An Address ON THE CHRONIC ABDOMEN.*

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Our surgical colleagues describe a condition which they speak of, in their clinical slang, as the "acute abdomen." There is, however, another condition more familiar to the physician which may be designated with equal propriety the "chronic abdomen," and if the one is, as we are told, a catastrophe, the other is certainly a conundrum.

The subject of the chronic abdomen is usually a woman, generally a spinster, or, if married, childless and belonging to what are commonly termed—rather ironically nowadays—the "comfortable" classes. To such a degree, moreover, do her abdominal troubles colour her life and personality that we may conveniently speak of her as an "abdominal woman." An abdominal man, on the other hand, is by comparison a rare bird, and when caught has a way of turning out to be a Jew—or a doctor.

SYMPTOMS.

The symptoms of the chronic abdomen are many, various, and ever-renewed. Some of them refer directly to the abdominal organs, others are of a more remote and general character; but, whatever they are, they are always described with great prolixity and in minute detail. Amongst those most commonly complained of are abdominal aches and pains of various sorts and in various places, but especially in the right iliac fossa. Instead of actual pain the patient may speak of a "raw feeling inside," or of "an indescribable sensation in the stomach," or of a "dragging." Constipation of greater or less degree almost always figures prominently in the list of symptoms, and flatulence is also frequent. Amongst the commoner remote symptoms one finds a feeling of general weakness or "exhaustion" (especially after an action of the bowels), "mental and physical torpor," "inability to think," "a poisoned feeling," and "neuralgic pains all over." Headaches and insomnia are also very frequent, and a great many patients complain of undue susceptibility to cold and of a constant catarrh in the throat.

EVOLUTION OF THE CHRONIC ABDOMEN.

If one inquires of a patient with a fully developed chronic abdomen how her lamentable state has been arrived at it will be found that the process of evolution is fairly constant. These sufferers are very fond of presenting anyone whom they may consult with a full record of their previous medical history and experiences, and the following are a few such records as supplied by the patients in their own words. They may be taken as typical.

CASE I.

Mrs. L., aged 47, gave the following record of her various illnesses and their treatment:

Bad fall at 2 years of age. Rheumatic fever at 13. Always bad digestion and overloaded bowel. Married at 21. After birth of first child, ulceration of rectum. Uterus never strong.

1900: Two operations for fistulae and abscesses—tumour (fibroid) discovered in uterus. Always feeling ill from auto-intoxication (enemas curing this) and rheumatism in knees (cured by inoculation).

1901: Cocaine poisoning.

1902-1909: Cures at Aix, Strathpeffer, Bath, Carlsbad, and Lausanne.

1910: Operation for "chronic appendicitis" and six tumours in uterus. Intestines never felt in place or strong after this. Same year: Pyorrhoea; inoculations.

1911: Cancer of the breast—operation.

1912: Went to Bath for "nerves." Several teeth extracted.

1913 (March): Played golf for first time and thought intestines were dragged down. Jumped out of train and ran hard (April 1st); inside never comfortable since then; pains in bladder; nerves!

May: Small fibroid discovered. Uterus half size too large. Inflammation of bladder, uterus, and general tissue; nerves terribly bad; douches, etc., in a home.

August: Contrexéville (concentrated urine and excess of uric acid). Contraction of intestines; pains in kidneys; always pain in bladder—diarrhoea. Nerves—nerves. Constipation. Passed large quantities of sand.

Now: Pains in bladder—intestines dropping. Rectum feels as if pressed on. A tight belt to push up all inside—makes nerves better. Always "intoxication"—constipation and flatulence.

CASE II.

Miss M., aged 48. Seen in 1913, complaining of constant acidity, flatulence, vomiting of green fluid, etc.

History.

At 5 years of age had severe jaundice and stoppage of bowels; always constipated.

At 20: Influenza and bronchitis with prolonged fever; this left "stomach trouble" which persisted.

At 32: "Dilatation of stomach," and was in bed three months.

At 33: Uterus curetted; indigestion better for a time.

At 36: Complete hysterectomy and appendicectomy. Digestion much better for over a year.

At 38: Digestion bad again—stomach lavage—much benefit for a month.

At 40: Cholecystitis and "ulcer of stomach."

At 42: Rest cure in hospital. Stomach massage. "Much benefit."

At 48: Exploratory operation. Profound visceroptosis with dilatation of stomach and pylorus. Stomach and colon fixed with catgut sutures.

