper lumbar vertebræ. The body of the first lumbar vertebra was most eaten away by the pressure, then that of the second lumbar, and then the last dorsal; the intervertebral substance between the bones remaining unabsorbed, although the pressure had absorbed at least the moiety of the body of the bones. The post-mortem examination in this case at once revealed the cause of all the symptoms: the pressure on and inflammation around the origins of the lumbar nerves and plexus giving rise to the pain and excited sensibility at the extremities of those nerves, and the parts supplied by them; the pressure on and thickening around the ductus communis choleodochus being the cause of the slight appearance of jaundice; the inflammation of the tissues around the kidneys producing the pain in that region, and also partly accounting for the lithic acid in the urine; the constant pain in the back being owing to the absorption of the vertebræ, and pointing out how much mischief may be going on with inadequate evidence.

Windsor, May, 1859.

## ON A CASE OF DROPSY OF THE ANTRUM.

By JOHN GREENE, Esq., M.R.C.S., Sedgley.

MRS. W—, aged thirty-two, applied, on the 20th of March, to obtain my opinion about a tumour in her face, that she had been told was cancer. There was, in reality, a large hard swelling in the superior maxillary bone of the right side, free from soreness, but attended with a constant pain of an uneasy, gnawing character, not severe, though depriving the

patient of her rest. Close to the orbit the bone was well defined and normal. On careful pressure, at the lowest portion of the tumour, the attenuated parietes of the antrum were found to give way with a crackling sound. Inside the mouth the bone was largely distended, completely filling up the cavity between the alveolæ and the muscular covering; the mucous membrane was highly vascular. Several of the teeth were slightly decayed, but not sufficient to warrant the suspicion that dental irritation was the original cause of the mischief. As the patient gladly consented to any means that would be likely to relieve her, I proceeded to extract the first molar tooth, and introduced a trocar, through its socket, into the cavity of the antrum. From six drachms to an ounce of a thin, yellowish fluid, of an intensely bitter, nauseous taste, was then drawn off. Under the microscope, and even with the naked eye, it could be seen to be loaded with cholesterine, as related in other cases of this nature. The relief from pain was instantaneous after the operation; the swelling diminished, and the parts became soft. In the after-treatment, the bowels were acted upon; the cavity was several times injected with warm water, and the wound prevented from closing. The discharge gradually decreased, and in the course of a week had entirely ceased. The parts had recovered their natural size, and there was no pain. The wound was now allowed to heal.

She could give no account of the original cause of the affection, not remembering ever having had a blow on the part. She told me that it "came itself" between two and three years ago, and had been slowly increasing up to the time that she came to me.

Sedgley, May, 1859.

## A Mirror OF THE PRACTICE OF MEDICINE AND SURGERY IN THE HOSPITALS OF LONDON.

Nulla est alia pro certo noscendi via, nisi quam plurimas et morborum et dissectionum historias, tam aliorum proprias, collectas habere et inter se comparare.—MORGAGNI, *De Sed. et Caus. Morb.*, lib. 14. Proœmium.

### WESTMINSTER HOSPITAL.

DISEASE OF THE SPINAL CORD THROUGH CARIES OF THE CERVICAL VERTEBRÆ, PRODUCING A REMARKABLE GROUP OF SYMPTOMS.

(Under the care of Dr. RADCLIFFE.)

It may be reasonably assumed that the caries of the bones of the neck in the following most interesting case had its origin in syphilitic disease, commencing in their periosteal coverings, extending to the spinal dura mater, the coverings of the spinal nerves, and, to a certain extent, likewise affecting the spinal marrow itself, as evidenced by the singular group of symptoms which were present. These can be defined pretty accurately through the valuable researches of Dr. Brown-Séquard. They varied remarkably in either upper extremity. Thus anæsthesia, with voluntary motion, were noticed in the left hand and arm; whilst hyperæsthesia and impaired voluntary motion were present in the right hand and arm. The same influences which affected the right upper extremity were most probably extended to the right sterno-mastoid muscle, and the right side of the constrictors of the pharynx, as the dysphagia was but partial. According to the views of the distinguished physiologist already named, the group of symptoms enumerated would seem to indicate a commencing diseased action of the spinal marrow—namely, *alteration of the anterior columns, on the right side, confined, in all probability, to the seat of the diseased vertebræ, and although in the neighbourhood, yet still below the medulla oblongata.* On the other hand, the symptoms on the left side point to some *alteration in the posterior lateral columns and posterior roots of the spinal nerves.* Voluntary movements are quite possible in this condition of the cord, although reflex actions are completely lost in all the anæsthetized parts. (See Dr. Brown-Séquard's ninth lecture, at p. 416 of the second volume of