case to nature, or make a further effort after dividing the tendon of the peroneus longus muscle by subcutaneous section at the ankle? I am inclined to say, leave the case to nature, and withhold operative interference for this reason—that I believe it is not the muscular contraction alone, as I have stated, but the locking of the metatarsal bones in the cavity of the tarsal arch also, which prevents reduction.

Finally, we come to the signs diagnostic of this dislocation. The foot is shortened three-fourths of an inch or more, curved inwards, and at the base of the great toe broader than its fellow by an inch. The instep stands out sharply defined, with a sudden angular prominence and marked deficiency in front. The arch of the foot on its inner border is preserved, but the centre of the sole is occupied by the tarsal extremities of the displaced metatarsal bones.

The characters of this injury are very striking, and clearly indicate the nature of the accident, and, as has been stated by Professor Smith, are so marked that it is not likely to be confounded with any other injury of the parts. In describing dislocation of the metatarsus upwards, he says, “there is, it is true, a remarkable foreshortening of the foot, and the foot is greatly deformed, but the relations which the bones composing the ankle-joint bear to each other are undisturbed. There is no elongation of the heel, as in displacement of the tibia forwards; the foot, in front of the ankle-joint, is shortened to the extent of an inch or more, but the heel preserves its natural relation to the bones of the leg.”

ART. VI.—*Remarks on some uncommon Forms of Tetanus.* By WILLIAM S. LITTLE, M. B., L. R. C. S. I.; Surgeon to the Sligo County Infirmary and Gaol, &c.

IN the following observations I have no intention of introducing to the notice of the profession either new views of the affection described, or suggesting novel modes of treatment; I think the cases deserving of a place in the archives of our science simply as “Curiosities of Surgical Practice,” and as hitherto unobserved, or at least undescribed, phases of morbid action. To follow nature in her eccentricities and irregularities, and to narrowly observe her deviations from the ordinary course of diseased manifestations, may be looked upon rather as an interesting and curious than a useful or practical study. But I think it cannot be denied, that in the hands of accurate observers and subtle reasoners, such studies

have over and over again been made subservient to practical purposes, and thrown a very useful light on some obscure subjects of every-day occurrence and interest. I do not pretend to say that I have derived any such benefit myself from them, and honestly confess, that an unlimited confidence in the reparative powers of nature has been almost the sole result of my experience in the following and many similar, though less striking, cases.

CASE I.—*Anomalous Case of Traumatic Tetanus.*—Catherine Gannon, aged 22, was admitted into the Sligo County Infirmary, January 1st, 1851. She is a married woman, seven months pregnant of her second child; has hitherto been remarkably healthy. On the 13th of December, while stooping to brush her shoe, a dog upset a loaded gun standing against the kitchen wall, which, going off, discharged (she stated) a full charge of snipe-shot, wounding the upper part of the left thigh, external aspect, near the insertion of the tensor vaginæ femoris muscle, and the left mamma in two places. She was seen by Dr. Vernon, of Tubbercurry Dispensary, under whose care, until the supervention of the tetanic symptoms, the wounds progressed most favourably.

On Christmas and the following day, she felt her teeth a little sore, and on Sunday, the 28th, first perceived the muscles on the back of the neck rigid, and a sense of stiffness and difficulty in opening the mouth; the trismus has gradually increased since, and at present the teeth can be separated only to the extent of a quarter of an inch. She has no difficulty of deglutition, no sense of constriction of throat or œsophagus, *no pain anywhere*; the left shoulder joint is very stiff; abduction of the arm impossible, and the corresponding deltoid muscle and the muscles on the back of the neck alone affected with well-marked tetanic rigidity; the tetanic countenance slightly, but very sensibly marked; appetite good, but can only eat slops; bowels regular; skin cool, but very harsh and dry; pulse 80; *feels in perfect health*. Half a drachm of mercurial ointment was ordered to be rubbed in three times a day, and she was directed to take a table-spoonful of a diaphoretic mixture every third hour.

