gerous, and I predict, without any hesitation, that fatal accidents must inevitably follow upon it. It is far better to use chloroform from the beginning of an operation to the end of it, than to begin with a lighter anæsthetic, push that to the degree of annihilating sensibility, and then to cap the proceeding by adding a dose of the heavier agent. A horse at its fullest speed in a race might possibly reach the goal successfully if, by some sleight of hand, the jockey on its back could be suddenly weighted; but, as a rule, the horse, already well-nigh exhausted, would begin to flag and would go down under the additional burthen.

I have written these lines about the bichloride without any desire to praise it because it is an introduction of my own. It is naturally gratifying to observe that a theory of action, based on knowledge of physical laws, proves correct in practice, as the theory relative to the action of bichloride of methylene has proved; but men who are absorbed in the study of natural phenomena, as I am, soon die daily to their work, and when once they have placed a thought or practice before the world, treat it as belonging entirely to the dead. To me, bichloride of methylene is the same as to others; and, although I know it has many advantages, I am so far open to its faults, that if, to-morrow, I could find an equally manageable and effective volatile anæsthetic, out of the chlorine family altogether, I should throw over the bichloride without a moment's hesitation, feeling the act a duty. At the same time, while it retains its place in practice, it is just to remove any prejudices against the bichloride of methylene, resting on imperfect perception of its properties and action.

POSTSCRIPT.—The above paper was sent to the JOURNAL in September last; and since that time a case of death has occurred at the Charing Cross Hospital during the administration of the bichloride of methylene. The facts of that case, ably and faithfully reported by Mr. Peter Marshall, suggest to my mind no modification of what I have written, since the administration of the narcotic and the proposed operation in the case referred to were planned almost against hope, to save a man who was sinking from exhaustion, and whose breathing was mechanically obstructed by cancerous growth. I do not see that any general anæsthetic can ever be discovered to meet successfully a case of this extreme character. It is a case in treating which science can only be relieved from the chance of discredit by the firm refusal of her ministers to accept in her name, under the blessed, even though unreasonable, impulse of human kindness, an useless responsibility. In this position, we can put ourselves only in the place of the sufferer, greeting the impulse as the noblest gift that we could ask for or receive, and accepting ourselves (as the patient in the case of which we are speaking did) the responsibility of the attempt made to save us from a death inevitable, imminent, and, in its threatened natural aspect, far more cruel and terrible than if it came from the effort to avert it.

CASES OF HERPES CONTAGIOSUS (?).

By J. BRENDON CURGENVEN, M.R.C.S., etc.

MATTHEW PAINE, aged 22, a coachman, married, of sober habits, inhabiting a newly built stable in a healthy situation, was in good health until October 13th, when he felt his throat sore; he had shivering, and severe vomiting of water and mucus, which was described by him to be "as green as grass".

Oct. 14th. I first saw him. He complained of great muscular soreness over the trunk and limbs. His skin was hot; face flushed; pulse over 90; tongue red and clean. There was a white patch of herpes on each tonsil; redness and swelling of the fauces; and the submaxillary glands near were swollen and tender. Deglutition was difficult and painful.

Oct. 16th (fourth day). The tonsils and the mucous membrane of the pharynx were more swollen, and there was greater difficulty in deglutition. The pimples on the tonsils had coalesced into uniform white patches, yet they were not more extended in circumference. Other patches had appeared on the uvula and the upper and under surfaces of the tongue, which organ continued red.

Oct. 17th (fifth day). He slept very little last night, being constantly disturbed by difficulty of breathing and accumulation of large quantities of thick tenacious mucus in the throat; and towards morning he became delirious. He discharged, by retching, about six ounces of thick jelly-like mucus, that adhered firmly to the bottom of the basin. The inflammation—possibly the herpetic eruption—had extended down the œsophagus and into the larynx; for he was now quite hoarse, his voice being not above a whisper. There had appeared, since the previous day, clusters of herpetic vesicles at the corners of the mouth, at the orifices of the nostrils, on the eyelids near the inner canthi, on the left

side of the scrotum and prepuce, with single vesicles scattered over the thighs, forehead, and backs of the hands. He had partial loss of power in his hands and wrists; he could not close his hands, nor straighten his wrists. The temperature was high; pulse 98; bowels regular.

