ON THE DIAGNOSIS, PROGNOSIS, AND TREATMENT OF SYPHILITIC ERUPTIONS :

WITH ESPECIAL REFERENCE TO THE USE OF MERCURY.

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DIAGNOSIS OF SYPHILITIC ERUPTIONS.

It is very important to ascertain whether an eruption be syphilitic or not. But this investigation has nothing to do with the distinction between papules and scales, pustules and tubercles; for the poison of syphilis is capable of producing almost every form of eruption. Neither is it wholly a question of colour. The copper-colour, so strikingly characteristic of venereal affections of the skin, is by no means invariably present; nor is every copper-coloured eruption syphilitic in its origin, the hue of the affected portions being materially modified by the natural complexion of the patient. The diagnostic signs of syphilis do not lie on the surface, although the first glance frequently excites well-grounded suspicion. We must appeal to the history rather than to the hue, for evidence of the origin and nature of the disease.

Syphilis is well known to affect the tissues in a certain order; and there is often, but not always, much regularity in the time. Usually, there is first a primary sore, then a swollen absorbent gland, afterwards an eruption of maculæ, followed by an ulcer in the throat affecting the tonsils or velum, or, in other cases, the tongue or lips. The periosteum then becomes inflamed, and a node appears; subsequently the iris is affected; then a secondary eruption on the skin appears, frequently scaly or tubercular, particularly in the palms and soles in the form of lepra, and affecting the genitals and nates in the form of condylomata. At length the cartilages and bones of the nose, face, skull, or other parts, become carious.

When a patient has contracted syphilis originally, and appears before us with a suspicious eruption, we shall generally find upon inquiry, that some or all of the above-mentioned parts have been affected, usually in the order which has been described. When, however, the disease is hereditary, the links of the chain cannot be so clearly traced, and the diagnosis may be difficult. Here, if we can gain any satisfactory knowledge of the health of either parent, it may materially assist our judgment. The eruption should awaken suspicion if it be copper-coloured, and if there be a tendency to ulceration; particularly if the ulcers burrow under the skin, and are partially covered with dull copper-coloured bands of integument. It may likewise be observed, that syphilitic eruptions rarely itch intensely, and as seldom assume a form of active inflammation.

In investigating the nature of venereal eruptions, we may easily be led astray. Various in their form and hue, and not less so in their degrees of severity, they have been described by authors under different names. Hunter wrote of "diseases resembling syphilis": Abernethy wrote of "pseudo-syphilitic diseases": modern writers distinguish between syphilitic and "syphiloid" diseases: Carmichael describes four kinds of syphilitic disease, both primary and secondary; and some of the French surgeons take similar views.

There are, however, many reasons for the belief, that, in this country at least, there is but one syphilitic poison; and that the mischief which this poison may effect depends, in individual cases, not so much on the intrinsic virulence of the poison itself (for of this we can know nothing), as upon the susceptibility of the patient. Some persons cannot be inoculated with it at all; in others it produces only a primary sore; in many it establishes a formidable disease; and a few are absolutely destroyed by it.

The most perplexing difficulties met with in modern practice, connected with the diagnosis of venereal affections, appear to me to arise from a too hasty adoption of the theory, that *mercury is capable of originating diseases similar in character to the secondary forms of syphilis*. Against this dogma, which, so long as it prevails, must necessarily involve the subject in a labyrinth of difficulties, from which there is no escape, I must beg most earnestly to protest, for these reasons:

I. Symptoms resembling syphilis are never observed to result from the use of mercury in cases in which syphilis has neither been previously contracted, nor inherited. No practice is now more common than the exhibition of mercury for various forms of inflammation affecting many of the organs or tissues. Mercurial treatment has, in fact, to a great extent, taken the place of depletion, and is very frequently pushed to ptyalism; and yet, to whatever extent the gums, or the salivary glands, or the bowels, become affected, we never find eruptions or ulcerations resembling syphilis, produced by this treatment. The cheeks and the gums, the lips, the throat, and the tongue, may all become the seat of mercurial ulceration; but the ulcers do not resemble those of syphilis. They are more superficial, less persistent, usually healing when the mercurial irritation subsides; and they never resemble syphilis in affecting distant parts in a certain order. In these and other respects they bear no resemblance whatever to syphilitic affections; and when the system is really free from lues, the difference between these mercurial ulcerations and the sores of syphilis, must be as obvious to the most superficial observer, as is the distinction between the *eczema mercuriale* and the *lepra syphilitica*.

