

SYNOPSIS OF THE SYMPTOMS AND FUNCTIONAL DERANGEMENTS PRODUCED BY CEREBRAL TUMOURS, ARRANGED ACCORDING TO THE SEAT OF THE MORBID GROWTH.

1. Tumours of the Convex Surface of the Brain.

Derangement of motion alone	3
" sensation and motion	3
" motion and intellect	1
" sensation, general and special	1
" motion, sensation, general and special	1
" motion, sensation, and intellect	3
" motion, sensation, and digestion	1
Total	13

2. Tumours situated in the Substance of the Hemispheres.

Absence of all symptoms	1
Derangement of sensation	2
" special sense and motion	1
" motion and intellect	2
" motion, general and special sensation	1
" motion, sensation, and intellect	2
" motion, sensation, and digestion	1
Total	10

3. Tumours of the Falx Cerebri.

Absence of symptoms	1
Derangement of motion	1
" motion, intellect, and sensation	1
Total	3

4. Tumours of the Cerebellum.

Derangement of sensation	1
" sensation and motion	2
" sensation, motion, and intellect	1
" general and special sensation and digestion	1
Total	5

5. Tumours situated at the base of the Brain.

Derangement of sensation	1
" motion	4
" sensation, general and special	5
" sensation and motion	3
" sensation and digestion	1
" sensation (general and special) and motion	6
" sensation (general and special) and intellect	1
" sensation, motion, and intellect	2
" sensation, motion, and digestion	1
" general and special sensation, motion, and intellect	7
" general and special sensation, motion, and digestion	3
" sensation, motion, intellect, and digestion	1
Total	35

6. Single Tumours, with remote alteration of Cerebral Tissue.

Absence of symptoms	1
Derangement of sensation and motion	1
" sensation, motion, and intellect	2
" sensation, general and special motion, and intellect	1
Total	5

7. Multiple Tumours.

Absence of symptoms	3
Derangement of sensation	2
" the senses	1
" sensation, general and special	1
" sensation and motion	4
" sensation, motion, and intellect	1
" sensation, motion, and digestion	1
" general and special sensation, motion, and intellect	2
Total	15

TABLE SHOWING THE RELATIVE FREQUENCY OF THE DERANGEMENTS CONSIDERED WITH REFERENCE TO THE SEAT OF THE TUMOUR.

	Total No. of tumours.	General sensation.	Motion.	Special sensation.	Intellect.	Digestion.
Cranial tumours ..	4	2	1	1	—	—
Tumours of convex portion of brain ..	13	9	12	2	4	1
Tumours of deeper parts of brain ..	10	6	7	2	4	1
Tumours of falx cerebri	3	1	2	1	1	—
Tumours of cerebellum	5	5	2	2	1	1
Tumours at base of brain	35	27	27	26	10	6
Single tumours with remote cerebral lesion	5	4	4	1	3	—
Multiple tumours ..	15	11	8	4	3	1
Totals	90	65	63	39	26	10

Cheltenham, Nov. 27th, 1854.

AMPUTATION AT THE SHOULDER-JOINT UNDER THE INFLUENCE OF CHLOROFORM, IN A CASE OF GUN-SHOT WOUND.

By RICHARD HODGES, M.D., F.R.C.S.

IN illustration of the truth of the remarks in a recent leading article, entitled "Chloroform on the Battle-Field", I forward the following brief particulars of a case of amputation at the shoulder-joint, performed on account of a severe gun-shot wound.

CASE. In the early part of the present year, I was requested to see a young man, aged 19 years, who had been shot through the arm by the accidental discharge of his gun. At a period of two hours after the accident, when I first saw him, he was in a state of great depression, and had not recovered from the shock which so severe an accident necessarily occasioned, for he was cold, and apparently lifeless, with a quick and scarcely to be perceived pulse.

On examining the limb, the upper end of the humerus was found extensively comminuted, and splintered to within a short distance of the joint; the soft parts around, and especially on the inner side, frightfully mangled, and with injury to the chief blood-vessels and nerves. Perceiving that amputation was required, the inhalation of chloroform to a moderate extent—twenty drops on a piece of lint—was at once had recourse to, with the effect of increasing the force and frequency of the pulse—acting, in fact, as a stimulant; and when, after a short interval, a sufficient quantity had been administered, and anaesthesia was secured by the occasional addition of ten or twelve drops, before a drachm of the fluid had been used, the operation was performed in the following manner. An incision of three inches in length through the deltoid down to the bone, so as to expose the joint, was first made; the knife was then made to pass obliquely downwards and outwards, for the flap had to be principally formed from the outer and upper part of the shoulder, on account of the injury inflicted on the inner side; the joint was then opened, and the knife made to pass behind the head of the bone, which was readily accomplished, for the muscles were in a state of relaxation, although the loss of the power of throwing the head of the bone out of its socket, from the lower part of the humerus being separated from the upper, rendered this portion of the operation more difficult than if the bone had been intact; the instrument was then made to cut its way out from without inwards, at which period the subclavian artery was compressed by a professional friend. Two arteries only required the ligature—the axillary and another; and these

came away on the tenth and fourteenth days respectively. The wound healed nearly by the first intention, and was quite well and sound in five weeks after the operation. The young man progressed satisfactorily in every respect, and has been in good health ever since.