Jan. 2nd. She has sweated considerably, and for the first time since her accident. Bowels not opened since she came in; to have a castor-oil draught, and to continue frictions.

3rd. Bowels opened twice by castor-oil draughts; copious diaphoresis; in other respects as before. To continue frictions and diaphoretic mixture. 10 o'clock P. M. She has com-

plained for the first time of tetanic spasms of both shoulders, and the peculiar præcordial pain (diaphragmatic) of tetanus, which she describes as a sense of crushing of the sternum towards the spine; had once a sense of stiffness, or involuntary extension of both legs; the spasms have attacked her about once an hour since 7 o'clock P. M. Continue frictions, and let her have a draught of forty drops of solution of muriate of morphia, to be repeated in an hour if necessary.

4th. Tetanic spasm ceased at 12 o'clock. She only took one draught; slept well towards morning; tetanic spasms frequently attacking the shoulders and thoracic muscles, not the legs. Tetanic countenance very well marked. Bowels not opened since the night before last. To have a cathartic draught, and afterwards, if requisite, a turpentine injection. Mercurial frictions to be continued. 8 o'clock P. M. Tetanic spasms, but confined to neck, shoulders, and thorax, have just recommenced. Bowels well moved twice. Continue the frictions; to have a draught containing a drachm of solution of muriate of morphia, and repeated in an hour if the spasms become urgent.

5th. Slept well from 12 o'clock at night, the paroxysms having been very severe and frequent up to that hour; the pain of scrobiculus cordis only affects her when sitting up. Continue the frictions; let her have two morphia draughts, to be used as last night, should the spasms supervene.

6th. *Spasms set in exactly at 8 and ceased at 12 o'clock*; were very severe, and occurred at regular intervals of half an hour. Slept well since 12 o'clock. Bowels naturally moved, and without medicine.

7th. As yesterday.

8th. Tetanic paroxysms attacked her at 8 o'clock precisely, and left at 12. Slept well after that hour. Bowels not opened since the day before yesterday. *In full pyalism.* Frictions of mercurial ointment to be omitted; to have a gargle of chloride of soda; and to take some house medicine immediately.

9th and 10th. Sharp paroxysms every twenty minutes or half-hour from 8 till 11; mouth very sore. To have an oil draught and a draught containing a drachm of solution of muriate of morphia at night.

11th. Expresses herself better to-day, having slept well, and had but three spasmodic paroxysms at the same period of the evening and night. Bowels not opened, as the castor-oil draught was omitted by error; to be given now.

12th. Bowels opened by castor-oil; slept pretty well; had five spasmodic attacks last night, but much less severe; can open her mouth a little, but the muscles of the jaw and neck

are still very rigid. The morphia draught to be repeated as before.

13th. No paroxysm for the last twenty-four hours; in other respects as yesterday.

15th. No paroxysms now for three days. Cervical muscles and those of the jaws so relaxed as to permit of her moving her head pretty freely from side to side, and to open her mouth to about half its utmost extent. Tetanic expression much less marked; gums better.

24th. Improving every day since last report. Ptyalism gone; expression natural; general health perfect.

27th. Discharged, by her own desire, cured; child alive and apparently vigorous.

The above case presents many peculiar and interesting features; the very chronic, or, in more correct language, mild nature of the symptoms from the commencement and throughout; the maintenance of perfect general health, appetite, sleep, &c., from the 25th of December to the 13th of January—the respective dates of the first premonitory symptom and the last decided tetanic paroxysm; the prompt and satisfactory manner in which the system responded to the administration of remedies; the bowels answering to mild doses of castor-oil, and full ptyalism following the use of mercurial frictions in seven days; the circumscribed and limited character of the muscular implication; the strictly periodic nature of the paroxysms, coming and going for ten days punctually at 8 and 12, with the regularity of a clock striking the hours; and the pregnant condition apparently unimpressed either by the disease or the treatment, for at the due time the patient was delivered of a remarkably fine child.