II. The morbid effects of mercury are peculiar, and well-defined; and, with the exception of the ulcerations above described, do not even approach in character any form of syphilis; neither do they exhibit the slightest similarity to that disease. They are as follows: sore gums, salivation, loosening of the teeth, diarrhoea with griping, dysentery (or green mucous evacuations in children), extreme depression of the nervous system, accompanied with trembling of the limbs, infirmity of purpose, an undefined dread of evil or danger, with pusillanimity of mind, dyspepsia, rheumatism,¹ *eczema mercuriale*, etc.

III. The occasional aggravation of syphilitic disorders, under the administration of mercury, may be rationally explained, and fully accounted for, without supposing it capable of originating a chain of symptoms, the character of which (if not the full development) had been established in the system long before the administration of a grain of mercury. The mode in which mercury, when used in excess,

¹ Rheumatism induced by mercury occasionally throws out nodosities in the neighbourhood of joints, but these are not easily confounded with the venereal node.

aggravates the syphilitic action, will be hereafter explained, without adopting the lame and impotent conclusion, that the remedy is capable of producing a disease similar to that which it cures,—a conclusion which has always appeared to me to resemble more the visionary subtleties of homœopathy, than the sober realities of medical science.

PROGNOSIS OF SYPHILITIC ERUPTIONS.

Syphilitic eruptions, like other forms of lues, generally discover, if left to themselves, a tendency to persist (with occasional intermission) through life; and they may be transmitted from either parent to the children.

In a few cases, a spontaneous recovery appears to take place; and, in many, the eruption will disappear for a time under alterative treatment. But it will now be attempted to show that the spontaneous recoveries from syphilis are apparent only, not real.

There is no disease, the destruction of which it is so important to ascertain with certainty, as syphilis. An error here may not only spread unhappiness and desolation over the prospects of married life; but it may affect the health of the next generation. It is therefore impossible to exaggerate the value of well-considered and well-founded opinions on a subject which has been too much regarded as one of mere theory and speculation. The popular belief on the subject is strong, and calls loudly for attention. So anxious, and so properly anxious, are young men to know if, having once suffered from syphilis, they may safely marry, that there are few cases of monomania more common than *imaginary* lues; and the imaginary disease is far more difficult to cure than the real. One reason of this may be found in the unsettled state of medical opinion and the uncertainty of the prevailing mode of treatment.

The *vis medicatrix nature* is observed to relieve the system of certain morbid influences or agents, in one of three ways: by elimination, by decomposition, or by tolerance. Under the two former processes, the disease may possibly be cured; but, under the latter, it is only tolerated, or latent. We have no proof that the act of elimination ever occurs spontaneously, or otherwise, in lues venerea; we do not even observe an abortive effort to expel the poison, as occurs in primary syphilis, gonorrhœa, cholera, diarrhœa, diabetes, etc. Neither is there any reason to believe that the poison is ever spontaneously decomposed or neutralized.

