

HYDROPATHY:

OR,

THE NATURAL SYSTEM OF MEDICAL TREATMENT.

An Explanatory Essay.

BY

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P R E F A C E.

I CANNOT too strongly forewarn the reader that the following Essay is not to be regarded as, in any sense, making even an attempt to give a systematic account of the hydro-therapeutic system of cure. That has been already so ably and so fully done in the admirable work of Dr. Gully, in the sagacious and lucid treatises of Dr. Edward Johnson, and in the writings of various other authors, as to leave nothing, in the meanwhile, to be desiderated in that direction. It has often struck me, however, that a short treatise, in which the rational grounds of hygienic medicine and the present position of the medical art should be briefly set forth, might not be without value—and it has partly been with a view to that object that this Essay has been written.

On more personal grounds, I intend it also as

a confession of medical faith. But my strongest motive for publishing it has rested on the hope that possibly, by a fair and candid statement of my opinions in regard to the present condition of medicine and its prospects, I might assist, however feebly, in bringing about that reconciliation between the practitioners of old physic and the more modern natural school, which is so desirable at once for the interests of medicine and the welfare of society—and I can truly say that, feeling so strongly the importance of this reconciliation as I do, I should be more than happy if I could flatter myself that I had contributed ever so little in bringing it about.

E. W. L.

MOOR PARK, FARNHAM,
May, 1857.

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HYDROPATHY;

OR,

THE NATURAL SYSTEM OF MEDICAL TREATMENT.

AFTER the lapse of twenty years since the introduction of Hydropathy into England,—after it has been extensively written about, and has been the talk of thousands who have benefited by its appliances, and who have, in consequence, endeavoured by a rehearsal of their experiences, perhaps not always judiciously set forth, to extend the bounds of its usefulness,—after having been scoffingly attacked by the orthodox medical press, and as repeatedly defended by its own converts, it may perhaps seem strange, if anything of the kind were so, that the system should still be not only imperfectly known, but often ridiculously misunderstood; rarely or never, at least, appreciated with impartiality and fairness. Why this has been so has proceeded from a

variety of causes, of which I shall now endeavour to indicate the principal.

First, Hydropathy, as a system of therapeutics, and considered apart from general hygiene, is comparatively new, and it will not be surprising to those who are acquainted with the history of human opinion, that it has had to struggle against the whole banded conservatism of the medical profession, in the first place, and of the great majority of the general public, who, in such matters, are very naturally and uninquiringly led by it. In this Hydropathy has only fared, and will probably continue to fare for many a long day, like new systems of every kind, and he would have been a sanguine man indeed who should have looked for any different result. The unfailing ordeal had to be undergone here, too, as in other directions, of open contempt and aversion first, proceeding from downright selfish prejudice; of honest incredulity next, on the part of many who disbelieve without sufficient inquiry;—all this preparatory to the later stage of “damning with faint praise,” itself the invariable precursor of an unwilling, not very graceful, but

compulsory final acceptance. That is pretty much the order, I think, in which the strongholds of prejudice generally yield to the invincible sap of truth. It is unnecessary to cull instances from the history of every human science and art to vindicate this position: all the world knows them, and it would be a mere waste of time to go over anew a field so often trodden before, however painfully instructive and interesting might be the result presented to the reader. Suffice it then to repeat, by way of explanation, that Hydropathy, as a systematic means of cure, is still new, and has had, by consequence, to battle its way into notice, step by step, as a simple matter of course.

But, secondly, and as an additional impediment, it is unfortunate enough that the very term "Hydropathy" is a palpable misnomer. That term not only does not give a correct and complete (or rather correct *because* complete) view of the system which is practised under the name, but it has a tendency to mislead the great bulk of the public, who cannot be expected, especially in matters of science, to follow

things beyond the veriest surface, and who do not. "What's in a name?" To the many, often a very great deal—nay, everything. The more reason, therefore, that accuracy should be observed on this point at least. Hydropathy, then, is a misnomer—only one degree more correct than its ordinary synonyme, "The Cold Water Cure." The former designation is faulty because of its incompleteness, because it in no-wise indicates the sum total of the treatment pursued under it; the latter is a degree worse, inasmuch as it not only does not convey the whole truth on the subject, but is calculated, as I shall show in the sequel, to give an impression which is actually in a large degree false. In short, the one term is negatively erroneous and mischievous, the other is very positively so. Such is the anomalous predicament under which this most rational and scientific system, along with those who cultivate it in our day, unhappily labours.

But the explanation is not difficult. It was the fortune of the new method of cure to be discovered by a man of singular natural genius and of a penetrative sagacity rarely sur-

passed. His natural insight was only equalled by his power of patient and continuous observation, and by his capacity for generalizing correctly from the facts he observed. Such a man was this natural sage, the Silesian peasant, Vincent Priessnitz. To this humbly born philosopher was it reserved, in an age stiff with the learning of the schools, to work out, establish, and promulgate to the world in the most convincing of forms, a system of medical treatment, so simply beautiful in its fundamental principles as well as in its details, so free from mysticism and dogmatic jargon, that it could not fail to arrest the attention of all rational, unprejudiced, and uncompromised men. All honour to this great benefactor of his kind for the boon he has conferred on our common humanity. Eternal thanks to him for the services he has rendered to the healing art.

Priessnitz, however, was not only fallible like other mortals, but, as the organizer of a new system, he laboured under disadvantages, from lack of scientific education, for which no amount of natural endowment could possibly compensate. Science comes not by intuition.

It is the accumulated experience, generalized into law, of whole generations of thinking men who have devoted themselves to its study, and is absolutely indispensable for him who would establish any system on a permanent unshakable basis. Nowhere is this more true than in the province of medicine. A man of intellect, indeed, may spring up from among the laity, and, by the simple force of unaided genius, may seize upon a great idea, in any department connected with medicine, which had escaped the whole array of its legitimate professors. Priessnitz did so; and he did more—he realized it in practice, to the benefit of hundreds of his fellow-beings. But he accomplished this not by an inductive chain of scientific reasoning, but through the agency of a tacit logic, irresistible to himself, and practically full of good fruits. His natural instinct, fortified by personal observation, led him direct to the right thing. It was an inspiration to be admired and wondered at. Very different was it, however, when Priessnitz attempted to deal with the more subtle phases of disease, or to embody in a scientific form, and explain to

scientific students and investigators, the faith that was in him and guided his practice. Here the scientific education became necessary, and he had it not. Accordingly, we are prepared for mistakes of every kind, and we have them. First, mistakes in practice. With all his acuteness, who is there that has the least acquaintance with the subject and does not see that it must have been so; that he must have committed again and again errors of the gravest nature in his treatment of disease, not only because of the crude methods with which he often experimented, but much more because of his absolute inability to diagnose correctly hundreds upon hundreds of the cases that were brought before him. How could it be otherwise? He had not, before he began to practise, gone through the laborious process of studying disease by the bedside—the indispensable condition of such knowledge. He was utterly ignorant of everything that could deserve the name of a scientific knowledge of such diseases as those of the lungs, the heart, the brain, and entire nervous system. And yet, with the rashness and presumption

of untutored genius, and strong only in his self-reliance, he did not hesitate to undertake the cure of these diseases—nay, of all diseases. In such circumstances, it need not be told to any man of sense, least of all to a medical man, that Priessnitz, as a physician, must necessarily have been guilty of most serious errors in his practice, although these may have been, and doubtless were, far more than counterbalanced by a splendid array of cases of successful cure—many of them of an extraordinary character, and from every quarter of Europe.

