tions, do so much service and improve the dyscrasia upon which the symptoms depend.

There is a point worth attending to in the treatment of all headaches. See that the head is elevated at night, and the pillow hard; for, if it be soft, the head sinks into it and becomes hot, which with some people is enough to provoke an attack in the morning if the sleep have been long and heavy.

But, whatever be the plan of treatment decided upon, rest is the first principle to inculcate in every severe headache. Rest, which the busy man and the anxious mother cannot obtain so long as they can manage to keep about, is one of the first remedies for every headache, and we should never cease to enforce it. The brain, when excited, as much needs quiet and repose as a fractured limb or an inflamed eye, and it is obvious that the chances of shortening the seizure and arresting the pain will depend on our power to have this carried out effectually. It is a practical lesson to be kept steadily in view, in that there may lurk behind a simple headache some lesion of unknown magnitude which may remain stationary if quietude can be maintained.

And now I would supplement these observations by a few remarks on some of the remedies in common use for the different varieties of headache.

Croton-chloral has been recommended by Dr. Liebreich of Berlin as possessing a special action on the sensory branches of the fifth nerve. It is of most benefit in facial neuralgia, relieving pain and producing sleep. I have known it to prove very serviceable in some cases of nervous headache in which the disorder has chiefly occupied one temple, the occiput and neck, or one parietal bone; and in other cases not only to utterly fail, but to induce sickness and nausea, if they did not previously exist. I generally give ten grains for a dose in plain water, though it has been recommended to dissolve the remedy in a few drops of glycerine and then add the required quantity of cinnamon-water, which, to some extent, disguises the bitter nauseous taste. On this account, it may be given in the form of a pill, beginning with two grains and increasing the dose according to the urgency of the symptoms.

Hydrate of chloral is a remedy which has become one of the most frequently chosen of therapeutic agents, from its hypnotic effects. In large doses, it is narcotic, and, in very large doses, it is said to produce anaesthesia. In nervous and spasmodic diseases, as puerperal convulsions, trismus nascentium, and the sleeplessness of chorea, we all recognise its value. In headaches, whether of the nervous or vascular type, when the pain is wearing out the patient and sleep cannot be obtained, chloral is of undoubted value. Chloral is a remedy requiring extreme caution in its administration whenever headache has recurred so often as to exhaust the patient's nerve-force. Where the pulse has become small and weak, through constitutional debility or failure of the heart's action, a full dose may be followed by syncope. Incautiously administered, it may reduce the frequency of the respiration and annihilate the pulse. It lessens blood-pressure by its action on the vaso-motor system, and also by depressing the heart's action; hence it requires caution in cases where the patient, although severely suffering, is exhausted. In some cases, after its administration, I have observed such profound sleep and quiet shallow respiration as to make me cautious in employing it where the circulation is feeble. "When toxic doses have been employed, the heart, after numerous pauses, is arrested in diastole." (H. C. Wood.)

Chloral has a decided effect upon the vascular system, and, if the pulse be firm or hard, the face flushed, or the excitement considerable, it relaxes the muscular walls of the arteries and reduces blood-pressure. It has been recommended not to employ a larger initial dose than ten grains; but I have never witnessed any effects of an overdose from twice the quantity. Very alarming symptoms have followed doses of forty and even thirty grains, so that its use requires caution, if the nerve-power be much reduced.

Gelsemium is sometimes useful in neuralgic headache and the neuralgia arising from decayed teeth. The powder and the tincture are the two forms for administration. The dose of the former is from one to two grains, and of the latter from ten to twenty minims. It is a powerful remedy, and, as many fatal cases are recorded from an overdose, its use requires caution. My experience of it is very limited, from having many more remedies at my command with which I am better acquainted. In one case, I gave a grain of the powder in a pill every night for sleeplessness caused by neuralgic headache, and it exercised a most beneficial effect.