The spontaneous recovery from syphilis, when it does occur, appears to be nothing more than a recovery *by tolerance*, consisting merely in the temporary abeyance of the diseased action, excited by the presence of a poison to which the system has at length become habituated and reconciled for the time. This theory of tolerance is in perfect harmony with all the analogies of natural history, physiology, and pathology. The well-known fact that many mineral and vegetable poisons, such as antimony, mercury, tobacco, and opium, become comparatively harmless by long usage, losing their toxical powers as the system becomes habituated to their influence, would sanction the anticipation that certain *animal* poisons also would become inert from the influence of time and habit: and so in fact we find it. An infected couple, both originally labouring under gonorrhœa, may cohabit until all symptoms

of disease in both of them have vanished. Yet they are both capable of communicating the disease to a stranger. John Hunter relates several cases of this kind, showing that a woman, without any new infection, and without any symptoms of disease on her own person, may communicate gonorrhœa to one man, and not to another; and he was of opinion, that the capability of communicating the disease is sometimes the only criterion of a woman having it herself. The late Mr. Hey, of Leeds, was of opinion that a person may infect another with the lues venerea after all symptoms of the disease have disappeared. And if a doubt may be entertained of the nature of the disease on which these opinions are founded, there is abundant proof in the history of syphilis, of its capability of existing in a latent form, as in the well-known circumstances attending the disease at Lisbon during the Peninsular war. At the time when our troops were stationed in that city, the disease existed among the inhabitants in so mild a form, that no mercury was necessary for its cure; and the dancing girls, from whom our soldiers were infected, were well enough to pursue their avocations on the stage without inconvenience. Yet the disease which they communicated to our officers and men proved to be so terrible a form of syphilis, that it was called the "black lion". It produced phagedenic or gangrenous ulceration of the genitals, and horrible mutilations. It was the opinion of some of the army surgeons, that this was a new disease, or at least a form of syphilis of unusual malignity. It is, however, much more rational to look upon it simply as syphilis, so well tolerated by the inhabitants as to become almost latent, but malign in its effects upon the soldiers from the exhausting influences of fatigue, excesses, and a new and sultry climate. This is quite conformable with the fact, that syphilis generally proves a severe disease upon its first breaking out in a country. In England it is certainly much less formidable than it once was. Less mercury will cure it, and it occasionally wears itself out; but it is syphilis still, and its milder forms are often as treacherous as they are transient. A latent virulence lurks under the mask, which may burst out destructively when least expected. For this power of tolerance has its limits. It is limited to certain persons, to habits of life, to conditions of health, to climate, and sometimes to a generation. Thus, sometimes, syphilis may be almost latent in the parent, but severe in the child. A mother may have no symptoms of syphilis in her own person, but may have a succession of still-born children all poisoned *in utero*, or born alive, covered with maculæ, and falling early victims to the disease. A father, in whom lues has become tolerated and latent, may beget a diseased child, who shall, if weak, or scrofulous, suffer more than the father. Spontaneous recovery from syphilis is, therefore, in many cases, perhaps in all, an appearance, not a reality.

TREATMENT OF SYPHILITIC ERUPTIONS.

ALTERATIVE TREATMENT. The alterative cure of secondary syphilis, sanctioned as it is by the practice at some of the London hospitals, is probably of the same nature as the spontaneous recovery. Though the anti-syphilitic virtues of Plummer's pill, sarsaparilla, guaiacum, iodine, arsenic, and the mineral acids, are very questionable, these medicines evidently have the power of rendering certain subjects