But if, from want of scientific knowledge, he was often wrong in practice, Priessnitz, it will be easily understood, was still oftener wrong when he attempted to deal with theory. By a flash of original conception, he had laid hold of a grand and bold idea of medical treatment, and that idea he had the rare happiness to carry out into practice himself, with a whole train of disciples. But there, unlettered as he was, he had to stop. It was no part of his privilege to be enabled to expound to the scientific world, and in the language of science, the new organon of which he was the herald

and the practical exponent; and wherever he attempted it, he failed. Stumbling at the very threshold, he called the new system "The Water Cure," wrongly and unphilosophically, but yet accountably enough. Undoubtedly the main ideas associated with the new treatment appeared to centre round the systematic use of water, administered, internally and externally, in such manner and quantity as had never been dreamt of before. Water was thought to take the place, and stand in complete lieu, of the old drug medication, which it supplanted. And, in a certain measure, this was true; but it never would have occurred to any physiologist to give the whole of this credit to the one element of water alone, passing over the equally important agents of air, exercise, and diet for the body, and healthy moral influences for the mind, the whole of which, combined, go to constitute the means whereby what is termed Hydropathy really works its cures; while they also constitute the true characteristic difference between the old system of medical treatment and the new—between the artificial and

too often empirical treatment by drugs, and the simpler methods, more conformable to nature herself, to preserve the human being in health in the first place, as well as to restore him when he has fallen away from the observance of the natural laws.

From what has just been said, it will be seen how inadequately the terms "Water *Cure" and "Hydropathy" express the treatment pursued under these synonymes; and it can hardly be sufficiently deplored that the natural system of medical treatment, made up of so many concurrent and interdependent appliances, should ever have received any such designation. In reference to the ultimate success of the system, through its general recognition by the profession and the public, I hold this to be a matter of the greatest importance, and I cannot help always feeling that a very large portion of the value of Priessnitz's gift was abstracted by the unscientific and wholly one-sided appellation he was pleased to confer upon it.

It falls to my lot, of course, nearly every day, to witness the general idea entertained by a

very large portion of the public in regard to the nature of the water-cure, and the establishments where it is practised. It amounts to something like this. To the general mind, a water-cure establishment is a country retreat for patients, where a kind of merry inquisition goes on from morning to night, a jocular torture in sport. The patients are pictured as everlastingly jibbering in cold and wet sheets, in a state, it must be presumed, of the highest discomfort, to say the least, and only tolerable to poor deluded folks who have well nigh parted with their senses; while the end of all is the aggravation of their several complaints, accompanied, in the imagination, with pet-cases of sudden death and horrors unimaginaire. I am drawing no caricature. I am only stating a fact which comes constantly within my own knowledge, and which the candid will admit, from their own experience, is not overstated. So much then for the name of water-cure, or cold water-cure, by way of amelioration, on the minds of the mass of the credulous, unscientific, and prejudiced public.

With the profession it is not much better, and with less excuse. Every rational medical man knows perfectly well that the water-cure is a misnomer, and is quite aware that the treatment at hydropathic establishments does not consist solely, nor even mainly, often, of the various applications of water. He knows it to be something very different; but yet I fear that the instances are rare of physicians possessing sufficient candour, disinterestedness, and genuine love of truth, to induce them to forget a foolish name in their appreciation of a wise and beneficent thing. It cannot be helped. Time alone, it is to be feared,

Time, the corrector where our judgments err,
The test of truth, love, sole philosopher,

will suffice to try the genuineness of this creed as of all others, and we and our successors must even abide the issue patiently, for beyond a certain slow pace its progress will assuredly not be driven.

But, it may naturally be asked, "If the name which designates your treatment be incorrect, insufficient, and misleading, why not change it?" I answer, it is by no means

easy; nay, except to a man prepared to risk a fortune in the attempt, it would be impossible. Unhappily, we received the terms *hydropathy* and *water-cure* as a legacy from Priessnitz, the recognised founder of the system, and these epithets have now become so identified with the peculiar kind of therapeutic treatment pursued under them, that, for the interests of greater scientific truth and accuracy, to attempt a change of name, would be almost tantamount to starting a new system—a new system, with its new converts to be slowly indoctrinated, and its new public to be slowly, slowly got together. It is hardly to be done.

So strongly, however, does the writer of these pages feel on this subject, that when, in pursuance of a long-cherished wish, he was about to establish an institution for the treatment of disease on hygienic principles, he at one time determined to do so under an altered name—a name which should really convey an adequate idea of the system—and take the risk of failure in the recognition of his attempt. But he soon discovered that in point of fact

there is no one single name which could have been pressed into his service as in itself conveying a *bonâ fide* impression of the hygienic method of cure, and co-extensive with it, and which should at the same time have been quite intelligible to the public. Accordingly, the attempt was abandoned, and the usual name retained; not without a strong conviction, however, that a time will come when all such special designations will be unneeded—lost in the catholic spirit which, under the wholesome influences of a more mature reflection, a more extended acquaintance with physiological and pathological laws, and, above all, a more enlightened professional candour, will one day unite the whole medical world together, after the strife of contending parties, so necessary perhaps in the meantime to the attainment of truth, shall have been finally played out, and that reconciliation shall have taken place which, however Utopian it may appear to-day, is, I feel convinced, as certain to be ultimately realized as it is in every regard so desirable.

I have spoken above of what Hydropathy is not—it is not the *Water-Cure*; and I now pro-

ceed to indicate what it truly is, and what are the simple natural methods by which it works its cures.

It is agreed on all hands, that there are certain fundamental conditions proper to the physical well-being of man, and every one must allow, from his own individual experience, that health is maintained or lost in exact proportion as these fundamental laws are observed or violated. This is one of the first important truths, in reference to our physical organization, which gradually dawn upon us as we pass from the state of unreflective childhood and adolescence into the more sober and reasoning era of matured manhood and womanhood. Often a very costly experience has forced the lesson upon us ; an experience founded on broken health and untimely decrepitude, even before the natural powers have come, or should have come, to their full growth. We then find that in our manner of life we have violated, sometimes through ignorance, sometimes in spite of better knowledge, certain organic laws, in obedience to which alone can the human being possibly enjoy physical health. Expe-

rience, I say, that bitter instructress, has taught us this lesson; for, alas! in our age of the world, she is, in such matters, too often the only teacher. Our youth do not learn such insignificant knowledge in our great public schools. There, in crude jargon, the ghosts of two dead languages mostly reign supreme, while a knowledge of nature and her ordinances, so far as relates to bodily health, has not yet been deemed a sufficiently important or interesting study to claim even a moderate share of that precious period in the history of every individual which is dedicated to lay the foundation of all future distinction, usefulness, and happiness.