The diaphoretic treatment, vigorously pushed for three days after admission, though I was not sure of its compatibility with mercurial frictions, was adopted on the recommendation of the late Professor Colles, the rare practical value of whose every dictum I am daily realizing at the bed-side. On referring to my notes, of which I fortunately possess a copious digest of four successive seasons' lectures, I find under this head the following:—I make no apology for giving the extract in full, as it will be a valuable substitute for any observations which I could make on the subject, and may not prove altogether uninteresting to some of my readers. On January 29, 1835, after disposing of the subject of local preventive treatment of tetanus, he says:—"But we may be further asked, is there any mode of constitutional treatment likely to prevent its occurrence? and here I would likewise reply, 'I think there is.' I

am quite sure that I saw two cases prevented, and the patients saved the infliction of this terrible malady, by the treatment I am about to mention. The first case was that of an old gentleman, who, by a fall down stairs, suffered a compound dislocation of his thumb. I saw him a few days after the accident, while the thumb was yet unreduced, and found him expressing a sense of constriction about the throat, and rigidity of neck, which he imputed to having taken a cold; he had also the tetanic countenance, which I endeavoured yesterday to describe, and which, upon inquiry from his family, I ascertained was not the natural expression of his features. I of course saw the danger, and immediately put him upon the *sudorific plan of treatment*, which happily produced a speedy and profuse diaphoresis, and *the tetanic symptoms declined*; but now, mark! a physician was at the time in attendance by desire, and he said, that as the patient was feeble and old, we should not pursue the treatment any further for fear of *dissipating his juices!* We ceased it, and the premonitory symptoms of tetanus, before mentioned, recurred, even more remarkably than at first; the sudorific plan was again adopted, and happily again relieved the symptoms. The second case was that of a horse-breaker, who, on ringing a young horse, was dragged to the ground and received a severe hurt in his back and loins; there was no external wound (but remember this is not necessary to the occurrence of tetanus); he came to hospital with the premonitory symptoms mentioned in the other case, and was speedily relieved by the diaphoretic treatment vigorously pushed."

I do not know how far I am justified in attributing the mildness of the symptoms in the case I have described to the profuse diaphoresis so early and promptly induced; from the previously harsh and dry character of the skin, it is not quite unfair to infer, viewed in reference to the above extract from Mr. Colles' lectures,—which insists so strongly on the salutary influence upon this disease of copious perspiration,—that it bore no insignificant part in bringing about the happy and unhopedor result.

CASE II.—Patrick Christie, a spare but healthy man, forty-six years of age, a farmer in comfortable circumstances, was admitted into Sligo County Infirmary, on the 14th of August, 1852, having been upset from a market-cart, within five miles of town, at 9 o'clock of the morning of the same day. He met with a very severe compound fracture of the right leg (both bones at about the middle of their shafts), which had received

the whole weight of the overturned cart, fortunately not heavily laden with firkins of butter, between the wheel and the road; the upper portion of the tibia, longitudinally fractured, and the fibula transversely, were protruded on the anterior aspect of the limb; the former for about two inches, the latter for about half an inch, through two distinct lacerated and contused wounds in the soft parts and integuments of considerable extent and depth. He had lost a good deal of blood at the time of the accident; the limb was considerably swollen from the fracture to the ham by ecchymosis, and at the time of admission there was still a free oozing from the wounds. He complained of little or no pain, and presented no symptoms of constitutional shock. The larger lacerated and contused wound, through which the tibia had protruded, was cautiously explored by the finger for portions of loose bone, or foreign bodies, but without finding any; a large quantity of fluid and grumous blood was evacuated by gently rubbing down the leg from the knee to the wound, and a bandage lightly applied to prevent its re-accumulation. It having been found impossible to adjust the fracture by any degree of forcible extension which it was deemed judicious to exert, about an inch of the sharp triangular extremity of the tibia was removed, the limb perfectly adjusted, and a good extension made with the long splint.