tolerant for a time at least, of certain forms of secondary syphilis. These agents will bring about the healing of ulcers, the dissipation of eruptions, and the reduction of periosteal swellings; and under this treatment, combined with a regulated diet, scores of patients, perhaps hundreds, are annually dismissed from our hospitals, apparently free from every vestige of disease. The Plummer's pill, although it contains calomel, does not appear to act mercurially, the sulphuret of antimony modifying its action. Indeed, the specific effects of mercury are not apparent; this treatment, therefore, is non-mercurial, and yet patients appear to recover under it. But do they really recover? Do they not frequently return again and again to the same hospital, or to some other hospital, and when again discharged, apparently cured, does it not frequently happen that the first exposure to the effects of intemperance, want, or cold, induces a relapse of the disease? Or, if it be tolerated for life, so that it does not re-appear in the person of the patient, is the wife safe; or, more especially, are the children of the patient safe? The question admits of great doubt. A large proportion of the cutaneous diseases met with in every station in life, are syphilitic. That a man can, without infecting his wife, transmit to his children a syphilitic taint, is an established doctrine. Several cases of this nature are related by the older writers on surgery, and by some of modern date. Several, also, the validity of which no scrutiny can impeach, have occurred in my practice. I have seen syphilis in infants and in children of all ages, whose fathers had married after the non-mercurial treatment of the disease had effected an apparent cure. After marriage (in some cases several years after), secondary eruptions made their appearance. These were treated mercurially, and the result was most instructive. The wife escaped, as did also the children begotten *after* the mercurial treatment of the father; but the children begotten *before* the mercurial treatment were infected. In one instance, the child suffered more than the father. The father had psoriasis plantaris in a mild form; the child, a girl of ten years of age, had iritis, sores about the nostrils, and a scaly eruption on the scalp. All these diseases, together with that of the father, yielded to active mercurial treatment, and to no other; iodine, sarsaparilla, and other remedies of that class, having proved perfectly inert. Several children, begotten and born after the mercurial treatment of the father, were perfectly healthy, nor was any trace of disease to be found in the mother. In another striking instance, a married man contracted syphilis. The primary sore readily healed under simple treatment. Secondary symptoms appeared, which ultimately yielded to active mercurial treatment. In the interval between the healing of the primary sore, and the subsequent mercurial treatment, a female child was begotten. This child was born apparently healthy, but, as she grew up towards womanhood, suffered from sore throat, scaly eruptions, sores about the nose, and other unequivocal symptoms of syphilis. Subsequently to the mercurial treatment of the father, several children were begotten, but not one of these has been affected. And two elder children, born before the father contracted syphilis, have been also entirely free from the disease, together with the mother, who was fortunate enough to escape infection in the first instance.

Nothing is more common than for middle-aged men and women who are afflicted with secondary syphilis, to deny that they were ever affected with a primary sore; sometimes admitting that they have deserved to contract the disease, but denying that such has actually occurred. Assuming that some of them report falsely, common sense claims a certain proportion of these cases as cases of hereditary syphilis, breaking out for the first time in middle age in the form of secondary symptoms.

In the instances which have fallen under my notice, I have generally found alterative treatment useless, and mercury all-sufficient; and the conviction has been more and more forced upon my mind, that the non-mercurial treatment of secondary syphilis may be generally regarded as an inefficient and ineligible practice; inefficient as regards the patient, and ineligible as tending to infect large masses of the community with hereditary syphilis. The disease may be, and often is, mild in its hereditary forms, and it may possibly wear itself out in a generation or two; but this by no means always happens. It aggravates the strumous habit when it happens to come in fellowship with it; and probably is at the foundation of many cutaneous and cachectic disorders, the character of which is undefined and unsuspected. One cannot, therefore, but deprecate a practice which allows the blood to remain vitiated and tainted, from generation to generation, with the presence of an animal poison, which we have, in most cases, the power of destroying at once and for ever.

MERCURIAL TREATMENT. The prevailing objections to the use of mercury in syphilitic diseases may be thus summed up: 1, That it occasionally produces lesions more formidable than the disease for which it is prescribed; 2, That its use is not generally necessary to their cure; 3, That besides being unnecessary and injurious, it often proves inefficient and inert.

That there is much of real truth in these objections, no practical man can deny; but there is likewise much fallacy. For as these diseases, in their secondary forms at least, rarely get soundly and permanently well without mercury, it may be said to be generally necessary to their cure. And if rightly and vigilantly administered, it is generally successful. But both its safety and its success will be found to depend very much on its *mode of administration*, by which term is intended to signify something more than its *mode of introduction* into the system; for this, except in peculiar cases, appears to be of little consequence.

Our success in administering mercury may be very much limited by erroneous views of its mode of action. The mineral and the disease have been regarded as two antagonising poisons; the poisonous influence of the mineral counteracting that of the disorder, by setting up in the system a morbid action of a different kind, and incompatible with it. On this theory it would appear that the more disastrous the effects of the medicine, short of the actual destruction of life, the more perfect would be the safety of the patient. The more he is poisoned by the mineral, the less would he be poisoned with lues. And in the event of the disease becoming aggravated by the severity of the mercurial course, it would be necessary for the truth of the theory, to hold, that the original disease having been vanquished by so much

mercury, the existing symptoms must be the symptoms of a *mercurial disease*.