Man, then, having sinned directly or indirectly, wilfully or ignorantly (and nature does not recognise the distinction), against the laws established for the maintenance of his physical powers, suffers for his disobedience in the loss of health, the first of earthly blessings. Having lost it, how is he most likely to regain it? That is the question.

No one need be told that from the days of Hippocrates and Galen down to our own time,

the treatment of disease has consisted principally of drug medication in one form or another. Indeed, it scarcely seems ever to have occurred to men that anything else was possible. Once diseased, the human body was to be "put through its purgations," or undergo the effects of medicine in some shape or other, before it could have a chance of recovery. Now, it may seem singular to say so, but I do not think this ought to be a matter for wonderment. On the contrary, it was most natural, and a different course would have argued an advancement of scientific knowledge in general, and an acquaintance with human physiology in particular, that could not by possibility belong to any but a most enlightened age.

We do not need to consult the ancient history of the healing art to be made aware that the medicaments in use by the early inhabitants of the earth consisted exclusively, in the first instance, of simples—not very different probably from the cowslip-wine and other innocent nostrums of our modern benevolent ladies. We see the same thing prevail to this day among the savage tribes of the American

forests and the natives of South Africa. This was, in fact, the first natural step of empirical practice, and it may be asserted that, on the whole, it would have been a grand boon to mankind if it had stopped here. In process of time, however, the vegetable kingdom did not suffice to satisfy man's wants or his prying curiosity, and the mineral world became gradually ransacked, in its turn, for therapeutic agencies—the two yielding, in due time, that goodly store-house of medicines (including nearly every known poison), that is familiar to us all under the name of the “Pharmacopœia.”

I say this was by far the most natural direction for the Art of Medicine to take in its first beginnings. I call it Art emphatically, for assuredly it did not merit the name of Science—a term which can barely be conceded to it even in our own day. The course of the *Art of Medicine*, then, was alike natural and inevitable, for the *Science of Physiology* did not exist. Was there not something, moreover, exquisitely captivating to the human imagination in the supposed occult mysterious working of drugs? What a scope was there here for that mysticism

inherent in us all, and how has it worked, from the first dawnings of medicine, through the twilight of the middle age, with its sore struggles after the elixir vitæ, and other cloud phantoms innumerable, up to the present time!

Physiology was unknown. Consider for a moment what the world's knowledge of physiological laws was, so late even as half a century ago. I speak not here of the general public alone, but of the medical profession. Why, it is notorious that, as a science, and compared with what it is now, physiology may almost be said to have had no proper existence at that epoch. It was in the veriest embryo state. None of those great discoveries had yet dawned upon us which are gradually revolutionizing medicine in our times. Digestion, circulation, respiration, innervation—all the animal functions were imperfectly understood. What knowledge there was on these subjects at all was loose, vague, and inaccurate, as any one may discover who chooses to read the physiological treatises of the time. This great and important field had been explored with comparatively small fruit; and so it was with pathology and patho-

logical chemistry, sciences, so to speak, of yesterday, notwithstanding their vast importance towards a due comprehension of disease and its rational treatment.

Now, in our schools of medicine, physiology is regarded as by far the most important branch of the theory or institutes of the science. In the University of Edinburgh, which in point of scientific advancement is certainly second to none, physiology is taught under its twin name, the "Institutes of Medicine." And most philosophically and significantly so; for does any rational man doubt that physiology, and a competent knowledge of it, is the necessary groundwork of the science of medicine, the sole and only avenue by which it can possibly be approached? It is the true key-stone of the arch, the scaffolding of the building, upon which all else reposes. In considering the philosophy of medicine, I start with this as a fundamental and unassailable proposition. And what is the necessary deduction? Surely this, that not until physiology had made considerable advance, not until physiological laws had become familiar to medical men, and their meaning

and value thoroughly recognised and appreciated, was it possible to construct an art of medicine on anything like a true scientific basis. Now what do the facts say? What does the history of medicine teach us? If the art of therapeutics had been reared on a philosophical foundation, we should have expected to find it resting on physiology, using it as a guide, proceeding upon its broad simple dictates, regarding it as indeed the true institutes of medicine, indispensable to its very existence as a philosophical system. Is it so? I do not ask the question to be answered by the mere dispenser of drugs, who, under various denominations, makes his bread in England by the treatment of all disease alike, acute and chronic, through the agency of powerful medicines, dealt out as a matter of the purest routine, and with all the easy confidence of an unreflecting empiricism. I ask the educated and enlightened physician, the man of reflection and honour, who values truth more than even success in life (and many such there are), whether he thinks in his heart that medicine, as it has hitherto been practised, and is still generally practised in our time, is

indeed rational in its method—whether it is based on sound notions of physiology—whether it has grown out of definite scientific principles—or is, on the contrary, to a very large extent, the result of a system of blind experimentation, unedifying to every philosophical mind, insecure in its results, often actually damaging to the human frame, even in those cases where it would appear to have been successful?

“It is not unworthy of remark,” says Professor Liebig, “that many physicians profess to hold chemistry in contempt, exactly as they do with physiology: that medicine reproaches physiology, and with equal injustice, as she reproaches chemistry. The physician who has learned medicine, not as a science, but as an empirical art, acknowledges no principle, but only *rules* derived from experience. The object of his inquiries is only whether a remedy, in any given case, had a good or a bad effect. This is all the empiric cares about. He never asks *why*? He never inquires into the *causes* of what he observes. From what a different point of view should we contemplate the ab-

normal or diseased conditions of the human body, if we were first thoroughly acquainted with its normal conditions, if we had established the science of physiology on a satisfactory basis!"

There are names in the profession which I could mention, whose owners have already recorded, unquestioned and unchallenged, their infinite distrust of medicine in its present state. To affirm thus much is only to notify, as it appears to me, that there are among us men of candour and philosophical enlightenment, men who seek after principle in the treatment of disease, and are not content, therefore, out of mere habit and a sluggish deference to authority, to hold on by a system in which no such general principle reigns,—men of courage, in fine, who will lift up their voice for reason and truth, careless of the consequences which their temerity may entail. And this being so, the greater to me is always the puzzle—why, the faults of the old system being so clearly appreciated, the merits of the new should not be fairly tested, and the new therapeutic ideas, embodied and carried out under the term hydropathy, should not receive

that countenance and encouragement which may seem to belong to them of right.