Second day. In the morning I was summoned hastily to the hospital at 7 o'clock to see Christie. From an intelligent young man who occupied the next bed I gathered the following particulars:—The patient had passed a restless night, moaning constantly during snatches of disturbed sleep; but when awake, not complaining of pain. At 6 o'clock he had spoken quite sensibly, and given this man a detailed account of his accident; but in half an hour afterwards, the nurse, on entering the ward, found him in a state of great excitement, covered with perspiration, knocking his broken limb about, muttering unintelligibly when left to himself, and, on being roused and questioned, merely replying that he was "very bad," and immediately relapsing into delirium.

His condition when I arrived was as follows:—The whole body was in a state of universal tremor or *frissonnement*; the face and throat were bathed with a copious cold sweat, the rest of the surface cool, dry, and contracted; pulse 110, small and feeble; respiration irregular, unequal, and panting, at intervals calm—precisely like the "cerebral respiration" so well described by Graves as occurring in some forms of fever; pupils contracted

and insensible to stimuli; nevertheless, when shaken and spoken loudly to, he opened his eyes, and *appeared* to fix them with a momentary intelligence, but immediately afterwards became profoundly insensible again; *the jaws were rigidly locked*; the angles of the mouth retracted, exposing the teeth; and the expression decidedly, though faintly, tetanic; the thumbs were flexed firmly on the palms, the fingers on the thumbs, and the fore-arms on the arms, so as to bring both hands close to each other under the chin; every eight or ten minutes, or thereabouts, the tremor ceased, and was replaced by a quasi-tetanic(?) paroxysm of an opisthotonic character, merely indicated by a slow but very forcible extension of the arms, till they lay straight and rigid by the sides, and a jerking back of the head; the sound leg and thigh, during the intervals, were in constant motion of alternate flexion and extension, so that it was impossible to prevent him kicking off the clothes, but during the paroxysms this leg was extended like the upper extremities; the toes of this side were always kept in a rigid state of extension, the tendons being thrown out, like ropes on a strain, on the dorsum of the foot; the muscles on the anterior aspect of the leg alone presenting the state of true permanent tetanic rigidity. The injured limb lay perfectly quiet during the whole period of the disease. Bowels not opened since admission.

My first object being to remove, as far as I possibly could, all source of local irritation, the system of extension was, for the present, abandoned: the long splint removed; the limb laid on a pillow, between two short and light splints, with as little restraint as possible, and the wounds water-dressed; a large cathartic turpentine enema was administered with some difficulty; and, looking upon the cerebral symptoms as those evidently of reflected *irritation*, I felt no hesitation in prescribing a full draught of morphia, henbane, and camphor, which, to my surprise, was freely swallowed in tea-spoonfuls,—a result much favoured by the loss of some teeth; and on external examination of the throat, as the sup was swallowed, I was much pleased to find that the muscles of deglutition were not in the slightest degree implicated in the matter; half a drachm of mercurial ointment was ordered to be rubbed in on the arms and thighs every fourth hour, and the draught to be repeated in two hours if the spasms continued.

Second day, evening. In the same state, save that he presents as well-marked a tetanic countenance as I ever witnessed. The enema had come down unchanged; the spasms had re-

curred very mildly every quarter of an hour; pulse 104; he has had three draughts. Repeat the enema, and continue the draughts and frictions.

Third day, morning. As before; the paroxysms not quite so frequent, and always quieter after the draught; the arms and right leg during the paroxysms still continue to be extended; during the intervals the predominant action of the flexors of the upper extremities, as before described, bring the hands in approximation under the chin; thumbs rigidly locked in the palms; the fingers on the thumbs, and the wrists at right angles with the fore-arms; respiration much quieter. Bowels not opened since admission; pulse 100, regular; has had half an ounce of mercurial ointment rubbed in, and eight draughts, containing in all about five grains of muriate of morphia, half a drachm of extract of henbane, and eight ounces of Murray's fluid camphor. A drop of croton-oil, with six grains of calomel and eight of aromatic powder, made into a linctus with treacle, was smeared on the back of the tongue, as well as could be managed. Continue the draughts and frictions.