The true theory is probably the very reverse of this. It is very doubtful whether any real advantage is derived, in any case, from the morbid effects of drugs. Disease may succumb in spite of such influence, but not in consequence of it. If a poisonous drug is allowed to do mischief, it has probably been given in excess. A smaller quantity would have accomplished our therapeutical purposes, not only as well, but probably more efficiently. It is in the right dose of a medicine that its real value consists; and too much study cannot be given to this all-important point. As a general rule, the doses in which we are accustomed to exhibit poisonous remedies, are perhaps not only large, but injuriously excessive.

Mercury belongs to the class of mineral tonics, which, in excessive doses, become irritants, and, in large doses, poisons. Its tonic action ceases when irritation is excited in the tissues. In order to avail ourselves of the full benefit of tonics, our attention must constantly be directed to their special properties and peculiarities of action. There is in the organic system an inherent tendency to health. Disease is an accident; a breach in the economy, which nature is ever intent on repairing. But in this she sometimes fails; and the design of tonics is to supply what is wanting. There is sometimes a deficiency of pure healthy blood; and the preparations of iron restore that fluid to a healthy condition. In other cases, the blood contains an amount of poison; and some tonic must be selected which is capable either of eliminating or decomposing the poison. Mercury probably acts by producing some chemical change in the blood, which renders the poison inert for a time, and, under careful management, for life. But as the salts of iron are liable to create disturbance in the functions, if given in excessive doses, under which circumstances their tonic effects cease, so mercury must be so administered as not to depress the powers of the system, which are required for the destruction of existing disease. So long as the general system does not suffer from the mercurial poison, it will remain capable of taking advantage of the special effects of the mineral as exerted on the morbid condition of the blood. But when the gums become sore, or the bowels disturbed, there is here a new source of irritation and debility. The animal poison may have been in part neutralised; but, if the strength of the system be sacrificed to the action of the mineral poison, it will no longer be able to contend with the original disease, which, although less virulent in its nature, may become more destructive in its effects. It often happens, that syphilitic symptoms will yield under a course of mercury up to a certain point; the disease will then become stationary, and, if the medicine is persevered in, the symptoms will become aggravated. Sores which were healing will again ulcerate, dissipated eruptions will re-appear, and the patient may even fall into a worse condition than before. And yet the disease is as purely syphilitic as ever it was, and as ready to yield to mercury, if rightly administered; but the system being for a time deranged by its excessive administration, the *vis medicatrix nature* is paralysed, and the disease is triumphant.

But, apart from theory, the case is practically this. Mercury gene-

rally excites a salutary influence over syphilitic eruptions; but only for a time. It then does harm. Whatever be the reason of this, the practical conclusion is plain. We must then desist; and, if necessary, renew the treatment when the system has recovered from the shock. It is much safer to administer an active remedy, under the guidance of the observable phenomena of its action, which present themselves to our notice, than in obedience to any theory deduced from extraneous sources. That the latter method has been prevalent, both in the excessive, and in the too sparing, use of mercury, is but too apparent.

Every mineral used in medicine has some peculiarity of action, which can only be understood by long and attentive observation; and without a familiarity with these habitudes, we use the medicine at great disadvantage. Too much attention cannot be given to this subject. In order to show its important bearing, the action of mercury may be contrasted with that of arsenic. Thus:

ARSENIC

Produces its maximum of good by slow degrees, and by continued and prolonged exhibition.

Has a cumulative action, the system becoming more and more sensitive to its presence, and intolerant of its influence, in proportion to the quantity swallowed.

May be given until the patient will not bear the five hundredth part of a grain.

Affects the nervous system more readily at first, and afterwards the vascular system, the nervous tissues recovering their tone.