Hydropathy, then, is a system of therapeutics based on a practical recognition and systematic carrying out of the organic laws of health, as these are developed and explained by physiological science. I have already said that it required an advanced state of scientific enlightenment before men could think of building up a system of medicine on a physiological groundwork. First of all, physiology did not exist, and then it would have been too simple, too easily understood, to suit the minds of those who then directed the course of medicine. At length hydropathy came into being, and, by the practical sagacity and energy of Priessnitz, was made that grand discovery, the greatest, in my opinion, ever made in practical therapeutics, that chronic disease is, in most cases, treated successfully by the self-same means, systematically and perseveringly applied, which are allowed on all hands to be necessary for the preservation of health. Is this not a principle which appears at least natural and probable—and

have we not at length got hold of something like a guiding rule, a compass to steer by in a sea of perplexity? Now, the means necessary to the preservation of health—need I recapitulate them?—air, exercise, water, diet, healthy mental and moral influences—that is the sum of the whole. Will any one be startled to hear that in the combined and systematic application of all these means together reside the philosophy and the practice of what is termed hydropathy? Such, however, is absolutely the case. I use the term “systematic application,” be it observed, emphatically, because here is precisely the point of demarcation between general hygiene, by the observance of which we seek to maintain the body in health, and hydropathy, or the *natural means of medical treatment*, by which we profess to cure it when under disease. It is precisely in this systematic and regulated application of the natural agents of health that resides the distinguishing feature of hydropathy, that which elevates it into a scientific system of therapeutics.

When health fails from a derangement of

the general constitution, it may be stated broadly, as an important practical distinction, that in a large proportion of cases the disease is marked by one or other of two opposite and characteristic features. Either there is a superabundance of vital power, or, in other words, a general plethora, leading, when unchecked, to congestion or inflammation, and the whole catalogue of complaints that mark an unbalanced exaltation of the system, or there is a deficiency of the same vital power, resulting in another class of diseases, equally characteristic of its degradation or decay. If, instead of speaking of diseases individually, we make use of these two grand families or groups, we shall save time, and be none the less intelligible.

I submit, then, in reference to these two primary classes, into which we have found it convenient, for the purpose of practical illustration, to arrange diseases in general, that both of them can be more surely and more safely treated by the varied appliances of hydropathy than by any other system whatever. Let it be understood that I confine

myself at present, purposely, to a consideration of the cure of chronic disease, because it is chronic disease that we are called upon to treat, in the present position of hydropathy, almost exclusively.

First, of those diseases that have their origin in a plethora of the system, a disturbed superabundance of the *vis vitæ*. Let us see what are the means on which the hydropathic physician will rely for reducing the economy to a normal and healthy standard. There is first of all, as a matter of course, the regulation of the patient's diet—a means indispensable to the physician of every persuasion alike, and not to be overrated in importance. On that head I need hardly dwell. The second essential in the treatment will be exercise in the open air, more or less active, according to the patient's strength and the requirements of the case, but always insisted on as far as the constitutional powers will permit. What will this involve? Primarily, an increased secretion from the skin in the form of water, of carbonic acid, and of oil from the sebaceous glands, thus ridding the

organism of effete matters that served only to clog it. In the next place, we shall have a more perfect and more equally distributed circulation of the blood over the entire surface of the body, depending on the increased action of the heart and the improved condition of the skin; and from this will result a removal of congestion from the internal organs, a purification of the blood itself, and thereby a general healthy invigoration of the whole vital force. Such is a faithful representation of the chain of results accruing from the apparently very simple process of exercise. All perfectly physiological results—for the means employed is pointed out by physiology itself. Let it be remembered, further, that in dealing with exercise, under the natural system of treatment, we regard it as one of the most important elements of the cure, and insist upon its daily, almost hourly, use. The patient is not advised to take “a little airing;” he is ordered to walk for a prescribed length of time, he is again and again reminded of this imperative necessity—that it is to him a *sine qua non*—that he cannot be cured without it.

Thus much of exercise, to the full as important an element as any in the system of hydrotherapeutics—exercise, regulated day by day in extent, according to the end to be ultimately achieved. But we have other means, in concert with exercise, to assist us in our object. We are dealing, be it remembered, at present, with cases of the first division, and have to combat an overplus of mal-directed strength in the economy. Our aim is to bring back the oppressed, overloaded system, to that harmonious action of all its functions which distinguishes the state of health. We are carrying along with us, throughout, the cardinal means of diet and exercise; to these we now add other and auxiliary applications. And first, of the vapour-bath. In many establishments the vapour or steam bath is the ordinary sudorific. I need not describe minutely a process which every one has seen, and most have experienced on their own persons, at any of the public baths with which all our great towns are now happily provided. But the result is as valuable to health as it is certainly enjoyable to the sense. This bath, it is well known, is no invention of

hydropathy. Not to go back to ancient times, it has been used for ages by nations whom we regard our inferiors in civilization—the Russians and Turks; to what extent and with what success many travellers have informed us. Hydropathy, with physiology as its guide, has adopted the vapour-bath as a therapeutic agent, with the best results.

The same end of diaphoresis, or sweating, is also accomplished with great convenience by the hot air-bath, which has the extra advantage of being portable. A simple spirit-lamp, a rough deal chair, and an envelope of blankets, are all that is necessary for its administration. Further description of details is not my object, nor is it important. It is sufficient to have indicated the principle.

Lastly, we may procure perspiration by a method appertaining exclusively to hydropathy—a method, by the way, more associated in the minds of the public, for good and for evil, as characteristic of the treatment, than any other it possesses. I mean the pack, or wet sheet. A few words will put the reader in possession of all the mystery of this process,

in which really no mystery exists. Here is its simple rationale. A single stout blanket is laid over the mattress of a bed; over this is spread a linen sheet wrung out of cold water, so as to be merely damp. On this, at first sight, not very inviting couch the patient extends himself, and is at once completely and tightly enveloped, both in the damp sheet itself and in the heavy mass of blankets superadded. Now, what takes place? All air from without being completely excluded, and the natural heat of the body acting on the damp linen, vapour is forthwith generated, and the patient is very rapidly in a delightfully comfortable and soothing warm vapour-bath. The length of time during which he is allowed to remain in this bath will depend greatly on the effects desired. Sometimes copious perspiration is desiderated, and it is in this way obtained at a less cost to the skin, to the nervous and vascular systems, than in any other manner I am acquainted with, not excepting the vapour and hot-air baths before spoken of. In other cases we do not want perspiration at all, only to open the pores and cleanse the skin; and most effec-

tively is this accomplished by the wet pack. It is quite plain, to any unprejudiced mind, that in this application we are in fact subjecting the body to a general poultice, for such it really is in the manner of its action. The effects, as stated above, will depend on the length of time the patient is subjected to the application; but one most valuable result, in addition to those already enumerated, is found in the equable distribution of blood over the whole surface of the body, occasioned by a correspondingly equable distribution of temperature; and hence the relief of congestion in the thoracic and abdominal viscera.