One and a half years later she wrote:

"... Am glad to say I never now (since operation) get those turns of agonizing pain in region of gall bladder which used to suggest gall stones; but there is always a sore burning spot there, sometimes pretty bad, with often slight cutting sort of pains (but only slight), and it goes when the apparent cause of corrosion of wind or food has moved.

"My old 'sore spot' (on left side under lowest rib near middle) has come back, and I am in constant distress from the burning, gnawing sensation right across below waist line. Also all over back and under shoulder blades.

"I have really been little more than an invalid for months, finding it most difficult to continue my teaching, having scarcely strength to speak. It seems to be the continued acidity and tremendous flatulence, and the sensation of weakness (I suppose) is because the heart is being almost continually choked with dilatation of stomach. About a month ago it was 'murmuring'—I do not know if it is still doing so. It feels as if a heavy weight is pressing the heart and sometimes there is neuralgic pain in its region and in left arm and I can't breathe easily. But doctor says it is not due to heart itself; that appears strong, but the effect of faintness and exhaustion is very bad sometimes, though occasionally I am able to forget it for a day or more. Of course it hinders sleep when bad. Am glad to say the fearful violent jumping—which was such a trial all the time in hospital and for eighteen months after—is almost gone and the rheumatism is better and the sudden turns of sickness less frequent. I rest all I can and do most of my work at home, so that if I find a heart turn coming on I can drop lesson and let off the tremendous flatulence in violent noisy 'spasms.' If I check them I become helpless.

"I have just started to try and take olive oil (a large teaspoon a day) and since doing so have felt easier and had no spasms, but this may be chance, but shall persevere. Bowels need 20 or 25 senna pods now to move them."

CASE III.

Miss J., aged 29. Seen in January, 1908. She had always been delicate, especially as regards digestion.

History.

June, 1889: Peritonitis. Abscess came away into rectum.

January, 1897: Entered on office work—health became worse.

October, 1898: Influenza (high temperature) followed by jaundice.

Since have always had constipation.

1899-1900: Indigestion becoming worse.

June, 1900: Operation—two abscesses in glands on right side of abdomen, one of which had broken; considerable amount of matter; slight perforation. Since digestion has always been very troublesome.

1902-4: Digestion becoming worse and worse.

October, 1903: Six weeks' "rest cure" in bed with massage; no permanent improvement.

February to April, 1904: Being in Switzerland, six weeks' treatment in hospital there; no improvement.

May and June, 1904: Seven weeks' treatment in Zurich; no improvement.

October, 1904: Operation (gastro-enterostomy)—pylorus said to be fixed by adhesions. Digestion has since been very indifferent.

Since last date, pain and distension at intervals of from two to four weeks, lasting from periods varying from one to six or more weeks.

CASE IV.

Mrs. T., aged 41. Seen 1917, complaining of pain in epigastrium and left hypochondrium, flatulence and acidity.

In 1907 right kidney fixed.

In 1908 appendix removed.

In 1909 operation for tubal pregnancy.

In 1913 other tube and ovary removed—since then indigestion.

In 1915 rest cure.

In 1917 exploratory operation—nothing found except that the omentum was adherent to the scar in the right iliac region.

Remained well for four months, when epigastric pain returned acutely with the symptoms described above.

* Delivered before the Clinical Society of Manchester, March 8th, 1923.

CASE V.

Mrs. H., aged 53. Seen 1915 for obstinate constipation; "neuritis" in various parts of the body, swelling and tenderness of the breasts, etc.

History.

1886: Haemorrhoids removed.
1887: Curetting.
1888: Five cauterizations of uterus.
1898: Haemorrhoids removed again, and bowel stretched as far as they could reach. This resulted in loss of power in lower bowel and aggravated the trouble.
1905: Uterus and large fibroma removed and one ovary, in which was a cyst. The surgeon thought the fibroid growth behind the uterus was strangling the intestine, but the latter was not improved after the operation.
1910: Bismuth test and exploratory operation. Five places where tight bands had grown round the intestines—worst place left side of the colon three times round and a very thick string. It left a deformed colon, but as the place seemed elastic they did not cut it out.
This trouble continues, and since May last I have had mucous colitis. The slightest solid undigested matter causes stoppage, and there is constant delay. I only make matters go at all by daily injections and aperients. The poisoning is resulting in nerve pain and swellings in different parts of my body.