Evening. No change, but has had the paroxysms more frequently and violently since 1 o'clock in the afternoon; bowels not opened; pulse 100. Repeat the enema, frictions, and draughts.

Fourth day, morning. Wonderfully better this morning; is conscious, but appears stupid, confounded, and, as the nurse terms it, "bothered;" the trismus so far relaxed as to allow him partially to protrude the tongue, which is white and moist; passes urine involuntarily. Countenance much improved; has had the spasms less frequently and less severely than yesterday, and none since 5 o'clock this morning: still slowly but constantly flexing and extending the left leg and thigh; gums mercurialized; pulse 88, fuller; has had three draughts since last night. Bowels not yet opened. Ordered frictions and draughts. Repeat the linctus and enema.

Evening. Bowels largely opened; two solid, feculent, scybulous, and horribly fetid stools; greatly better; still stupid and wild in his manner; does not complain or speak except addressed; has a look and manner semi-maniacal; trismus still more relaxed; some permanent flexion still of upper extremities; but the spasmodic paroxysms are quite gone, and the left leg at rest; pulse 76, regular, weak, small; a copious and fetid discharge from leg. Let him have chicken-broth and wine.

Fifth day, morning. Greatly better, quite conscious, asks

for his drink and nourishment, and greatly enjoys his wine; has had another large scybalous stool; pulse 76; no spasms since; still passes his urine under him. Omit all medicines; to have wine, broth, and panada.

Sixth day. Had a slight return of the spasms last evening, quieted at once by the draught; a drachm and a half of solution of muriate of morphia, four grains of extract of henbane, and one ounce of Murray's fluid camphor; gums very sore; still suffers from incontinence; pulse 76; appetite increasing.

Seventh day. Is much better to-day; asks for the vessel when he wants to micturate; his wife says he is still "very light in his talk," which, however, has assumed the harmless and rather agreeable shape of joking and laughing with his neighbours and the nurse; says he is "starved," but feels quite well.

Eighth day. Improving.

It will be sufficient to say, that from this period the constitutional affection ceased; and though the patient suffered considerably from profuse and protracted discharge, and, after the healing of the wound, from the supervention of two deep-seated burrowing abscesses of the calf, consequent upon necrotic exfoliations, he was discharged in about four months with a serviceable leg, and is now actively engaged in the laborious pursuits of agricultural life.

The above very remarkable and interesting case I have ventured to class in the category of those anomalously tetanic, and with, I think, good and sufficient reason. On the side of this view may be adduced—1st, the trismus; 2ndly, the slight though decided paroxysms of tetanic spasm of an opisthotonic character, alternating with intervals of tonic spasm, though this latter symptom was of a partial character, confined to the upper extremities, the jaws, and the extensor muscles of the left leg; and 3rdly, the well-marked tetanic countenance, all supervening upon a compound fracture. Against this view may be cited,—the sudden coma and prolonged insensibility; the absence of difficulty of deglutition; and the freedom from tetanic rigidity of the great majority of the voluntary muscles, almost invariably implicated in traumatic tetanus; the equally partial character of the paroxysmal spasms; and lastly, what I believe weighs more than any other consideration with the votaries of superficial diagnosis, the fact of the patient's recovery.

Having studied this peculiar case with the utmost interest and attention from hour to hour, not alone by the feeble light

