knew him, and expressing my apprehension as to the nature of his case.

On the following morning (June 1st), he called on me, accompanied by his friend. He had taken both doses of morphia, and had passed a comfortable night's sleep; he said the pain in his body and limbs was relieved, but that he could not open his mouth sufficient to admit his little finger, and that he had a constant inclination to sneeze, although unable to do so.

Four days previously, while in a state of drunkenness, he was pulling about and teasing a black retriever dog, which bit him on the wrist of the left hand, from which the thumb had been amputated twenty years previously. The wound inflicted by the bite was the size of a small barleycorn, apparently quite superficial, having no signs of inflammation about it, and no pain attached to it. He showed considerable signs of nervous anxiety, and expressed his apprehension that the bite of the dog would cause his death; or, as he expressed it, "would send him up the orchard." His pulse was 110, weak and compressible; and he complained of thirst. I ordered him a saline mixture, with fifteen minims of chloric ether to each dose, and told him to keep in bed.

Three hours afterwards, I visited him; and on giving him a teaspoonful of liquid, which he swallowed hastily and with great difficulty, I found it produced violent and distressing spasms, as he had predicted; and, although with considerable effort he was able to open his mouth to the extent of half an inch, the jaw immediately closed with a snap, and became rigid. His pulse was now 140, full, but easily compressed; and he complained of slight pain and tightness across the epigastrium. I allowed him to have a glass of porter, which he greatly desired, and ordered as much beef-tea and milk to be administered to him as he could swallow.

In the evening, he appeared more calm and composed. The trismus continued the same; and there was slight tetanic rigidity of the muscles of the neck. He had taken about half a pint of beef-tea, half a pint of milk, and a glass of porter. The splashing of water before him produced no spasm; and he could even dabble his hands in water without experiencing any uneasiness.

Throughout the following day (June 2nd), the symptoms continued precisely the same; and he took a fair amount of nourishment, but with extreme difficulty. I saw him for the last time at 9 o'clock at night, when he could open his jaw to the extent of half an inch, and continue to keep it open without assistance; but, on attempting to swallow, the spasm was more violent than I had before witnessed; his countenance looked wild and expressive of horror; and he said he felt convinced he should soon die, but was quite quiet in his manner, and perfectly sensible. His pulse had fallen to 70, and was very weak and small.

I ordered him to have small quantities of beef-tea frequently given to him, unless he felt inclined to sleep. From 11 o'clock that night until 5 o'clock the following morning, he slept comparatively calm, when he awoke apparently refreshed, could open his mouth wider, and speak plainer, but could not be persuaded to attempt to swallow anything; about an hour afterwards, he heaved two or three deep sighs, and expired calmly and without spasm.

Remarks. Although I am inclined to believe that this was a case of hydrophobia, I am struck with the apparent mildness of the symptoms throughout, in comparison with other cases of which I have read and heard. The point, however, which I wish particularly to bring under notice is, that the dog was perfectly healthy when he inflicted the wound, and has continued to be so up to the present time: a circumstance in connection with hydrophobia which, I believe, is not generally admitted, although it tends to confirm my previous opinion, that it is possible for this malady to supervene on the bite of a dog, even though he be perfectly free from rabies, especially if the wound is inflicted at a time when the animal has been excited to anger. I am also inclined to think that the bite, being contingent to the cicatrix of the amputated thumb, may have acted as a predisposing cause in producing the disease. I may mention, that I could not learn that he had ever been bitten by a dog before; and although the disease set in so shortly after the infliction of the wound, which is at variance with previously recorded cases, still the *primâ facie* evidence is such, as must, in my opinion, lead to the conclusion, that the wound inflicted by the dog was the sole and only cause of the symptoms and death; but whether the case be looked upon as one of pure "rabies canina", or simply as one of tetanus, I will leave to the judgment of others.

PERFORATING ULCER OF THE THROAT.

By Thomas Williams, M.D., F.R.S., Physician to the Swansea Infirmary.

Twenty of these cases have fallen under my notice during the last twelve years. Fourteen occurred in adults, and six in young people below fifteen. These and others are pretty equally distributed as regards sex. In the majority (in fifteen out of the twenty), it could be proved that venereal disease in some of its forms had preceded the attack; in one the point was doubtful; in four (one in the younger patients, and three in the grown up) it was certain that no syphilitic disease had ever been contracted.