It will be observed that the road to chronic abdominalism is paved with operations. The usual sequence seems to be this: the patient begins by complaining of pain or discomfort in the right iliac fossa, for the relief of which the appendix is removed. For a few months she is better. (It is characteristic of the disease that almost any new treatment, and especially any operation, produces benefit *for a time*.) Soon, however, her symptoms return. This is put down to "adhesions," and another operation is performed to remedy these, with the same result as the first. Warming to his work, the surgeon undertakes bolder and yet bolder proceedings; a complete hysterectomy is probably carried out or some short-circuiting device, or the colon is fixed, or even partially removed, but still the patient is not cured of the pains, whilst the state of the nervous system has steadily worsened.

It is interesting to note at this point how medical history repeats itself. Writing in the eighties of last century on the abuse of gynaecological operations in the treatment of visceral neurosis, Sir Clifford Allbutt said of the abdominal woman of that day:

"She is entangled in the net of the gynaecologist, who finds her uterus, like her nose, is a little on one side, or again, like that organ, is running a little, or it is as flabby as her biceps, so that the unhappy viscus is impaled upon a stem, or perched upon a prop, or is painted with carbolic acid every week in the year except during the long vacation when the gynaecologist is grouse-shooting or salmon-catching, or leading the fashion in the Upper Engadine. Her mind, thus fastened to a more or less nasty mystery, becomes newy apprehensive and physically introspective, and the morbid chains are riveted more strongly than ever. Arraign the uterus and you fix in the woman the arrow of hypochondria, it may be for life."—On Visceral Neurosis, Goulstonian Lectures, 1884.

Substitute "surgeon" for "gynaecologist" and "appendix" for "uterus" and the parallel is complete. At that time the uterine organs were the scapegoat of the abdomen; now it is the appendix—if, indeed, it is not already the teeth or the tonsils.

Meanwhile, and between the more dramatic entries and exits of the surgeon, the physician has not been idle. The patient has been thoroughly "investigated"—possibly at a "team-work" clinic; she has certainly been provided with an x-ray picture-book of her entire alimentary canal; her teeth have been extracted and her tonsils excised; her motions have been analysed by a biochemist and her mind by a psycho-analyst; she has had several rest cures; she has been given prolonged courses of vaccines, of intramuscular tonic injections, of intestinal antiseptics, and of endocrines; she has been fed on sour milk or minced beef or raw vegetables; she has experienced various forms of massage, has been subjected to the latest kinds of electrical current, and has had her colon repeatedly washed out at Plombières or Harrogate.

In a word, she has run the whole gamut of "modern" therapy, has submitted to every "stunt" and conformed to every fad—but is none the better. And just as she can only escape the attentions of the surgeon when—as Sir Clifford Allbutt said of the gynaecologist—he is "grouse-shooting or salmon-catching or leading the fashion in the Upper Engadine," so she is only at peace from the physician when the latter is recruiting his exhausted energies by a short holiday at an inexpensive seaside resort.

PHYSICAL AND MENTAL STATE.

On examination of a fully developed case of the chronic abdomen one will find that it has both a physical and a mental aspect, and that the latter is often the more important of the two.

Physically the patient is undernourished and sallow. To use an abominable term current at the moment, she looks "toxic." The abdomen is of visceroptotic shape and the surface criss-crossed with scars, the signs-manual of the surgeons who at one time or another have conducted exploring expeditions into the interior. The stomach is dropped and splashy and the right kidney more or less movable; there is tenderness at various points over the colon. Constipation will probably be obstinate, and the motions usually show the presence of mucus or even membranes.

The mental side of the case is more difficult to analyse. There is notable, in the first place, a general discontent, "disgruntlement," and peevishness, added to which is an intense egotism which leads the patient to regard herself and her symptoms as of the utmost importance. In a play called *The Mollusc*, which appeared some years ago, this aspect of the abdominal woman was admirably depicted, but I noticed that all my patients of this type who went to see it simply remarked, "How absolutely like Mrs. So-and-so!" None of them recognized the Mollusc as herself. Needless to say, the patient is also intensely introspective and hypochondriacal. She studies and catalogues her symptoms with minute care, and is expert in a knowledge of the action of drugs and a connoisseur of doctors and "specialists."

"She has seen heaps of specialists," a doctor wrote to me of a typical example, "and no doubt will continue to do so. You will be amused and interested to hear that she promptly went off to another specialist after seeing you."