of my own experience and powers of observation, or vague inductions thence derived, but with all the aid and assistance which I could command from the best authors on the subject, I have been able to arrive at no other conclusion than that it was a veritable case of traumatic tetanus,—however anomalous, irregular, and out of due course, the grouping and progression of its symptoms undoubtedly were. In Travers' excellent and philosophical work on Constitutional Irritation, embracing, as it does, a very complete history of every form and degree of constitutional sympathy with local injury, whether slight or severe, and compendious notices of all the functional derangements of the nervous system consequent on such, illustrated by so many apposite cases, I have sought in vain for a single case, or in the able observations appended to each, for an explanation of the foregoing. We have copious notices of all forms and degrees of sensorial impression, from profound coma to hyper-maniacal delirium or phrensy; and of deranged nervous action, from tremor and partial subsultus, to general, violent, and fatal convulsion, as the effect of reflected cerebral irritation after fractures, lacerations, and surgical operations;—but not one word of persistent trismus, opisthotonic spasm, alternating for five days, or for any shorter period, at intervals of ten and fifteen minutes, with even partial tonic spasm or tetanic rigidity, or the tetanic countenance. This grouping of symptoms, when boldly expressed, and clearly pronounced, is pathognomonic of this strange and inscrutable disease; and however they may sometimes appear to be simulated in hydrophobia and hysteria, belong to no other; and I think it unscientific and absurd to designate them by any other name; because they are associated with other symptoms seldom before observed or never recorded, as the early coma and prolonged insensibility in Christie's case; or because wanting in one or more elements of the generic descriptions found in books,—as the absence of difficult deglutition, of general spasm, and universal rigidity, in the same.

Unfortunately, traumatic tetanus rarely presents itself in a form likely to puzzle the most inexperienced, or to confuse or discredit his diagnosis; nevertheless, there are many such on record. So eminent an authority as Sir Gilbert Blane records a fatal case, in which “the spasms communicated a sensation rather pleasing than otherwise, nor was any pain experienced to the last.” Dr. Moseley, Physician to Chelsea Hospital, who wrote in 1795, and had encountered vast numbers of cases of this disease in the West Indian Islands, confirms Sir G. Blane thus:—“I have known people in the tetanus,

with the sweat running off them from the violent pulling of the muscles, who have, nevertheless, told me that they indeed felt a distress they could not explain, yet they could not say it was actual pain"^a. Sir G. Blane gives the detail of two other cases, in which the tetanus was entirely confined to the side on which the wound was situated, being instances of the pure pleurosthotonos of ancient writers, as Hippocrates, *Ætius*, *Paulus Ægineta*, &c. *Morgagni* gives a similar case of pure lateral tetanus as occurring in his practice, and another in which, after continuing general for four days, the spasms on the morning of the fifth—the day of the patient's death—were confined to the right side. *Moseley*—who disbelieves the existence of partial tetanus, because, in the more violent and rapidly fatal form which this disease assumes in tropical climates, he had never seen such—objects to all such cases of lateral tetanus, that they were probably—though he does not state why—associated with hemiplegia!—being not a very flattering estimate of the acumen of such observers as *Morgagni*, *Blane*, &c., nor one to which my readers are likely to attach much credit. The locking of the thumb in the hand, exactly as in ordinary infantile convulsion, though a symptom I never observed except in *Christie's* case, and one not recorded in books, is oddly enough stated by that acute observer, *Hippocrates*, who has left us so little to improve upon in his symptomatology as “an almost invariable accompaniment of the opisthotonos.”

Surely those anomalous instances of painless and lateral tetanus are quite as much “out of due course” as the two detailed above; yet authors of the highest repute and most extensive experience have not hesitated to recognise them as true tetanus. Hardly any two varieties of the same disease could have presented more dissimilar features than those of *Gannon* and *Christie*, and yet the pathognomonic symptoms—trismus, opisthotonic spasm alternating with partial rigidity, and the tetanic countenance, following wounds—were the common and distinguishing features of each, and in my mind sufficiently pronounced to stamp their unmistakable character.

Having attempted to give as brief an outline of the above cases as was consistent with perspicuity, I shall hazard but one additional observation, namely, as to the curability of acute traumatic tetanus. The preceding present, respectively, fair types, the one of the chronic, the other of the acute form of invasion; in the first case fourteen days intervening between the

^a On the Diseases of Tropical Climates, Third Edition, p. 474.