This bath, as, indeed, all the warm applications (for I presume the reader will already have discovered the inaccuracy of the title—*cold-water cure*), is almost invariably followed by the instantaneous exhibition of one or other of the forms of the cold or tepid ablution, with the view of preventing the depressing effects that would otherwise ensue from a continued application of a high degree of caloric to the economy; and I can assure those who have never experienced the treatment that nothing

can exceed the sensation of delicious comfort that follows the processes just described. Of the real and decided therapeutic value of this agent, and of these agents combined, to which several others of a similar nature might be still added, were it my purpose to describe the hydropathic system in detail, it would be difficult to speak over-highly. Nay, it is vastly difficult to do them sufficient justice without entering into very lengthy physiological discussions, accompanied by a list of illustrative cases—and this, I repeat, would be foreign to the plan and scope of the present work.

We have been speaking hitherto of the practice of Hydropathy, with its effects, in a large and very important class of cases, where there is a morbid excess of vital energy, and where our object is to reduce the economy to its normal equilibrium. We have now to speak of a much larger class still, and therefore a more important one also, wherein the vital powers are not excessive but deficient—a set of cases precisely the opposite of those just treated of. Here the aim is to elevate to

the normal standard of health, as in the other cases it was to depress to the same level. Any one at all acquainted with disease, or ever so little conversant with its exciting causes, must see at a glance that this must needs, in the nature of things, embrace by far the greatest bulk of the maladies that afflict mankind. We have only to consider for a moment what are the influences that conspire to lessen the bodily vigour of man in a civilized state of existence. They may be divided into sins of omission and sins of commission. Sins of omission, the offspring either of ignorance of the laws of health, or of a wilful neglect of them. Sins of commission, where the laws of health are not only wittingly neglected, but where they are positively and of purpose violated in the pursuit of either business or pleasure. The same destructive agencies might perhaps also be divided into those which are forced upon mankind by the necessities and struggles of life, and those which are adventitious, or in a manner self-sought. But whencesoever arising, whether from the unavoidable over-toil of the lawyer, the states-

man, or the mechanic, or from the suicidal indulgences of the man of fashion, the result is much the same. With the habitual violation of the laws of health, advances the slow sap of the constitution—not always recognised at first, and the warning not readily listened to—but as sure in its downward progress as is the loosened avalanche. The result, I say, is the same—the prostration of the bodily, and along with them the mental powers—the degradation of the whole man. The time at length arrives, it is to be presumed, when medical aid must be sought. And how is such a patient to be treated? We wish to restore the vital energy—to infuse new strength into the jaded system—to tighten afresh, as it were, the strings of the economy, which had run down and lost all their tone. How is it to be done? I can hardly think by the administration of drugs, of whatever kind. And yet, probably, in ninety-nine out of every hundred of such cases, in the present state of the medical art, it is on that worse than broken reed that the patient will be induced to lean.

Now, in the species of case in question, what are the symptoms we shall expect to find most prominent? First of all, it may be averred, in the great majority of instances, one of the many forms of dyspepsia, with the whole train of plagues that invariably accompany it, will be present. Sleepless and unrefreshing nights, furred tongue in the morning, absence of appetite, pain, more or less, after meals, flatulence, constipation, nervousness—such is a catalogue, and by no means an exhaustive one, of the symptoms we may make sure to find. Now, one would imagine that to any rational mind, professional or not, reflecting on such a class of diseases and their invariable causes, the conclusion must be patent, that the laws of health having been broken, the first step in reason must needs be to make amends at once by an unconditional return to their obedience. To take an example among thousands by way of illustration. A merchant is in the course of amassing a fortune. He has begun the world with a fine constitution, with immense ambition, and a complete ignorance that his physical powers are under the

dominion of fixed laws, stern and inexorable as fate itself. He has a grand aim in view, the aim to be rich—quickly, too, if possible. The quicker the better. He is young, strong, and under the goad of a powerful stimulus. He can hardly overtask either body or mind, he thinks. Under that pleasant delusion matters go on swimmingly for awhile—for years, it may be. Work, work, work, the more work the more pelf—and the more pelf accumulated, the greater the thirst for more.

*Creverunt et opes et opum furiosa cupido;
Et cum possideant plurima, plura petunt.
Sic quibus intumuit suffusa venter ab unda,
Quo plus sunt potæ, plus sitiuntur aquæ.*

Of course the man's capacity for continuing this galley-slave life will depend wholly on the amount of his constitutional powers, the stock-in-trade with which he works—but this much may be said with absolute certainty, that, sooner or later, he and all must succumb to the effects of such a life. Given the cause, the result must follow as certainly as the deductions in a theorem of Euclid. Now, health being gone, how shall this man recover

it? He probably will try medicine first. It comes easiest and gives least trouble. But he will gradually discover that, in the long run, drugs will not answer. Nay, he will be getting daily worse. The dose that was effectual a week ago will not only no longer move him, but will actually aggravate the original complaint, and must be continually increased in quantity before its primary effect will be reproduced. And so matters proceed from bad to worse, the general health all the while failing, the temper going, the nervous system completely upset, the whole man fast becoming a wreck. Did it ever occur to that man or his advisers that, in the first place, it was utterly hopeless to think of curing the disease (or chain of diseases) while the manner of life which was its cause was still persevered in? If that idea ever did cross the mind of either, it was not of sufficient value, it is plain, to cope with other considerations, of convenience, saving of trouble, and the like, (and I acknowledge that, practically, these obstacles are often extremely difficult to surmount;) and therefore the misguided patient clings to

desk and business until, the powers of life being exhausted, it is well nigh too late to look for recovery under any system whatever, however judicious.

I take the same instance to illustrate the manner in which such a case would be treated under the hydropathic or natural system of cure. And the point which would immediately strike the physician of the new method as being of paramount importance, would be the necessity of at once endeavouring, as his principle of action, to bring back the patient to that completely healthy manner of life from which alone, in its totality, he would feel there was a prospect of effecting something like a genuine cure of the case. Accordingly, he would order, first, a peremptory release from the mental and bodily worry of business—and he would make that a *sine qua non*—common sense itself informing him that the first step in the cure of disease is the removal of its cause, wherever that is possible. Then again, as in the former instance, the natural remedies of air, exercise, water, and diet, would be systematically brought to bear.

Systematically—that is, under the immediate control of the physiological laws governing the individual case. The diet and exercise in the open air would be strictly regulated, increasing from little to more, as the cure advanced and the powers of the system warranted it. And how these most desirable ends would be expedited by the judicious auxiliary use of the various appliances of water, any one who has experienced will be in a condition to bear testimony—any one who will reflect on the subject with a mind free from prejudice will understand in an instant.