The operation habit has often a strong hold on her. Added to all this, and most trying of all, is an intense craving for sympathy which must be satisfied at all costs, and it is noteworthy that there is usually someone in her entourage who is always ready to supply the need. Sometimes an unmarried daughter is the victim; sometimes it is an over-devoted husband. One should not, however, commiserate him too much, for, like the husband in *Bunty*, he is often a "weelin' victim" and always ready to kiss his chains.

Her incessant demand for sympathy and understanding makes the abdominal woman a veritable vampire, sucking the vitality of all who come near her. Half an hour with her reduces her doctor to the consistence of "a piece of chewed string," and is more exhausting to him than all the rest of his day's visits put together, for she is always discovering fresh symptoms, will not admit any improvement in her condition, and has an objection to everything that is proposed. Crabbe must have had her in mind when he wrote of the patients—

"Who with sad prayers the weary doctor tease
To name the nameless ever new disease."

"My *bête noire*, Miss —, is coming to see you soon," a medical friend feelingly wrote to me of an extreme example. Fortunately, however, she never sticks to one doctor long, but is always rushing off after fresh advice, and her nurses can always be changed at short intervals; if they were not, they would go mad.

THE NATURE OF CHRONIC ABDOMINALISM.

When one comes, then, to analyse a case of the chronic abdomen, it is found to consist on the physical side of a state of visceroptosis along, usually, with a greater or less degree of muco-membranous colitis, and, on the mental side, of that morbid psychological state which was sketched above. But now comes the conundrum. How can the physical basis produce the multiform symptoms of which the patient complains, and what is its relation to the mental side of the picture?

It is common knowledge, of course, that many women have pronounced visceroptosis without being much affected by it either physically or mentally. Why, then, do these particular patients appear to suffer so much? Again, what part does muco-membranous colitis play? It is true that one rarely sees a sufferer from that disease who does not exhibit in greater or less degree the mental characteristics of chronic abdominalism, but what is the relation of the one to the other? Does the colitis affect the mind, or is it the other way round? I need not remind you, of course, that there is a school of thought which would attribute all the remote

physical symptoms of chronic abdominalism, and presumably the mental symptoms also, to "auto-intoxication." This doctrine has been so much discussed in recent years that I do not propose to weary you with a further consideration of it; but although there may be an element of self-poisoning in some of these cases, I feel bound to express the opinion that it will not account for all the symptoms. Nor have I any new theory to offer. There remains, when all is said and done, a good deal of mystery about the chronic abdomen, and it needs further study—especially, perhaps, from the psychological side and from the standpoint of the relation of the vegetative nervous system to the emotions.

TREATMENT.

In the treatment of the chronic abdomen the most important thing is to catch the patient early. If she has once set her feet on the slippery slope which leads to successive operations she is undone. A timely "fattening cure," followed by the provision of an efficient abdominal support, regulation of the bowels by the mildest laxative, supplemented if necessary by simple enemas, an abundant but unirritating diet, soothing of the nervous system by bromides—these are the physical measures. On the mental side the patient should be encouraged to take up some definite occupation which will provide her with an interest outside herself.

In an incipient case such means may suffice, but if one has to do with a confirmed example of the disorder one's task is much more difficult. At the outset the question of operation is sure to arise. The patient will probably have already had her appendix removed at least, and if any further operation is decided upon it is best, I believe, to make it of a purely exploratory character. The incision should be large enough to permit of a thorough investigation of all the viscera—for even the chronic abdomen may be the seat of organic disease—any bands or kinks may be dealt with, but short-circuits are to be avoided at all costs, and organs should not be removed unless they are demonstrably diseased. Whether fixation of the colon is worth while I do not know, as I have not seen a sufficient number of cases in which at least two years have elapsed since the operation. Immediate benefit is no criterion of permanent relief, for, as I have already pointed out, these patients are always improved for a time by a new treatment. Colectomy of any degree is a grave proceeding not to be undertaken lightly. In any case a thorough exploration may at least satisfy the patient's mind as to the absence of serious organic disease, and so pave the way for a healthier mental attitude in future.

Apart from operation, the physical treatment will proceed on the same lines as in an early case, but success is much more difficult to attain.