To these cases no reference is made in standard works on medicine and surgery. Dr. Gibb, in his book on the throat, scarcely alludes to the subject. Dr. Risdon Bennett, in an excellent lecture (*Medical Times and Gazette*, Jan. 11, 1862), relates a case which presents some points of analogy to those which will be related in this paper. They are by no means of infrequent occurrence. It is common, in moving through society, to meet with persons in no small number who seem to have undergone this form of disease. The voice is nasal, and the cough has a cracked, coarse sound. Previously to any discussion as to the causes and nature of these cases, it may be expedient to relate a few examples.

Case i. In 1849, a gentleman, aged 30, who had "once had chancres", became the subject of redness of the soft palate. Little pain was felt. In forty-eight hours an ulcer appeared at the root of the uvula. The nitrate of silver was freely applied, and chlorate of potash was given. In two or three days the uvula had been completely cut through at the base, and a rent had been made in the velum, and the voice had become quite nasal. He now went to London, and was treated by a distinguished hospital surgeon. The ulceration was arrested, the surfaces healed; but the voice never regained its natural tone. [For the particulars of the above case I am indebted to a medical friend.]

Case ii. Shortly after the above instance, a clergyman called upon me, complaining of his throat. The soft palate was red, slightly painful; the tonsils were not swelled; he never had contracted any form of venereal disease. A purge was prescribed. In four days, when he came again, it was at once evident that the soft palate, during his absence, had been completely perforated; the handle of the pen could be pushed up through the orifice as high as the roof of the pharynx. The sides of the perforation were touched with pure nitric acid; chlorate of potash, and the iodide of potassium in small doses, were ordered. In a few days after, the "hole" had acquired the dimensions of a sixpenny piece; the ulceration ceased, and the parts healed. Ever since, the voice has remained very distinctly nasal in quality; which is removed only by plugging up the "hole" by some soft substance.

Case iii. In 1853, a man, aged 25, who had been for

some years treated for several forms of syphilis, applied at the Infirmary, complaining of the roof of his mouth. It was lividly red, slightly painful on touch. The colour was most intense and bright in the centre of the affected area; at which point a spot of dirty white hue, bounded by shaggy, rough edges, was clearly discernible. Nothing decisive was done. He came again in a week. It was now evident that a complete perforation through the hard palate into the nasal fossa had taken place. Knowing that the patient was the victim of syphilis, I ordered iodide of potassium in full doses. The effects were immediate and remarkable. The red hue disappeared; the sides of the perforation rapidly healed. The voice could be restored to its natural quality by a soft plug in the hole.

Case iv. A married lady, aged 30, presented herself, and said that she had been suffering from a sore throat for about a week. When examined, an elongated rent (hole) was instantly observed in the right anterior pillar of the fauces, leaving a piece (like a rope) undivided at the inner border. She said that she was sure it was getting larger "every hour". The surrounding surface was red, but little painful; suffered little in swallowing; and the voice was only triflingly affected. Eight grains of the iodide of potassium three times a day were immediately given; no local applications were used. No proof could be extracted from her evidence that she had ever suffered in any way from syphilis. She recovered rapidly, and has continued well for several years; the perforation remaining.

Case v. A young girl, aged 13, was brought to the Infirmary by her mother. The throat was "bad". The catamenia had appeared; but she was pallid and chlorotic in aspect. On examination, it was at once remarked that the soft velum had been perforated about the median line, at the line of its junction with the hard palate. The handle of the scalpel could be passed up through the "hole" into the roof of the pharynx. The edges were phagedænic, the surrounding surface red; voice altered; swallowing painful. It was evident that the perforating process was rapidly extending. She was put upon the iodide of potassium, and the diseased action almost immediately ceased. She is now as she was four years ago, with a large hole in the soft palate, speaking through her nose, and obliged to be careful in swallowing.

All the others are almost precisely of the same character. In three the perforation took place at the roof in the median line through the bone into the nasal cavity; in seven it was seated on the soft palate and pillars; in one instance only has been observed on the posterior pillar; in several on the anterior; most frequently on the velum.

From this category, all excavating or ordinary phagedænic ulcers are excluded. To this last class Dr. Bennett's case would belong, and many others observed by myself. Of late years, in my practice, these examples of perforating ulcer have done little more harm than that of committing the act of perforation. Formerly, however, before the right treatment had been clearly discovered, extensive destruction of parts, grave injury to the voice, the breathing, and the deglutition, were frequent consequences. In several recent instances, the author is quite assured that he has prevented perforation; in several he has been able to limit it to the smallest extent; in all, to arrest it at once, and that with perfect certainty.