My own usual plan is to commence the treatment of such a case, and indeed of most cases, with the most lenient measures, and to feel my way to a more vigorous *régime* cautiously and day by day; and this is a rule from which no representations of the patient, who is always anxious to get well in a day, and fancies that under hydropathy it is especially his prerogative, have ever induced me to deviate. The majority of patients, it may be remarked, entirely demur to the doctrine that Rome was not built in a day; and having utterly demo-

lished their health by the misuse of years, they fancy it not unnatural that it should be rebuilt in two or three weeks. It is a very pardonable error, perhaps, however unreasonable—but a great error it is; and the slightest acquaintance with the laws of the human economy would suffice to prevent it.* We proceed, however. The first applications of water will usually consist of a simple wash-down, as it is termed, with a couple of wet towels, the patient laving the fore part of the body, the bath-attendant the back. This may last for one or two minutes, and is immediately followed by a vigorous rubbing in a dry sheet with which the patient is enveloped. Friction is continued until a perfect reaction has taken place, and the skin is in a complete glow. The clothes are then hurried on, half a tumbler, or so, of cold water is drunk, and the patient is sent out to take his prescribed exercise in the open air. The same process may be repeated two or three times per diem during the first few days, and is then followed by others of

* “Chronic diseases, whether in the body or in the state, can only be met by chronic means.”—Sir J. Forbes.

greater strength, in a continually ascending scale, but with the same object. Of these I may enumerate the dripping-sheet, the shallow-bath, the pail-douche, and the douche proper. It is unnecessary to describe these baths in detail—in fact they almost describe themselves. It is sufficient to repeat that they are given for the same purpose, and differ only in form and intensity. To these varied applications of water we have yet to add the cold, tepid, and warm sitz-bath, along with the vapour and hot-air bath, and the pack, already described.

Now, what is the philosophy of these combined means of treatment in their application to a set of symptoms such as we have before indicated as characteristic of a whole order of chronic diseases? The most moderate exercise of common reflection must serve to point it out. In the first place (and retaining still our typical illustration), the man's nervous system having become prostrated from over-work, it is plain that he must above all things have rest, and he gets it—in proportion as his case demands it, and of a kind adapted to his requirements. It will not consist largely of

mere bodily rest, in the majority of instances, but it certainly will include absolute *mental* repose, so far as the physician can prescribe or secure it. Is it necessary to enlarge on the value of that? Mental rest first: with change of scene from the haunts of business or pleasure in the vitiated atmosphere of a large town, to the calm delights of a country retreat in some picturesque district abounding in pleasant and varied walks, with a dry soil under-foot, and the fresh breezes of health playing about him over-head from morning till night. Assuredly, there is a more than ordinary significance and value to the invalid, of all men, in Cowper's line—

God made the country, but man made the town.

Its moral meaning no one doubts; but physiology teaches us its immense physical import also. The brain, then, being at rest, will speedily acquire more nervous power for the supply of all the animal functions, to whose proper and healthy action it very mainly contributes. The daily experience of every one will tell him that this is so. Nay, the experience of each individual meal will corroborate

it. How differently digestion goes on when a man has partaken of food in a serene and unexcited state of mind, as compared with the workings of the same process when under the influence of mental agitation, from whatever source proceeding. And how materially is the same result affected by the conduct of the individual after meals, in relation to the question of repose or exercise. A certain amount of rest after eating is pointed out to us, alike by the dictates of experience and the laws of physiology, as indispensable; and no man will follow out a contrary rule in practice, for any length of time, without incurring a heavy penalty in the loss of health. If a striking illustration in point were required, I should only have to request the reader to look at the case of the American nation. Here is a people sprung from a common stock with ourselves, inheriting originally the same physical form and stamp, and endowed with the same distinguishing bodily and mental energies. The lot of this young giant has been cast in a land which not only gives free scope to all his natural activities, but which, from opening up

so many channels for worldly prosperity, and above all things for the attainment of wealth, calls into play a more than ordinarily powerful goad to the acquisitive faculties. The result has been that the activity of the nation has been, and is, tremendous, and its activities have been employed on precisely that kind of work which makes the largest drains on the nervous system—in speculation, in gambling, in excitement of every description. The consequence is, that the nation lives fast, literally. Everything, including eating, is done at a breathless pace. The jaws cannot masticate quick enough, and the food is gulped down in half-masticated boluses. Then again to immediate work, without any rest whatever to stomach or brain, and this daily, so long as the powers of life will admit. But the Nemesis of injured Nature is visible in a hundred different ways. You have only to look at the American, indeed, and you read it at a glance. Tall, sallow, sunken-cheeked, he has already quite lost the robust British type. The compact athletic frame, and the fresh complexion, are transformed into the lean dyspeptic-looking

figure, recognisable wherever you meet him as the American. Is it wonderful? To the physiologist certainly not a whit. After making considerable allowance for the effects of climate, he will have no difficulty in ascribing the rest to an ignorant, it may be, but a systematic, departure from the organic laws of health. He knows that by no possibility can a man digest his food well, who does not half masticate it, and bounds from the table to his business like a greyhound slipped from the leash. He knows, moreover, that ill-assimilated food will not make good blood, and that if good blood be not made, the tissues will not be adequately nourished, and the general health must fail, the constitution must become deteriorated. This done in the individual, his offspring comes into the world with an unhealthy, or at least a less healthy, inheritance; and thus has been brought about the physical deterioration, speedily consummated, which we witness to-day in a nation of the same original stock with ourselves. This is a somewhat lengthy digression, but it is probably a more forcible illustration than any other I could have cited to

exemplify the physiological importance of repose to the great nervous centre, in order to the due performance of the animal functions, and most especially of digestion, on the healthy action of which, as already stated, such vital results are dependent.

From what has been said, it will be seen that the animal economy consists of a compound organism—of a series of organs, with the functions peculiar to them respectively, all interlinked together and mutually reliant the one on the other, the whole forming a system, of which the brain, like the sun in the astronomical world, is the centre and sustaining power. When, therefore, in the treatment of chronic disease, we have insisted on the repose of the brain, as modifying and materially influencing the general well-being of all the other organs of the economy, we have done no more than announce a well-established physiological fact. But the chief value of the fact, in this connexion, consists in its establishing a fundamental therapeutic idea, a doctrine in the treatment of chronic disease which is never to be lost sight of. Now, when this general

doctrine is applied to any one individual case, like that we have been considering, it will at once explain the scientific grounds for the overriding importance which is attached to the principle of nervous repose. With the attainment of that end, the first requisite in the rational treatment of the invalid would unquestionably have been secured, in the withdrawal of the exciting cause of his complaint. This might perhaps be termed the *negative* portion of the process—infinately important in itself, nay absolutely indispensable—but at once to be succeeded by the more positive physiological means already described as distinctively characteristic of the natural method of cure; these means having for their object the re-establishment of the bodily vigour through the combined agencies of air, exercise, water, and diet, systematically regulated, on the one hand, along with the restorative moral influences to be surely looked for, on the other, from change of scene, from relaxation, and the pleasures of cheerful society.