REMARKS. This surgical case is recorded, not on account of any peculiarity it in itself possesses, but simply with the view of showing that the state of constitutional alarm or shock which succeeds any bad injury need not of necessity preclude the exhibition of chloroform; but that it may be safely and beneficially administered before reaction or a return towards life is thoroughly established. If, then, this be the case, it appears of vital importance to save a person the additional injury which an operation would inflict on the system, and so rescue him from a second shock, which might prove utterly destructive to success by paralysing the already enfeebled vital energies. Common sense would dictate the propriety of not performing any operation before the constitution had recovered itself to a certain degree from the shock it had sustained, without the use of chloroform; but with its valuable aid, it seems that an operation can be safely performed without danger of adding to the depression before complete recovery from a state of alarm is realised!

If, then, this be so, how important is its administration; for chloroform not only prevents pain from being felt, but in effect makes one of the two shocks that would otherwise be communicated to the cerebro-spinal centres.

Rochford, Essex, December 1854.

CASE OF COMPOUND FRACTURE OF THE CRANIUM, WITH DEPRESSION: TREPHINING: RECOVERY.

By GEORGE POUND, Esq.

EMINENT men vary as to the propriety of trephining in cases of simple fracture of the skull, when there are no symptoms of compression. Some (among whom is Pott) advocate the use of the trephine as the rule in fracture of the skull with depression; others hold that no instrumental interference is justifiable, unless there be not slight, but decided, symptoms of compression. In compound fracture, however, it is generally acknowledged that it is best to trephine at once, and not to wait till symptoms of danger appear. In the following case of compound fracture of the skull with depression, no symptoms of compression were present at first, and only very slight symptoms afterwards; there was no delay, however, in the performance of the operation; and to this, and to the youth and natural vigour of the patient, I attribute the favourable progress and result of the case.

Mr. Bransby Cooper advocates a different practice, and says, "that nothing would induce him to use the trephine, whatever may be the extent of the injury to the skull, unless symptoms of compression, which had resisted the administration of strict antiphlogistic remedies, were present."

CASE. G. T., aged 14 years, a carter boy, was at plough on September 25th, 1854, when the horses, taking fright, knocked him down, and one of them trod on his head. The ploughshare was tilted in just sufficient time to enable it to pass over him, without inflicting any more serious injury than that of nearly cutting off his right ear, which merely hung by the fold of skin which connects the external ear with the back of the head. I was sent for to him as he lay in the open field; his head and face were covered with blood; and I found, in addition to the injury just described to his ear, that he had received a large wound over and to the outer side of the right eye. The boy was quite conscious, and able to get up and help himself into a cart, which, in the mean time, had been prepared to carry him home. I did not examine the wound minutely at the time; but as he would be obliged to pass my residence on his way home, I directed that they should stop and have his head properly examined and dressed. This was done, and

a great deal of coagulated blood being washed away from the wound, I discovered that an extensive fracture existed, which corresponded to the wound in the skin, above and to the outer side of the right eye and extending upwards towards and involving the temporal ridge of the os frontis (a few fibres of the right temporal muscle being lacerated and torn from their origin), and downwards towards the external angular process. There was considerable depression, but no loose fragments. The lad was still quite conscious, and the only symptom of compression was, that there existed a greater degree of dilatation of the pupil of the eye of the same side, and its not contracting so readily by the approximation of a lighted candle. I now had him conveyed home, and promised to follow him, when I should make up my mind as to the course of treatment I should pursue. He had just arrived at home when he had, I was informed, a convulsion; and a messenger was dispatched to hasten my arrival. I lost no time, but found him recovered, quite conscious; the pupils of both eyes much dilated; a strong tendency to sleep; somewhat heavy breathing; with a pulse 98 per minute. I had given him a dose of aperient mixture before he left the surgery. Under these circumstances, I thought the skull had better be trephined at once; and having sent for and requested the assistance of my friend, Dr. Foster of Hartly Row (for whose kind assistance and able judgment I feel much indebted), the operation was performed four hours after the accident had occurred.

The front of the scalp was shaved, and the original wound having been a little enlarged, I applied the trephine to the upper part of the fracture, in such a manner as to take out about three quarters of a circle of uninjured bone; this done, I was enabled to introduce the elevator under one fragment, which I removed entirely. The lower fragment I elevated into its place. Dr. Foster concurring with me as to the importance, if possible, of obtaining "union by the first intention", and the wound being now a very large one, and "gaping" considerably, I applied two sutures, a few strips of adhesive plaster, and a bandage. The head was kept elevated; and the aperient given in the morning not having acted, a dose of calomel and jalap was given. Pulse 90.

The same day, 8 P.M. The bowels had acted three or four times; the pupils were less contracted; and contracted still more on the application of light; but the right not so perfectly as the left. There was no headache; the skin was hot and dry; the pulse was 98, and strong. I bled him freely, and ordered him a grain of calomel every four hours.

September 27th. He was slightly under the influence of mercury.

September 30th. Some portions of the wound had begun to unite, but others did not show much disposition to do so; and on pressure being made around, matter issued freely. I did not feel very sanguine about "union by the first intention". Water dressing was substituted, and from that time the healing process progressed very favourably.

About the middle of October, the granulation assumed a very "fungoid" appearance, which led me to prognosticate the exfoliation of some portion of the bone which was elevated; and in this I was confirmed about a fortnight afterwards, by a few pieces of bone protruding from the wound, which were removed by the forceps. By this time the wound is all but healed.

REMARKS. The paramount importance of the injury to the skull has seemed to throw the history of the injury to the ear into the shade. As I said before, it was very nearly severed from the head. I had reinstated it, however, in its former position when the boy was at the surgery, and kept it there by a suture, and fold or two of flannel, to maintain its temperature. The lobe, however, sloughed off. The meatus auditorius was nearly obliterated, but was recovered partially. The organ, at all events, answers its purpose now very well.

Odiham, Hants, Dec. 11th, 1854.