There remains the mental side to be dealt with. What is to be desired here is something which will dislocate the patient's mind from its perpetual revolution round her umbilicus and set it open to wider horizons. The war cured some and loss of fortune and bereavement have cured others; but these are drastic remedies which it is not within our power to prescribe. Suffragettes undoubtedly was the salvation of some abdominal women, but the suffragettes are now experiencing the tragedy of fulfilled ambition, and probably many of them have relapsed. Marriage, and the advent of a child—even an adopted one—are often potent remedies, and the fancy religions—Christian Science, Theosophy, Spiritualism, and so forth—may be ways of escape. One of my patients, an ex-nurse (and ex-nurses furnish the most malignant types of the chronic abdomen), once consulted a palmist, who after looking at her hand said, "If I were your husband I would take a stick to you!" The advice was sound, and might often, perhaps, be effective. Whether the methods of M. Coué will help these patients remains to be seen. The difficulty is that many of them, despite their protestations to the contrary, really lack the will to be well, and their daily litany is: "Day by day, and in every way, I get worse and worse."

I confess, therefore, to some feeling of despair as regards the treatment of the more advanced cases of the chronic abdomen, and on the whole I am inclined to think that the less one has to do with them the better both for one's peace of mind and one's professional reputation. Yet, unfortunately, these cases are likely to increase in the future, for as civilization gets more complex, as fewer women in the upper classes marry, or, being married, have fewer and fewer children, all the factors which favour the development of chronic abdominalism will be more intense. It is a bleak prospect.

Hunterian Lectures

ON

MAN'S POSTURE: ITS EVOLUTION AND DISORDERS.

GIVEN AT THE ROYAL COLLEGE OF SURGEONS OF ENGLAND

BY

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[Abstracts.]

LECTURE VI.—THE EVOLUTION OF THE HUMAN FOOT.

WHEN dealing with the evolutionary history of the spine, thorax, abdomen, and pelvic floor we found that the human condition was the last of a series of steps which are seen to begin in the small orthograde ape, the gibbon. The missing evolutionary stages are not those which bridge the hiatus between the great anthropoids and man, but those which fill the gap between the orthograde gibbon and the older pronograde condition seen in monkeys. When, however, we came to consider the structure of man's groin and, to lesser extent, his pelvic floor, we found that the evolutionary gap was seen to lie between the human and the anthropoid stages. This is the case as regards all parts of man's lower extremities; more particularly is it true of his foot. Even in the gorilla, the anthropoid which shows the nearest approach to man in the use of its lower extremities for support of the body, the great toe is free and used as a grasping thumb.

The central evolutionary problem of the human foot is: How did the thumb-like great toe lose its independent nature and become merged in the metatarsal series? By what process did the free mobile great toe of the prehensile primate foot come to form the principal part of the rigid plantar arch of man? The transformation is all the more remarkable when we remember that a prehensile hallux was present at the first dawn of the primate type of animal, and has retained this form throughout the long history of the order, with the exception of that aberrant being, man.* In him the hallux has reverted to a primitive position in the metatarsal series.

Has the Foot of Man been Evolved from one which was Prehensile?

At the very outset this question must be asked and answered: What evidence is there that the human foot has passed through a prehensile stage? The human foot has the same structural composition as the ape's foot—the same bones, the same muscles, the same ligaments; it is only their arrangement and form that have become modified in the human foot. If in the higher primates we compare bone after bone, muscle after muscle, ligament after ligament, we find in every case a series which leads from the type seen in the pure prehensile foot of monkeys to the stage reached in the human foot. Take, for example, the three contrahentes muscles to be seen in the sole of the monkey's foot; they serve to approximate the heads of the metatarsal bones. In the sole of the human foot they are represented by mere fibrous strands; the story of their degeneration can be read in the feet of the orthograde apes. They are still present in the gibbon; they are in the retrograde stage in the chimpanzee, they are almost as much reduced in the foot of the orang and gorilla as in that of man. The interosseous muscles of the monkey's foot do not lie between the metatarsal bones, as in the human foot, but on their deep or plantar aspect. In the gorilla and orang they are set as in man; in the gibbon they occupy an intermediate position. Yet as the interosseous muscles appear in the foot of the human embryo they are set and arranged as in pronograde apes. In the course of development they take up their intermetatarsal position. We shall cite, when dealing with the structures which maintain the arch of the human foot, other evolutionary links which make us certain that the human foot is but the culminating stage in a series foreshadowed by anthropoid feet.

Flexion Lines of the Sole.

No more convincing evidence of the prehensile history of the human foot can be cited than the flexion lines to be seen

* See Professor Wood Jones's *Arboreal Man*, 1916.