The above, it will be seen, is the merest sketch of the *modus operandi* of the Natural

System in such a class of cases; but it will perhaps suffice to illustrate specifically and in simple terms the general principle on which the new method proceeds. And the question now naturally suggests itself—Is it possible to conceive of such a case, itself representing a whole family of kindred ones, being rationally treated after a different manner? Plainly, it is impossible—unless we are to cast our physiology, and along with it our common sense, to the four winds, and content ourselves by adhering to the unreasoning routine of antiquated usage, fast lapsing into decay because it is unreasoning.

One typical example of chronic disease has been selected, not wholly at random, for in a commercial country like ours it probably occurs at least as frequently as any other whatever. But what is true of the case of the overwrought merchant applies, of course, with equal weight to that of the overtasked lawyer, or clergyman, or statesman, or doctor—to all in fact who, from one cause or another, are led to violate in their lives those eternal laws of health that are imprinted on our common nature, and the

non-observance of which is sure to bring down on the offender, sooner or later, a retribution more unerring and inflexible than the vindication of any merely human law by the sentence of any merely human tribunal.

But to some it may appear that the kind of example I have selected as an exponent of the natural system of therapeutics does not strictly fall under the category of serious disease—that it is, on the whole, of a comparatively less formidable nature, although indeed it may occasionally be marked by a total prostration of the vital powers, and in some rare instances may even terminate in death itself. I will admit that a certain distinction is fairly to be taken between mere functional disorders, however grave (bearing always in mind, however, that their universal disposition, if unchecked, is to run on to absolute lesion of tissue), and those other more serious complaints whose tendency is to shorten life by destroying the structure of one or other of the vital organs, and hence named organic. Of the latter kind it need scarcely be said that it will be all too easy to furnish abundant examples. If, for

instance, we take the Registrar-General's Report of the deaths from all causes in London during the past year, and glance at the dismal catalogue as supplied by the various diseases of the system, we cannot fail to be attracted at once by the appalling bill of mortality that marks the ravages of the tubercular class, among which the ordinary pulmonary consumption easily bears the palm. It cannot be wrong, therefore, by way of further illustration, and because of its immense importance, to say a few words on the nature of that disease, and the evident rationale of its medical treatment. As no disease of greater magnitude could be selected, so, I am satisfied, none could better illustrate the peculiar therapeutic views for which I am endeavouring to gain a hearing.

Of the several forms of scrofula, pulmonary phthisis is undoubtedly the most dreadful and the most deadly. It is no purpose of mine, however, to dwell on its horrors, which are known to every one, and have been but too closely brought home to vast numbers of the households of this kingdom. A few words as to its pathology and treatment alone lie in my way.

Pulmonary consumption is a constitutional disease, or to say the same thing in a manner more to arrest attention, it is a *blood* disease. It occurs widely in every section of society, in the highest as well as in the lowest, though not certainly to the same extent. Nor will this be surprising when we come to inquire, as we shall presently do, into its causes.

It has been already remarked, more than once, that the state of health is only to be maintained by a due observance of all the laws of health in their combination. That is, every living being, in order to be healthy, must have a sufficiency of nutritive, but plain, food and good water—he must enjoy pure air, must take a proper amount of exercise, and, morally speaking, must, to a certain extent at least, have his mind and affections in a state of serenity and calm. Nature has enjoined that these things shall be, if the human being is to flourish, and from her ordinance there is no possibility of an escape with health; so that we see at once how it is that the richest and the poorest class alike may be attacked, although from very different and even opposite causes,

by such a disease as consumption. "So long as misery and poverty exist on the one hand, and dissipation and enervating luxuries on the other," says Professor Bennett, "so long will the causes be in operation which induce this terrible disease."*

I have called consumption a disease of the blood, and essentially so it is—that is to say, it is to a certain depraved or altered condition of that vital fluid that the disease in all its forms is due. But we have already had occasion to notice how materially the quality of the blood is modified by the state of the digestive powers. This cannot be surprising if we reflect that, in fact, the vital stream is constantly being replenished by the products of the aliment supplied to the system, so that the quality of the one is directly influenced by the quality of the other. In this manner it follows, in the first place, that if the stomach receives a proper quantity of food, of the proper kind, and if, in the second place, the vital powers are in a

* Bennett on *Pulmonary Tuberculosis*, p. 58. An admirable work, to which I am glad to acknowledge my obligations, and to which I shall have frequent occasion to refer.

normal condition, so that the process of digestion is healthily performed, then, also, will healthy chyme and chyle be elaborated, and these, in their turn, being taken up by the lacteals, and there undergoing a process of change, before being poured into the torrent of the circulation, will as certainly have a tendency to produce a healthy quality of blood, which again will supply all the tissues of the economy with its own nourishing and vitalizing properties. The above is a chain of simple cause and effect. But the converse, of course, is also true. If, on the one hand, the food is either insufficient in quantity, or unwholesome in quality—or if, on the other, the digestive powers, from what cause soever, are impaired, then the process of assimilation will also be vitiated, and, as a result, unhealthy blood will be formed, and the tissues will be improperly nourished—and hence, as an infallible consequence, the deterioration or decay of the whole animal framework. No proposition can be more logical or simple.

When we say, therefore, that consumption is a blood disease, we are at once referred to

the condition, in patients suffering from that disorder, of the digestive organs, and we then find, as a rule which knows no exception, that the function of digestion is, in them, in a weak and depraved condition. This state may have been induced, as before remarked, by want, or by dissipation, or by both, and there may also exist a predisposing cause from hereditary taint. But whencesoever arising, the result is still the same, and is marked by the gradual decline of the constitutional powers. But further, modern pathology has taught us that whenever, through a violation of the organic laws of health, the constitutional powers become enfeebled, and, as in consumption, the assimilative process becomes vitiated, and impoverished blood is formed, there is always a disposition in the latter fluid, or at least in its more watery portion, the *liquor sanguinis*, on the application of any exciting cause, such as cold, to transude through the vessels into one or more of the vital organs of the body, but chiefly into the air-vessels of the lungs, and to become settled there in the form of a morbid aplastic exudation, whose tendency, if un-

checked, is to run on to ulceration, thus causing a serious destruction of tissue, and ending in death.