Oct. 19th. He had a better night, but continued to bring up a quantity of thick mucus after each dose of the medicine (chlorate of potash and hydrochloric acid). There was a patch of vesicles on each side of the neck, immediately over the tonsils: these, about a dozen in each patch, had not coalesced, but the vesicles of all the other patches had, forming one scab for each group; that on the scrotum rubbed off, leaving a raw surface. His hands and wrists had recovered their power, which might or might not be due to a blister applied between his shoulders on the previous night.—His wife complained of lassitude, slight shivering, and sore throat. She had a patch of herpes on the left tonsil; the tongue was slightly coated; pulse 84; skin hot.

Oct. 20th. The husband's symptoms were improving; he could swallow better, and took a little bread in his beef-tea. The discharge of mucus was less.—The wife had a patch coming on the right tonsil.—His mother, who had sat up two nights with him, and had been with him more or less from the commencement of his illness, had a patch on her right tonsil.

Oct. 21st. The husband was better; temperature by thermometer, 100.6.—His wife vomited, yesterday and to-day, a watery fluid. She had muscular soreness, heat of skin, pulse 92, and aching of the hands.—His mother had muscular soreness and aching pains in the hands. A patch had appeared on the left tonsil. Tongue slightly coated; pulse 90.

Oct. 22nd. The wife had several red spots on her hands last night ("herpes sine vesiculis," Wilson), only two or three of which on the left hand gave rise to vesicles.—The disintegrated mucous membrane over the spots of herpes on the husband's tonsils and tongue had been cast off, leaving ulcers with well defined and healing margins.

Oct. 26th (fourteenth day). The husband was still hoarse. The wife and mother were almost well, their throats being only slightly sore; the herpes was gone. The husband's voice gradually returned during the next few days. The cuticle is peeling from the hands and feet.

Oct. 27th. The husband's brother was attacked with shivering, sore throat, and fever. He had a group of white pimples on each tonsil. Tongue coated; pulse 102; skin hot and perspiring.

Oct. 28th. The pimples were less perceptible; pulse 120. He had cramp in his feet occasionally.

Oct. 29th. The eruption on the tonsils was gone; the tongue was coated and swollen. He had a troublesome cough last night; no chest-symptoms. He had an inflamed gland in the right axilla.

Nov. 1st. The symptoms were, copious perspiration, occasional cough, and cramp in the feet. Pulse 84.

Second Group of Cases.—Oct. 22nd. On visiting a family that I was attending, I found the housemaid with a sore throat, which, on examination, presented a patch of herpes on the left tonsil, and two or three pimples on the right. She had had shivering and muscular soreness, but no sickness. The cook had just recovered from a sore throat that commenced seven days previously. The two servants slept in the same bed.

Oct. 23rd. Last night, the mistress was taken with shivering and sore throat. The tonsils and fauces appeared red and swollen, but there were no pimples.

Oct. 24th. She was sick twice last night. There were two pimples on the left tonsil.

Oct. 25th. She felt much better; the pimples were gone, and the redness was less.—The patches on the housemaid's tonsils had gone, and she felt better.

REMARKS.—It is evident that these cases are cases of herpes in which the whole system is involved. In this, they differ from those local and milder forms with which every one is well acquainted. The disease differs also, in that it is contagious, as far as these two groups of cases permit an opinion. But herpes may be said to be a local neurosis, and cannot appear as a general febrile neurosis. I would ask, Do we not meet with hemicrania and other kindred local neuroses? and can we say that these are in no way produced by a similar disturbance of nerve-force as those general febrile neuroses, ague and remittent fever?