Phosphorus is one of the most important agents we possess in nervous exhaustion, and its efficacy is undoubted when administered in an unoxidised state capable of being readily assimilated. No remedy requires more care in prescribing than this; for, whilst in small doses it is a gentle stimulant and tonic, in large doses it depresses the heart's action, like chloral, and is not free from danger.

I have thus passed briefly in review all the well known forms of headache. I have glanced at their individual peculiarities, their significant symptoms, and the issue to which they tend. It may possibly be reserved for another occasion to discuss each separate type in a more exhaustive manner, and to point out more fully than I have been able to do to-day how much there is to be said on a subject of engrossing interest alike to the patient and to the physician.

ON CHRONIC CERVICAL ENDOMETRITIS AS A FREQUENTLY OVERLOOKED CAUSE OF STERILITY AND ABORTION.*

By ARTHUR W. EDIS, M.D., etc.;
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CHRONIC cervical endometritis consists in chronic inflammation of the mucous membrane lining the cervix uteri, extending from the os externum to the os internum, the surface familiarly known as presenting the arbor vitæ appearance. The mucous membrane lining this tract is covered by cylindrical and ciliated epithelium and studded with villi. Thick tenacious viscid mucus is copiously secreted from this surface. The villi become hypertrophied, and give to the os and cervix an appearance termed granular degeneration. Eversion of the os and lower portion of the cervical canal not unfrequently occurs where the case is severe or of long standing.

Between the folds of the mucous membrane, glands are seen, the so-called Nabothian glands, which become involved in the inflammatory process.

The symptoms indicating the presence of this condition are generally dragging sensations about the pelvis, pain in the back and loins, increased by standing or walking; profuse leucorrhœa; irregularity of the catamenia, which are generally too profuse and often painful; sterility in married women, or, if impregnation occur, abortion.

On examination *per vaginam*, the cervix may be found to be apparently healthy, no roughness nor any unusual condition exciting attention. In other instances, the cervix is found to be more bulky than normal, the os puffy and patulous, the lining mucous membrane being granular. On passing a speculum, however, whether the cervix be normal in appearance or otherwise, we shall generally find exuding from the os uteri a quantity of glairy tenacious mucus, like unboiled white of egg, which is with considerable difficulty removed from the cervical canal.

This condition not unfrequently ensues shortly after marriage, and occasions considerable distress and suffering, being due, I believe, in many instances to so-called latent gonorrhœa, communicated by the husband, as pointed out by Dr. Emil Noeggerath of New York. Sterility is an almost invariable result; but, should conception occur, abortion almost invariably ensues within the first few months, and, unless the patient be properly treated, much subsequent uterine disturbance is sure to follow.

Where the external os is naturally very small and circular, it may be necessary to divide it crucially, or even to slit up the cervix for half an inch or so, in order to prevent the tenacious discharge from accumulating in the cervical canal.

My belief is that many cases of sterility, where the difficulty is overcome by free division of the cervix with the metrotome, are benefited as much by the depletion which ensues, and by the discharge being allowed free vent from the cervical canal, as by the division of any supposed stricture of the internal os uteri.

Where the cervix is very bulky, the lips somewhat everted, and the canal very granular, nothing proves of so much service as local depletion by means of scarifying the surface or puncturing the cervix in several places, allowing an ounce or two of blood to flow, encouraging its continuance, if necessary, by warm water injections, and subsequently inserting tampons of cotton-wool saturated in glycerine, which tend to keep up a copious watery discharge and so lessen the bulk of the cervix.

In cases where it is not deemed necessary to resort to division of the cervix or scarification, the insertion of a laminaria tent for twelve or twenty-four hours, so as to open up the cervix and expose thoroughly the inflamed mucous surface, and thus enable us to act freely upon it, may prove of much benefit. Care must, however, be taken that inflammatory mischief be not thereby set up.

* Read in the Section of Obstetric Medicine at the Annual Meeting of the British Medical Association in Bath, August 1878.

