

A Case of Spontaneous Fracture. A. HERBERT SPICER,
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IN looking through the post-mortem records of an asylum one constantly comes across cases of injuries of grave nature, which apparently could only have been caused by violence, but in which either no history of injury is obtainable, or else it is of a slight nature, quite out of proportion to the damage done. As examples I mention briefly the following, which occurred in Claybury Asylum during the last two years.

1. G. H—, æt. 49, general paralytic. On the 3rd February, 1901, he is noticed to be feeble; on the following day he is vomiting and collapsed, and dies. Post mortem he is found to have a rupture on the under surface of the right lobe of the liver, one and a half inches long by half an inch in diameter, two inches to right of gall-bladder, with the extravasation of about a quart of blood into the peritoneal cavity. No history of injury obtainable.

2. H. A—, general paralytic, æt. 20, is found post mortem to have a dorsal dislocation of the hip, the joint and surrounding tissues being full of broken-down blood and pus. At first sight one would say this was a case of acute arthritis with secondary dislocation; but it is especially noticed by the pathologist (Dr. Bolton) that the cartilages of the joint are practically normal, and that it really was a case of primary dislocation with secondary suppuration, the latter being rendered probable by the fact that he had suppurating sores on his legs. Again no explanation of the injury could be found.

3. L. D. G—, æt. 80, is taken suddenly ill, and dies within twenty-four hours. She is found to have a T-shaped rupture of the aorta, one inch above left coronary artery, the stem and cross-bar of the T each measuring one inch. The pathologist reports that, for a woman of her age, the aorta was comparatively healthy, and presented but a moderate degree of atheroma.

4. One of my own patients, an old woman of 85, was found unable to stand when got up from the tea-table. She had walked to the table with slight assistance. She received no injury whatever; neither nurses nor patients in her vicinity saw her fall; yet on examination the right femur was found frac-

tured in its upper third. It is now united, and she can get about again on it. No explanation of the case was forthcoming.

It is a relief to turn from these extraordinary and unsatisfactory cases to the one which is the immediate subject of my paper, for although in this case the injury was a fractured femur, occurring during a fit, yet a sufficient reason was forthcoming at the time of the accident, and was verified at the subsequent post-mortem.

5. This patient, a woman *æt.* 33, the subject of chronic mania, on August 12th, 1899, had a fit in bed, and it was noticed immediately after the fit that the patient had developed a swelling of the right thigh, which the nurse thought to be a tumour of the muscle.

On examination it was found that the femur was broken across at the upper point of trisection of the shaft. Manipulation of the broken bone appeared to cause no pain, although the woman was very sensitive to pain, and the crepitus between the ends was of a peculiar soft character, very unlike the usual grating. It was evident that the bone had broken across during the convulsion, and the question was how such an accident could have occurred from such a comparatively insufficient cause. Fortunately the history of the case gave the answer, for two months previously I had amputated the left breast for scirrhus carcinoma. The wound had healed, and the patient had been walking about apparently all right, except that she occasionally complained of some vague pain and weakness of the leg, for which no cause could be found on careful examination, as a fortnight before the fracture she had a fit for the first time. A secondary deposit in the brain was suspected but unconfirmed.

At the time of the injury there seemed to be no abnormal swelling about the ends of the bones, but taking into consideration the history, the absence of pain, and the character of the crepitus, we came to the conclusion that it was a case of spontaneous fracture, occurring in a bone the seat of malignant disease. This belief was somewhat shaken when it was found that union was taking place between the ends of the bones; but our doubts were set at rest by the development at the seat of fracture of a swelling, which, growing rapidly, attained at

the time of the patient's death (about three months after the injury) to the size of a small melon.

At the post-mortem examination the ends of the femur were found embedded in new growth, and the suspected cause of the two fits mentioned previously (and of four others subsequent to the injury) was verified by finding a new growth in the dura mater of the right parietal region, the side opposite to the fractured limb, the growth being of considerable size, having an area of five square inches by half an inch in depth.

With reference to this temporary union occurring in rare cases of spontaneous fracture, I quote a case recorded by Mr. W. H. Bennett (*Clinical Journal*, February 27th, 1895), that of a woman aged fifty-six, who for some time had vague rheumatic pains in the legs, so much so that on getting into bed she was accustomed to lift the thigh up on to the bed. One night in doing so the femur snapped in two. The case was not cleared up until a thorough examination revealed a previously unsuspected malignant tumour in the breast. In this case, as in mine, a certain amount of union took place, and this union was afterwards dissolved.

Through the kindness of Dr. Bolton I am enabled to show you the femur of the case I have described, together with a lantern plate of the brain, showing the tumour of the dura mater, together with microscopical sections, taken vertically, through the growth and dura mater. These sections show the tumour to be secondary to that of the breast.

DISCUSSION

At the Meeting of the South-eastern Division at Brentwood, 24th April, 1901.

Dr. ROBERT JONES.—We know how difficult it is to avoid fractures of this kind in asylum life, and recognise that there is often an actual softened condition of the bone, that there is an enlargement of the canals, and that there is an excentric atrophy of the bones, as proved by post-mortem examinations. The general public believes that suspicion lies on the nurses and attendants. With all precautions these fractures will occur, and they occur from natural causes.

Dr. J. S. BOLTON.—I quite agree as to the large number of cases there are of fractures of which the attendants know nothing, some of which probably occur before admission to the asylum. I have found cases in which a number of ribs were broken—old fractures which were not discovered during life. It is not uncommon to find such conditions post mortem. It is generally considered that a patient has to be sufficiently old before the bones become so brittle as to break easily. All the cases I have referred to are those of men who were under fifty years of age. I think it is highly important that this matter should be brought before the Association in the way that Dr. Spicer has done, and to formulate a resolution agreeing that these fractures are liable to occur from slight causes, no blame attaching to the medical officers or attendants. I think it ought to

be brought before the medical profession, and to some extent before the general public, that the bones of the insane are in a more fragile condition than the bones of an ordinary person of the same age.

Dr. R. H. STEEN briefly related a case under his observation in which fracture of the femur occurred in a woman aged seventy-eight after she had been placed in bed.

Occasional Notes.

The Annual Meeting at Cork.

THE sixtieth annual meeting of the Medico-Psychological Association was held in Cork at the end of July under the presidency of Dr. Oscar Woods. About forty members assembled to take part in the proceedings, and to share in the true Irish hospitality so generously extended to them. The President had taken every pains to make the meeting a success, and we feel assured that his kindly efforts were highly appreciated by all those who had the good fortune to attend.

The admirable buildings of Queen's College were placed at the disposal of the Association, and the various meetings were therefore accommodated with every comfort and facility. The Royal Yacht Club and the Cork Club honoured the Association by freely opening their doors to our members, and our appreciation of these courtesies was duly recorded in the minutes.

We need not again sing the praises of the pleasant banks of the river Lee and the beauties of the town of Passage, although the bells of Shandon still reverberate in recollection. We need only record that the Cork meeting of 1901 will endure as a very happy memory, from the time of our first excursion to Queenstown till the final parting at Killarney. By a happy inspiration—a lady's, of course—Dr. Woods was completely taken by surprise when Dr. Clouston conveyed to him a silver bowl as a friendly souvenir of the occasion. The usual report of the proceedings is presented in this number of the JOURNAL, and it will be seen that the scientific, business, and social engagements will compare favourably with those of previous years. In fact, the excursion through Bantry to Killarney, lasting for three days, has had no parallel in the