Should therefore be added to the blood drop by drop, *cautè et gradatim*, in diminishing doses.

MERCURY

Effects its salutary purposes often suddenly; always within a limited period; or, beyond that period, fails altogether.

Has no cumulative effects after the first few days; and the system becomes less and less sensible of its presence, and more tolerant of its influence, by its habitual use.

May be given until enormous quantities prove absolutely inert.

Affects the vascular system more readily at first, the nervous system suffering severely after a lengthened course.

Should be poured in suddenly, until it produces some effect, then as suddenly withheld for a time, and resumed, if necessary, with greater energy.

That the vascular system may be gradually inured to the influence of mercury, so that doses which at first had the power of salivating, may at length be administered without producing any sensible effect; and that, in order to excite as ready an action by a second or third course of mercury, as by the first, the dose must be increased, if not doubled, must be well known to every practitioner. It is also matter of common observation, that the salutary action of mercury on diseased structure, is nearly contemporaneous with the morbid action of the mineral on the gums or other tissues. Accordingly, the common practice has been, not only to make the gums sore, but to keep them sore for days or weeks together, with a view to the continued and protracted effects of the remedy on the disease. As it was once believed that copious ptyalism was necessary to insure the full benefit of the mercurial treatment, so of late it has been generally held, that a continued, though moderate, degree of soreness of the gums is a necessary condition. This opinion appears, however, to rest upon no better foundation than the former now long exploded notion.

Both the one practice and the other appear to be founded on the belief, that the morbid action of the mineral on the healthy tissues, takes precedence of its salutary action on the diseased structure.

Many years' close and anxious observation have established in my mind the opinion, that this is an erroneous view. It is not easy to detect, in an ulcer or an eruption, the first appearances of healthy action; and it is clear that healthy action must exist for some little time before it becomes apparent. If, therefore, the gums first become tender, and the ulcer first presents an improved appearance, on one and the same day, it is fair to presume that the healthy action had been actually set up on the previous day, that is, antecedently to the morbid action on the gums. But further, close observation will generally reveal the fact, that the very appearance of improvement in the diseased parts exists before the gums are in any degree affected. The mercury has effected the good before it has effected the evil. The soreness of the gums, therefore, is a sign, not merely that the mercury has been pushed far enough, but that it has been pushed *farther than was necessary* for the establishment of healthy action in the diseased parts. If a drachm of strong mercurial ointment has been used every night for five successive nights, and if, on the following day, healthy action is substituted for diseased; and if, on the sixth night, the inunction is continued, the gums becoming slightly sore on the following day,—in such a case as this, the mercury has been continued two nights longer than necessary: for the healthy action, which became apparent after the fifth night, must have existed the day before, though unobserved; consequently disease had been actually arrested by the fourth inunction; and the healthy action thus set up, would doubtless have continued, for a time at least, if the mercury had been omitted on the fifth and following nights. The injury inflicted on the gums, therefore, was wholly unnecessary to the immediate restoration of health. The effect has been sudden, and probably instantaneous,—but will it be lasting? Probably not; and the practical question is: Would the effect have been rendered, in any degree, more permanent or satisfactory, by persevering in the mercury? It is now pretty well agreed, that no advantage would have resulted from salivation; for sores which had become healthy at the commencement of a mercurial course, have been but too frequently observed to retrograde under a protracted ptyalism. And the same thing has been observed under a mild but long-continued course, affecting the gums but slightly.