Having, by one or other of these methods, prepared the way, we now come to the important part of the treatment, and that is the free application of nitric acid to the whole length of the cervical canal. At first, we should content ourselves with applying the acid carefully to the lower portion of the cervix, in order to find out whether it will tolerate the remedy.

Should no inconvenience arise, or after this has subsided, the application of the acid may be again resorted to. A Playfair's probe, with cotton-wool carefully wound round it, is saturated in the strong nitric acid and then passed for about an inch and a half up the cervical canal, any excess being neutralised by a saturated solution of carbonate of soda. A few applications of the acid, at about intervals of a week, generally succeed in improving the condition of the cervix very materially: the periods become more normal in character and duration, the thick glairy discharge lessens in quantity, and the other symptoms improve also. The general health must, of course, be attended to meanwhile, and it will be well to employ twice daily injections containing borax or other agents, and to persevere with the glycerine plugs.

A very frequently overlooked cause of abortion is allowing this condition of the cervix, previously described, to go on unchecked by treatment during the early months of utero-gestation, when the natural tendency is for the morbid condition to become exaggerated, owing to the increased determination of blood to the uterus. I have met with numerous instances where, I feel sure, this granular condition of the cervix has so intensified the rhythmical spontaneous contractions and relaxations of the uterus (which occur normally during pregnancy, as insisted on by Dr. Braxton Hicks) as to be the active cause of expulsion of the ovum.

Patients have presented themselves stating that they have a sense of constant dragging or bearing down when a few months advanced in pregnancy, as if labour were coming on. They not unfrequently add that they have already had several miscarriages, and that they fear another is coming on now.

On examination *per vaginam*, the cervix is found to be very full and fleshy, soft to the touch, and bathed with muco-purulent secretion, often of so acrid a nature as to cause severe excoriation of the labiæ and inner surface of the thighs. When seen through the speculum, the cervix is found to be the seat of intense granular degeneration. Under these circumstances, what is to be done? If we let the mischief run on without attempting to check it, the inevitable miscarriage occurs, and we are blamed for not having prevented it. If we attempt to remedy the evil, unless we proceed very cautiously, miscarriage not infrequently occurs, and again we are blamed for having induced what we were attempting to obviate.

Our duty is plain. We must endeavour to avert the catastrophe by cautious and judicious treatment. We have, in fact, everything to gain and nothing to lose; for, if miscarriage occur, it is in spite of, and not in consequence of, treatment. This should always be explained to the patient beforehand, and her sanction to the proposed treatment obtained. Having done this, the better plan is to confine her to bed for a few days, and, if necessary, bring her gently under the influence of opium, or give bromide of potassium or hyoscyamus until the uterine action is less marked; then pass a medium-sized Ferguson's speculum and get the cervix well in view. Should the granular condition be very extensive, it may be well to confine our applications to one or other lip at first, until we see whether the patient is tolerant of treatment.

The remedies I have found most serviceable and least likely to induce miscarriage have been carbolic acid, nitric acid, and nitrate of silver. One or other of these should be carefully but thoroughly applied, no excess being allowed to run down and irritate the vagina, or to follow the exit of the speculum and so excoriate the vulva. A tampon of cotton-wool saturated in oil should then be inserted, and the patient enjoined to keep the recumbent position.

I have never had to inject morphia hypodermically, and only very seldom had to employ a morphia suppository to allay pain; but, should it be requisite, one or other of these may be resorted to.

The application of the acid may be repeated within a week or so, depending upon the inconvenience produced and the advantage gained. A lotion, containing half an ounce of borax to the pint of water, may be used as an injection night and morning, care being taken not to employ much force in its administration, tepid water being used if the weather be cold.

THE directors of the Salop Infirmary, Shrewsbury, in their annual report, take occasion of the recent vacancy for a House-Surgeon to recommend that the appointment should in future be vested in the directors and the medical staff, instead of the whole body of trustees, as at present.