receipt of the injury and the supervention of tetanic symptoms; in the last but twenty-two hours. There are many instances, not of mere recovery from, but of the *cure of, chronic* traumatic tetanus, particularly in the records of military surgery^a; but from anything I have myself seen, or can collect from books, I believe that fully formed and universal acute traumatic tetanus is uniformly fatal. The rare cases of recovery, few and far between, which sprinkle the pages of our copious periodical literature, or vary the almost invariable details of suffering and death in the works of standard authors, are all either of the chronic form, or of what may be termed imperfect or modified tetanus, of which the two just detailed may be esteemed examples;—the most opposite methods and systems of treatment, from the strictly antiphlogistic to the highly stimulant; from the lancet and starvation to wine and bark; from the cold affusion and cold plunge-bath to hot baths; the diaphoretic, the mercurial, the purgative, the opiate, the anæsthetic, and Indian hemp indications have all had their votaries, their hour of trial, triumph, and contempt; and yet, from the days of Hippocrates to the present, the nature and proper treatment of traumatic tetanus have ever been among the many *questiones vexatæ* of surgical inquiry.

For the prompt and energetic administration of mercury and morphia I confess my predilection, perhaps, on empirical grounds, and certainly without attempting for a moment to solve the knotty point of the *ratio medendi*; early diaphoresis is a treatment only applicable to very mild and chronic forms of invasion, such as Gannon's. No one, surely, in Christie's case would consent to lose time in such efforts. The mercurial and opiate treatments have the high sanction of Sir A. Cooper and of other great men, and possess the invaluable advantage over any other form of internal or constitutional treatment—that in any variety of the disease they can be energetically plied, and their full influence, so far as the disease will permit, be secured, the one by external friction, the other by enema. I have over and over again seen the influence of a full dose of morphia *almost immediately* exercised with manifest and unmistakable benefit on the severity of a tetanic paroxysm. Should we get a case of this disease in its early stage, and before the poison of irritation, so to speak, had seized on every nervous filament, and every muscular fibril, is it too much to assume that we might succeed in arresting its progress and determining what in a few hours would prove universal and

^a See Larrey's Memoirs, Sir G. Blane's Observations; and Sir James Macgrigor, in the Medico-Chirurgical Transactions.

incurable disease, into a chronic and partial form? As respects mercury I shall only observe, that, of many cases of tetanus, I have seen but three recover, and in all three the patients were fully and severely mercurialized. Your cut-and-thrust surgical dialecticians will say, "They did not recover because they were mercurialized, but they became mercurialized because they recovered,"—a species of logic which we may safely pass without notice. Strict attention to the bowels must be observed all through, and an occasional brisk mercurial purgative, with turpentine enemata, appear to me the most suitable means of acting on, and carrying off rapidly, depraved and irritating secretions, as recommended by Mr. Abernethy. I would also suggest the necessity of sustaining the patient's strength *from the starting-post*. I am sure that I have seen more than one instance in which due attention to this point was overlooked in the anxiety to push vigorously the medicinal treatment of the case. Constitutional irritability, without a high degree of which we cannot have tetanus, is the product of deficient power; according to Hunter's definition it is "an increased disposition to act, without the power to act with," or "overaction, relative to the strength of the parts." Every hour that the disease lasts is fatally exhausting this already deficient power; and hence there are, I should say, few cases (if one at all) in which chicken-broth, beef-tea, and wine, may not be from the first judiciously exhibited.

ART. VII.—*Selections from the Unpublished Manuscripts of the late ABRAHAM COLLES, Professor of Surgery to the Royal College of Surgeons of Ireland.* Edited by his Son, WILLIAM COLLES, F.R.C.S.I., Surgeon to Steevens' Hospital, &c.

(Continued from Vol. XVI. p. 299.)

NO. 4.—A PECULIAR DISEASE OF THE RECTUM.

IN many of my father's earlier note-books I find cases under the heading of "The Disease of the Rectum;" of these there are records of about twenty, and in his miscellaneous papers is an *essay*, of which I cannot find the commencement, but which was evidently intended to have been read at some medical society, there is no proof however that this intention was ever carried into effect, nor do I find any notice which would induce me to conclude that it had been published. I therefore give it now, imperfect as it is, subjoining a case illustrative of the disease; this will suffice to give an idea of his view of the affection. In