Under the mercurial irritation in any and every degree (whether from the consequent exhaustion of the *vis vitæ*, or from whatsoever cause), the latent virus, if any exists in the system, is liable to break out in an aggravated and destructive form. It is, therefore, not only useless, but in some degree dangerous, to persist in the use of mercury for a single day beyond the date of a visible improvement in the disease. It is, however, often necessary to have recourse to a second course, or even a third or a fourth, in order to effect the final destruction of the disease. Each succeeding course must be more energetic than its predecessor; otherwise little or no effect will be produced. The courses should also be short and distinct, and should be so managed as to arrest disease without disturbing the general health. The case should be watched *day by day*, and an improvement in the disease, ever so slight, be it real and satisfactory, should be regarded as the signal for arresting the course. Then aperients and tonics should be substituted for the mercury; and the very first appearance

of a return of the disease indicates the necessity of a renewed administration of mercury in doses twice as large as the first. By this means disease may often be arrested in an incredibly short time; and when the system is again purged from the mercury, a third course may be administered as a preventive, suspending the mineral as soon as fetor is observable in the breath, or a bitter metallic taste complained of by the patient.

The whole of this practice, which has proved very generally successful, is founded upon the fact, that the action of mercury on the disease is sudden, and of short duration. It is that of a shock; and the impulse appears to be expended upon the organic nerves. In what way such an action on these nerves can permanently destroy a blood disease, it may not be easy to explain:¹ but that the final results are not compromised by the limited duration of the mercurial action is quite certain. Indeed, the radical cure of the disease never proves so difficult as where mercury has been administered in large doses for many consecutive months. The debility thus produced too often renders the system a helpless victim to the disease. Whereas, by short and vigorous courses, the vital powers are roused and invigorated, the appetite is increased, the digestive organs become active, sleep is procured, and the disease appears to yield rather to the *vis medicatrix nature* than to any specific anti-syphilitic virtues inherent in the mineral.

These views may appear opposed to the experience of many practical men, who, failing to effect a radical cure of syphilis by a short course of mercury, have seen the disease annihilated at length by a persevering use of the remedy for many weeks together, to the severe injury of the gums. Such cases occurred in large numbers in the early part of my practice; and it was once my opinion, that the benefit was due to the unremitting use of mercury. More recent experience, however, has made it evident, that the disease would have yielded quite as fully to a shorter course, and that the benefit derived from the continuous use of mercury, was all due to the shock produced at the commencement of the course.

A very powerful, yet incidental, illustration of the principles above enumerated, has been furnished by a recent publication from the pen of Mr. Langston Parker. This gentleman has found that by a process of fumigation, the beneficial effects of mercury may be secured with more certainty and less inconvenience than by the usual methods. The advantage is evidently derived from the rapidity of absorption and consequent suddenness of effect. Mr. Parker's practice must, of course, be limited by its attendant inconveniences; but the principle is capable of almost universal appliance. We have had long experience of its value in the use of mercurial inhalation. The fumes of the oxides of mercury received into the fauces have been found to produce the specific effects of the medicine when the system has been proof against inunction. But it is easy to apply the principle to any

¹ The rapidity with which diseased action is exchanged for healthy, under the influence of mercury, reminds one of the chemical changes produced by galvanism. We know little as yet of animal chemistry; but if we look at the action of mercury as electro-magnetic we shall be able to account for many otherwise obscure phenomena.

mode of introducing mercury into the system, which it may be found convenient to adopt.

It will be most needful, however, to be aware of the possibility of severely salivating the patient by an unguarded exhibition of a very few energetic doses. This danger will occur to the mind of every prudent practitioner, and will deter many from adopting the method of treatment above described. But the danger need only be foreseen to be avoided. We must make it our special business, before commencing the therapeutic course of mercury, to administer an experimental course, just to ascertain exactly the degree of mercurial susceptibility inherent in the constitution of the patient. This may be done in the most guarded way; and, if the patient is unusually susceptible, this first trial may prove therapeutical. If not, it will serve to indicate the dose which the patient will bear with impunity.

Neither must it be forgotten, that we now and then meet with a subject wholly and incorrigibly intolerant of mercury; and, even if we can coax the vascular system to bear it, we irritate the nervous tissues beyond endurance. These cases are rare exceptions to a very general rule. Strumous subjects also are apt to bear mercury ill; but by combining the mineral with the preparations of iron, and giving the patient the advantage of the coast, the open air, and a mild season, the difficulty is often overcome, especial caution being requisite lest the gums or glands should suffer irritation. When pulmonary tubercles are discoverable, even in a latent form, mercury is to be avoided. Nothing is so likely to promote their development and maturation as a mercurial course. When syphilis and phthisis co-exist, the case is hopeless.