A CASE OF CONFIRMED EPILEPSY, WITH IRREGULAR AND PAINFUL MENSTRUATION, SUCCESSFULLY TREATED BY LECLANCHÉ'S CONTINUOUS CURRENT.

By A. S. MYRTLE, M.D., Harrogate.

IN April 1875, I saw for the first time Miss M. N., aged 20. She had a very healthy appearance, was of full habit, and showed a large measure of intellectual capacity; in fact, her appearance and manner would never have led one to suppose that for six years she had suffered from menstrual difficulties and epileptic seizures. She began with her periods when thirteen. For the first year, these were tolerably normal; after that, they occurred irregularly, and were accompanied by ovarian and lumbar pain, with well-marked and protracted fits. These sometimes came on a few days before the menses, but more frequently from two to three days after. Sometimes there would be one severe attack, invariably occurring in bed and while asleep, with general clonic spasm of the muscles, stertor, and unconsciousness, on cessation of convulsions; at other times, there would be a milder attack, occurring when sitting at table, and preceded by a sufficiently well marked "aura" to enable her to retire to her room; but after such an attack she remained clouded and unhappy, and invariably had one or two more of the same sort before she returned to her usual condition. Her temper became irritable, and occasionally she exhibited bursts of violent passion without provocation. She was living in a state of constant apprehension of an attack, and that alone made her unamiable. During the six years she had been under medical treatment, and had also undergone a course in a hydropathic establishment, and all to little purpose. Her condition was becoming worse and worse; her self-dependence less and less, so much so that she not only dreaded going to public places, but actually showed reluctance to mingle with her own family and friends.

When I first saw her, I gave her a sharp mercurial aperient, and followed that up by half-drachm doses of potassic bromide morning and evening. The aperient was given once a week, and the bromide continued regularly for eighteen months, with very good result as far as the epileptic seizures were concerned, but with no improvement as regards the catamenia.

In November 1876, a curious thing happened. Whenever she talked much, or danced, her mouth and throat became dry; her lips, tongue, and mucous membrane of the mouth became deep claret-coloured; and she could neither speak nor swallow unless she took fluid to moisten the parts. She still continued the treatment, and in January 1877 I had an opportunity of seeing her after some hours' dancing. Her appearance was most singular. Her lips, tongue, mucous membrane of mouth and throat, looked as if stained with a deep purple dye; the eyes were brilliant, and the pupils largely dilated; whilst the skin round the mouth and face generally was much paler than usual. She felt quite well; but, unless she moistened her mouth, she could not articulate distinctly, nor swallow. This continued as long as she kept dancing.

I attributed the local congestion to a temporary paresis of the vasomotor nerves of the parts affected, somehow caused by mental and physical excitement whilst the nervous system was under the influence of bromide of potassium. She could not afford to give the medicine up; and accordingly, after thinking how I might best remedy the congestion and discomfort arising therefrom, I determined to try the effect of *jaborandi* in combination with the bromide. I gave ten grains with each dose. The first dose was given at bedtime, and in two hours the flow of saliva was so active that she saturated several pocket-handkerchiefs. I reduced the dose, after the third day, to five grains; and since then she has never experienced any more discomfort in the mouth, and has had recourse to the *jaborandi* now and again as occasion required.

In 1877, she travelled on the Continent, and was capable of doing a fair amount of work. During all this time she continued to be irregular, suffered from severe pain, and had fits of more or less severity before or after each period. Once during the hottest season, whilst abroad, she was regular to her time, and for the first time in her life thoroughly "unwell". After this, she felt better than she ever remembered. On returning home, she fell back to her old ways and became more irregular than ever. I had recourse to periodic depletion (monthly) by leeching the thighs. This, I think, weakened, but did not improve her state. The fits were, I think, aggravated by the leeches.

In March, I proposed trying the effect of the continuous current of