It is probable that these perforating ulcers are not far removed from the phagedænic, or excavating ulcerations, which are not unfrequently met with in the pharynx, larynx, and tonsils. From the latter, however, they differ in several respects. They undergo a *spontaneous cure* (several cases might be adduced to prove this point) after the perforation has been made; as if by slackened tension. They are accompanied by less pain; they are more immediately and directly amenable to iodide of potassium. But, like the latter, they occur most frequently in those whose systems have been syphilitically tainted; and, like the latter, they occur in those who may have inherited, but never have contracted syphilis. Unlike the latter, they are not controlled in the slightest degree by any of the preparations of mercury. Mercury is a good remedy for the "deep ulcer of the tonsils"; for the perforating ulcer it is of no service. They differ from all varieties of "superficial tertiary syphilitic ulcers" (Paget) in the absence of any eruption; from the "deep tertiary syphilitic ulcers" (Paget) in the fact that they are never preceded by any induration of tissue as a "circumscribed centre to the ulcerative process" (Paget). They resemble the latter in the acute sharpness of their edges, in their circular or oval form; from the latter they radically differ in their perforating, non-granulating tendency. They do not stop until the perforation has been accomplished. Tertiary syphilitic ulcers never excavate below the *cutis vera*, the subjacent tissues escape intact. With true syphilitic ulcers they agree in this important point, that they are never associated with any present form of syphilis, as frequently they may be said to be the sequel of a past attack. In common with the latter, they are apyretic and comparatively painless. It is a curious fact that, in ulceration in every form of syphilitic inflammation, the focus of the ulcerative process is seated in the centre of the inflamed area. It is so in these ulcers. From true tertiary syphilitic examples, again, they depart in this particular, that in the latter the focus of ulceration is always surrounded by an area of livid redness, contrasting in a very marked manner with the vivid scarlet colour which surrounds all forms of true strumous ulcers; while in them the encircling inflammation is quite obviously intermediate in brightness between the pink and the livid. Every case, wherever the ulceration is situated, commences with a moderately bright inflammatory blush, attended with some pain if over moveable parts, as the velum, pillars, etc., but with scarcely any pain if at a fixed motionless place, as the roof of the mouth. In a very brief period (such as a few days) a very small dirty white spot appears in the centre of the inflamed area. This spot, if uncontrolled, rapidly enlarges in dimensions and increases in depth, until it perforates, as if by a special solution of tissue, through the structure (bone or soft parts) over which it may be situated. In some cases, it has been remarked that the destructive process ceases, and the part heals after the perforation has occurred, apparently from some mechanical reason.

In all cases, wherever the ulceration may be seated, with whatever constitutional cachexia it may be associated, an immediate and certain cure may be accomplished by means of the iodide of potassium in full doses. If this remedy be administered before a breach of surface takes place, ulceration will not occur; if after that event, the ulceration will go no further, it will be arrested. The chief and primary object, in these cases, is to prevent perforation. Whatever will accomplish that, should be adopted at once, whether "inflammation" exists or not.

Let us now consider the therapeutic bearing of the question. Nothing has so deeply interested me of late years as the theme of the relation between a remedy and the disease which it cures, or the diathesis which it improves or corrects. A disease of *plus*-power requires a reducing remedy; a disease of *minus*-power requires an uplifting agent for cure. An intermediate class, to which neither of these observations applies, demands specific therapeutical means, which, as far as is understood, neither depress nor stimulate, but cure by neutralising a supposed poison, or virus, or *materies morbi*. Now, with respect to the cases of perforating ulcer under consideration, it may be confidently stated that they are syphilitic, if it be argued that the iodide of potassium is a chemical neutraliser of one specific virus and no other;

and if it be contended that the same remedy will effect cure, under the same circumstances, as speedily and as certainly in a scrofulous as in a syphilitic subject, the conclusion becomes inevitable that scrofula is but a form of syphilis.

There are three varieties of idiopathic iritis—the syphilitic, the rheumatic, and the scrofulous. If by mercury a cure may be effected in each, is the inference unwarrantable that, therefore, the morbid process in each is one and the same? There are three forms of periosteal affections—the syphilitic, the rheumatic, and the scrofulous. In all the iodide of potassium is highly beneficial. Does it consequently follow that "therefore" they are severally only modified outward manifestations of one and the same morbid taint? If under the conditions of syphilitic and scrofulous degeneracy apparently an identical morbid process is controlled, arrested, and cured by one and the same remedy, is the conclusion illogical that *in essence* these neoplasies severally are identical?