Much importance is attached by some practitioners to the selection of the medicinal preparations of mercury; some giving the preference to one form or mode of introduction, others to another. Without depreciating the real value of these preferences, it may be questioned whether any general rule can be laid down. Every preparation has its objections as well as its advantages; but both the one and the other are casual, not inherent. The chloride is active and energetic, and invaluable in cases of iritis, where there is no time to be lost; but it is apt to create undue irritation in the bowels. Inunction is a safe and, generally, a sure mode of introduction. But it is a dirty and inconvenient practice; and now and then we meet with cases in which the absorbents of the skin refuse to perform their office: neither can we in any case ascertain how much mercury is actually absorbed. The blue pill is a mild and convenient form for the first course; yet it is liable to remain unchanged and inert in the bowels, or, on the other hand, to be converted into the chloride or bichloride. The latter preparation is often active and useful, but it fails in safe doses to create the salutary shock so necessary to the full effect of mercury on the system. Fumigation, either general or local, presents perhaps more advantages, when it can be conveniently had recourse to, than any other mode,—but it is a difficult and delicate question, how to regulate the dose. It is my usual practice to begin the course with two or three grains of blue pill every night for three nights, by way of experiment. If this produces no effect, an aperient is administered, and after it, five or seven grains of blue pill night and morning, until its salutary

effect becomes visible. In the second course, the dose is increased ; in the third, inunction is preferred ; in the fourth, inunction, together with frequent doses of calomel, with or without opium. In strumous cases, the bichloride, combined with the compound tincture of cinchona for adults, and the grey powder for children, with some preparation of iron, have been found most useful.

In all cases, regard must be had, not only to the original constitution of the patient, but to his present condition. Both plethora and anæmia are conditions highly unfavourable to the advantageous exhibition of mercury. In the former case, depletion must precede the mercurial course : in the latter, the preparations of iron may be combined with mercury, or otherwise administered.

26, Bedford Square, January 1851.

ON INTERNAL STRANGULATION OF THE INTESTINES.

By HENRY HANCOCK, Esq., Fellow of the Royal College of Surgeons of England : Surgeon to Charing Cross Hospital.

(Read before the Medical Society of London, January 4, 1851.)

CASES of Internal Strangulation of the Intestines are so obscure, so difficult of diagnosis, and so fatal ; their *post-mortem* examination so frequently develops the probability of relief from early operation, whilst our knowledge upon the subject is so very defective, that great benefit would ensue if all cases occurring in the practice of individuals were recorded, and therefore I am induced to submit the following cases to the attention of the Society ; for although they terminated fatally, they may, as collateral evidence, strengthen the hands of the surgeon, and justify him in proceeding to operation earlier than has hitherto obtained.

CASE I. I was, on Sunday the 3rd of November last, requested by my friends, Messrs. Brown of Lewisham, to see the gardener of a gentleman residing at that place. I am indebted to them for the following particulars.

E. P., married, æt. 51, an under-gardener, who had resided in his situation for twenty-three years, about five feet six inches in height, of stout proportions, of active and temperate habits and healthy, except having had inguinal hernia on the right side, for which he had constantly worn a truss for ten years ; was on the 17th October, 1850, assisting in raising a tree which had been blown down, and using great exertion, suddenly felt a sharp pain across his abdomen, which almost caused him to faint. He went home, and took some hot brandy and water ; the pain subsided in about two hours, and he resumed his usual employment, and thought nothing more of the pain or the circumstance of straining himself. On Wednesday, October 30, thirteen days after the strain, he complained of a slight pain in the stomach, which he attributed to his bowels not having been sufficiently opened for two days, for although on the day previously he had had several evacuations after taking some pills, he felt unrelieved, and complained of pain across the umbilicus. He was ordered eight grains of Dover's powder, with three