Herpes has been divided by Willan, Hebra, and Wilson, into herpes labialis, nasalis, and præputialis; herpes zoster, iris, and circinatus. I can find no mention by these authors of any form of the disease like the one I have described, in which all the species of the first class were combined in one case. Hebra remarks, that "an herpetic affection of the skin of the face, the red parts of the lips, and the mucous membrane of the mouth, sometimes occurs in perfectly healthy subjects, being then the only morbid condition which is to be detected; but, in

other instances, such an eruption precedes or accompanies the outbreak of a febrile or non-febrile complaint." Erasmus Wilson says, at page 213: "Herpes labialis is sometimes associated with aphthæ of the mouth."

It is quite clear that these writers observed the association of herpes in the mouth and on the face; but I do not think that their descriptions convey the idea that they ever witnessed such a train of symptoms as occurred in the first case above related. Nor is it correct to call the white spots or pimples aphthæ; the two are widely different. Hebra says: "Herpes of the anterior part of the oral cavity, and especially of the gums and tongue, may easily be confounded with aphthæ."

The question naturally arises, Is this disease the same as the "foot-and-mouth disease" in cattle? and is the poison conveyed through the medium of the milk? I do not believe in its spontaneous origin through the influence of season or weather, or that it was derived through the medium of the air.

Neither of my patients had been near any cattle. The first two patients had their milk from one dairy; and I was able to examine all the cows in the dairyman's shed, in company with Dr. Hardwicke, and again with Dr. Buchanan, without detecting any disease amongst them. But, during the last four months, nearly twenty cows had been sold, which were said to have fattened and lost their milk. It would, I think, be too much to expect a dairyman to tell the whole truth in answer to inquiries such as ours. We are, consequently, restricted to a comparison of symptoms; and, on making this, it will be seen that a close similarity exists between the case first related and others that are known to have suffered from direct contagion on the one hand, and the disease as it appears in cattle on the other. The disease is not an eczema, nor does it in its symptoms in any way resemble that form of disease. It is not aphtha, because that term is now restricted to the fungoid disease found in infants and in old and diseased subjects; but it strongly resembles herpes in symptoms, course, and duration. The vesicles are the exact counterpart of herpetic vesicles; and the patches appear on all the spots usually subjected to attacks of the ordinary forms of herpes. As an appropriate name, therefore, for the disease, I would suggest "herpes epizooticus contagiosus".

On referring to the literature of the subject, I find that, during the prevalence of all the epidemics of what has been called epizootic aphtha on the Continent and in England during the last two hundred years, the extension of the disease to the population of the affected districts has been recorded.

It becomes a matter of great interest to the profession, to the Government, and to the public, that all cases bearing upon this subject should be carefully recorded; that, by an accumulation of facts, the question may be decided, whether or not the "foot-and-mouth disease" can be conveyed to the human subject. It must be borne in mind that every person would not be susceptible in the same degree to the poison; and that the disease is, in all probability, contagious only through the mucous secretion from the mouth, and the products of the vesicles in the mouth and on the udder. Milk free from the latter may not be injurious.

CLINICAL MEMORANDA.

[Under this head, we shall publish from time to time, as materials accumulate, short records of remarkable cases in practice which are sufficiently rare, interesting, or instructive, to deserve record, but do not call for lengthened statement or comment. Brevity and point should be the valuable characteristics of cases forwarded for this column.]

PSEUDO-MEMBRANOUS STOMATITIS PRODUCED BY THE MILK OF A COW WITH INFLAMED UDDER.

By JOHN FAGAN, F.Q.Q.C.P.I., Belfast.

ON the 12th January, 1869, I was called to see Mrs. C.'s child, a healthy boy about two years old. His lips were much swollen, and there were a number of aphthous ulcerations on their inner aspect, and on the roof of the mouth. The tongue, all but the extreme tip, which was preternaturally red, was covered with a creamy deposit. The sub-maxillary glands were slightly swollen. There was some dribbling from the mouth; the pulse was accelerated; the skin hot, and child suffering from great thirst. On the 13th and 14th, there was an exacerbation of all the symptoms; on the 15th, he began to show signs of improvement; and on the 18th, appeared quite well.