This inquiry should be conducted with the utmost caution. It is beset by manifold difficulties. Nothing, however, is more certain than that the question of "diathesis" is every day rising to a greater and greater height in the scale of importance. To know it is, in truth, to know the disease which by accident may spring up on its soil, fed by its nutriment. In treating the disease, it is of the utmost consequence to recognise, to identify, the diathesis. Look at the class of "sore throats". That which is vernacularly distinguished as the "ulcerated" is highly characteristic. The red, swollen, highly painful surface, is diversified by several small white spots, the level of which is obviously below that of the surrounding surface—superficial ulcerations, like aphthæ, beyond doubt. The white patches of secondary "sore throat" are in relief, altered epithelium, and may be discriminated readily from the former, and from those milder forms of diphtheritic sore throat in which it is at once evident that the white spots, "deposits", lie upon the surface. They are *in alto*, and may be scraped off by means of an instrument from the surface. In ulcerated sore-throat, calomel purgatives and salines accomplish a quick cure. In the syphilitic, iodide of potassium is of scarcely any service; mercury is indispensable. In the diphtheritic, the iodide is decidedly injurious; in the perforating, it is a *specific*. These several forms are symbols outwardly indicative of the diathetic circumstances, constitutional peculiarity, by which they are in truth produced. Neither could occur under other systemic influences. They are not interchangeable; nor are they separate and independent realities. Each must be judged with, as a part of, the constitution of the person in whom they have occurred, and regarded as visible signs of its tendency in disease.

SUICIDE FROM TOOTHACHE. On the 7th inst., an inquest was held on a young man, who had suffered very severely with toothache during the last four or five months. "I have known him," said a witness, "sit and cry for hours together with it. He suffered wonderfully with it." They found deceased was hanging by a line to a beam. His feet and knees were upon the ground. He (witness) cut him down. He was quite dead and stiff. He should think the deceased must have stood upon the ground when he hanged himself. The Coroner said it was clear that the deceased was not known to complain of anything but the toothache, of which there could be no doubt the poor fellow suffered most severely, and it was quite probable that the mind of the deceased had become affected by the continued excruciating pains to which it appeared he had been subject during the last few weeks.

Reviews and Notices.

HÆMORRHOIDS AND PROLAPSUS OF THE RECTUM; their Pathology and Treatment: with Especial Reference to the Application of Nitric Acid. With a Chapter on the PAINFUL ULCER OF THE RECTUM. By HENRY SMITH, F.R.C.S., Assistant-Surgeon to King's College Hospital. Third Edition. Pp. 141. London: 1862.

MR. SMITH, in preparing this third edition of his practical work on *Hæmorrhoids and Prolapsus of the Rectum*, has added a chapter on Painful Ulcer.

This affection, which is also sometimes called fissure of the anus, or irritable ulcer of the rectum, is believed by Mr. Smith to originate in the straining efforts which take place in consequence of habitual constipation. Commencing as a slight rent of the mucous membrane, the breach of surface is, by the movements of the bowel and the passage of hardened fæces, rendered more and more extensive, until it becomes a decided ulcer. The most prominent symptom is pain, occurring sometimes at, sometimes after, the time of defecation. The general health is not much affected at first; but ultimately signs of anæmia and debility appear. In women, the disease has been mistaken for an uterine affection, and local applications have accordingly been made to the womb.

"The situation, form, and appearance of the ulcer differ. Thus, in one instance the disease may be so located as to be almost entirely without the verge of the anus, implicating the sphincter but slightly, and may be readily brought into view. In another case it may be seated quite across the fibres of the sphincter muscle, and then only a portion of the ulcerated surface can be brought into view. The shape of the ulcer varies—it is round, oval, or triangular, generally measuring from the eighth of an inch to half an inch in length. Its surface presents in one case the appearance of a bright red colour, in another a greyish colour. When the disease is recent, the edges are level with the ulcer; if, however, it has existed for any length of time, the borders are raised and indurated. Sometimes there are two ulcers; or rather, one ulcer is separated into two portions by a process of integument. . . . . In by far the majority of cases the painful ulcer is met with at the posterior verge of the anus, nearly or quite in the median line." (Pp. 129-131.)

The disease, according to Mr. Smith, is easily remedied. Where the ulcer is seated low down, the application of nitrate of silver will often be sufficient; but if this do not succeed, an ointment of half a drachm of grey oxide of mercury in an ounce of lard should be used. "In other instances, the daily introduction of a full-sized bougie made of wax or of yellow soap will be followed by the best results." In all cases, the action of the bowels should be regulated by small doses of calomel and rhubarb.

When the disease is seated more deeply, and has associated with it a spasmodic contraction of the sphincter ani, a simple surgical operation is required. This consists in making an incision through the ulcer, and dividing some of the fibres of the sphincter. Mr. Smith always applies, after the operation, a suppository of compound soap pill and extract of henbane (six grains of each).

For other particulars regarding the painful ulcer,