The mouth was frequently sponged out with a solution of chlorate of potash, borax, honey, and rose-water. An alterative dose was given, followed by quinine, three times a day.

On inquiring as to what was likely to be the cause, I was told by the

mother that, for some time past, she noticed a sediment of a dirty appearance in the bottom of the vessel where the milk was kept, and she began to think that might be the cause. On putting some of the suspected sediment under the microscope, corpuscles of both pus and blood appeared in abundance. On making further inquiries, it was found that the cow that gave the milk had suffered from inflammation of the udder, which had at that time formed an abscess.

The above case, although in no way connected with the "foot-and-mouth exanthem", shows the bad results that may follow the drinking of impure milk, and the necessity of a careful selection, by parents and nurses, of that aliment which is of such vital importance during the periods of infancy and childhood.

MUSEUM NOTES.

RARITY OF OSSEOUS UNION AFTER TRANSVERSE FRACTURE OF THE PATELLA.

CAN any one inform us where a specimen of a patella, fractured transversely and united by bone, is to be found? We shall not accept the proof unless the bone have been cut across, and the actual condition of the uniting medium demonstrated. Its value will also be much diminished if the history of the accident be not forthcoming, since it will then be doubtful whether separation had ever occurred. We have searched through many museums without finding a single specimen proving bony union after transverse fracture with separation. There is one in the London Hospital Museum, in which it is quite close and firm; but the section shows that it is not bony. Specimens of comminuted fracture are of no value, because in them very often there is no separation. There is one such shewing partial bony union, in King's College Hospital, No. 1125.

STARRED FRACTURE OF THE PATELLA.

WE could find but two specimens of fracture of the patella in the Bristol Infirmary Museum. One of these showed a double transverse fracture, the second having occurred some years after the first (*δ. 2*). The other specimen was an interesting example of a starred fracture, and had been caused, as usual, by direct violence. Its subject, a woman aged 28, had fallen from a window, and was admitted, on account of her injuries, under the care of Mr. Lowe (in 1832). Probably she lived a very short time. The patella has been macerated, and all soft parts removed. It is crossed in various directions by lines of fracture, breaking it into several separate fragments, the larger of which show fissures. One line of fracture is obliquely vertical, and at the upper part of this two others pass laterally. There is no statement of the condition presented during life.

CASES OF RECOVERY AFTER FRACTURE OF THE SPINE.

IN the Leeds Museum is a specimen of union after fracture of the spine at the second lumbar vertebra. The patient died of typhus fever, under the late Dr. Hardwick's care, twelve years after his accident. For the accident, he had been treated by Mr. Teale in the Infirmary. His injury was from a beam falling across his back; and he had, when admitted into the Infirmary, all the signs of fracture. He was unable to move his legs, but sensation was perfect. His urine was drawn off for three weeks. At the end of three weeks, he became able to pass his urine without assistance, and could walk across the floor by the aid of a stick. He was discharged recovered six weeks after the accident. A projection of the spinous process of the first lumbar vertebra could be distinctly felt during his first illness, and also at the time of his death.

The specimen shows an obtuse bend forwards at the upper lumbar region. The body of the second lumbar vertebra has been crushed, and its anterior half is not more than half its natural thickness. Ankylosis has occurred between the laminae of the first and second; and from the crushed body of the second, lips of bone have been developed.

The two following cases, which we abstract from the pages of the *Liverpool Medical and Surgical Reports*, may, with the above, be of interest to those who advocate trephining of the spine after fracture. The cases are recorded by Mr. Manifold.

A sailor fell from the rigging, and had a fracture, with displacement, in the lower dorsal region. He had complete paralysis of the lower extremities, and required the catheter for three months. Fourteen months after the accident, he could walk about with the aid of a stick, and had control over his sphincters.

Another sailor fell sixty feet; had a fracture, with displacement, in