Although my primary object, in the consideration of this disease, does not turn so much on its nature, or pathology, as on its treatment, and a more lengthened reference to the former of these points, therefore, may appear somewhat irrelevant, I am tempted, nevertheless, because of the importance of the subject, and in corroboration of the sketch given above, to avail myself of extracts from the able work of Professor Bennett already quoted. "It has been noticed," says Dr. Bennett, "by many observing physicians, and especially by Sir James Clarke, that phthisis pulmonalis is ushered in with a bad and capricious appetite, a furred or morbidly clean tongue, unusual acidity of the stomach and alimentary canal, anorexia, constipation alternating with diarrhoea, and a variety of symptoms denominated dyspeptic, or referable to a deranged state of the *primæ viæ*. Moreover, it can scarcely be denied that, in the great majority of cases, these are the symptoms which accompany

phthisis throughout its progress, becoming more and more violent towards its termination. Now, as the nutritive properties of the blood are entirely dependent on a proper assimilation of food, and as this assimilation must be interfered with in the morbid condition of the alimentary canal, the continuance of such conditions necessarily induces an impoverished state of that fluid and imperfect growth of the tissues. When, under such circumstances, exudations of the *liquor sanguinis* occur, they are very liable to assume the form of tubercles; and if they are poured into the lungs, there are then produced those changes and that condition which have been denominated by the German pathologists pulmonary tuberculosis." Such is a very succinct account of the morbid process which has its result in consumption. But, again, when a closer examination is instituted into the peculiar nature of this exudation, we find that, amidst a number of most interesting particulars in regard to the chemistry of the disease, one all important fact in regard to the nature of the tubercular exudation in phthisis has been defi-

nately ascertained, to wit, that it consists mainly of a deposition in the lungs of albumen, this being undoubtedly a process of disease. We learn, from Dr. Abercrombie and others, that "in the early stage of the disease it seems to be deposited in a soft state; that, as the disease advances, the proportion of the albumen appears to increase, while at the same time it assumes a more concrete state, and the mass in general becomes less vascular and less organized, and that, in the last stage, the vascular structure of the organ seems more and more to disappear, until it passes into a mass presenting the properties of coagulated albumen with little or no organization."

Another most important fact to notice, is the continued tendency of this exudation, if not rapidly absorbed, to go on to ulceration—a circumstance easily intelligible from its low character, in which, according to Dr. Bennett, "there is no disposition to the formation of perfect cell-formation, but rather to abortive corpuscles, which form slowly and slowly break down."

We have, then, a clear certainty so far—namely, that in pulmonary consumption a low type of aplastic, albuminous exudation is poured out into the lungs, with a tendency to disintegration of tissue. But this albuminous state of the *liquor sanguinis* must have its own cause. Whence, then, does it arise? For if we can discover this, it will be only reasonable to infer that we shall thereby, and thereby alone, obtain the key to a true comprehension of the disease, on the one hand, and of its rational treatment on the other. Hear Professor Bennett again:—"If now," says he, "we endeavour to inquire more particularly into the nature of that change in the blood which communicates to the exudations from it those peculiar characters we denominate tubercular, we must arrive at our knowledge from the results of physiological researches. Thus, a healthy nutrition of the body cannot proceed without a proper admixture of mineral, albuminous, and oleaginous elements. This may be inferred from the physiological experiments of Tiedemann and Gmelin, Leuret and Lassaigne, Magendie and others; from an observation of the

constituents of milk, the natural food of young mammiferous animals; from a knowledge of the contents of the egg, which constitute the source from which the tissues of oviparous animals are formed before the shell is broken; and from all that we know of the principles contained in the food of adult animals. The researches of chemists, such as those of Prout, Liebig and others, point to the same generalization, when they assert that carbonized and nitrogenized—or, as they are now called, respiratory and sanguigenous food, are necessary to carry on nutrition, inasmuch as oil is a type of the one, and albumen of the other, while the mineral matter is dissolved in both.” But here follows what is more specially to our purpose. “The peculiarity of phthisis, however, is, that an excess of acidity exists in the alimentary canal, whereby the albuminous constituents of the food are rendered easily soluble, whilst the alkaline secretions of the saliva and of the pancreatic juice are more than neutralized, and rendered incapable, either of transforming the carbonaceous constituents of vegetable food

into oil, or of so preparing fatty matters, introduced into the system, as will render them easily assimilable. Hence an increased amount of albumen enters the blood, and has been found to exist there by all chemical analysts, while fat is largely supplied by the absorption of the adipose tissues of the body, causing the emaciation which characterizes the disease. In the meanwhile, the lungs become especially liable to local congestion, leading to exudations of an albuminous kind, which is tubercle. This, in its turn, being deficient in the necessary proportion of fatty matter, elementary molecules are not formed so as to constitute nuclei capable of further development into cells;—they therefore remain abortive, and constitute tubercle corpuscles. Thus a local disease is added to the constitutional disorder, and that compound affection is induced which we call phthisis pulmonalis, consisting of symptoms attributable partly to the alimentary canal and partly to the pulmonary organs.” And then, as a practical final summary, Professor Bennett concludes:—

“1st—That an oily emulsion must be formed

to constitute a proper chyle to be converted into blood.

“2nd—That in pulmonary and other forms of tuberculosis this process is interfered with; so that—

“3rd—A depraved state of the constitution is induced, favourable to the deposition of tubercular exudation into various tissues, but especially into the pulmonary organs.”

As was to be expected, this theory, like every other, good, bad, or indifferent, has had its objectors. For my own part, I cannot help regarding Dr. Bennett's views as extremely scientific in principle, on the one side, and as tallying entirely with the great body of the ascertained facts of the case, on the other. They appear to me especially valuable, moreover, not only as offering an explanation of the disease, in itself highly satisfactory, but, above all, as yielding us a chain of causes and effects, of so positive and palpable a nature, that we are not left in doubt as to the only rational therapeutics we can adopt for its cure. And it certainly does so far appear fortunate that this disease, of all others, as if

because of its importance, should be one of those which we would seem to be approaching to understand most thoroughly in its nature and its treatment—that it should appear likely to take its place as amongst the finest instances, in the whole range of the healing art, of a thoroughly investigated pathology, with a thoroughly rational and scientific therapeutic treatment capable of being founded upon and adapted to it. The only pity is, that medicine does not furnish us with a larger number of instances of the same kind.

But the most important part of the inquiry remains yet to be satisfied. How is this terrible disease to be successfully treated? For our pathological investigations would have been of little avail indeed, if it had not been to assist us, at least, in arriving at scientific accuracy and certainty on that most vital of points.

It is a somewhat singular circumstance that the first key-note of the new procedure in the treatment of pulmonary consumption should have been struck by a clerical, not by a medical hand; for to the Rev. Dr. Stewart of

Erskine the public of Great Britain are certainly indebted for having led the way, in a practical manner, in the rational treatment of phthisis. At a time (and that not many years ago) when the profession universally regarded the disease as being of an inflammatory character, and consequently treated it on the antiphlogistic principles of low diet, bleeding, blistering, and antimony, with the kind of result to be infallibly expected from so fatally mistaken a procedure, that gentleman stepped forward, and being led, as it should seem, by a kind of instinct, began treating some of his parishioners on the stimulant and nutritive principle, in opposition to the one just described. Beefsteaks and porter, cold bathing and constant exercise in the open air, so far as the patient's strength would allow, were made, in the treatment of the disease, to take the place of gruel and water, of leeches and blisters, and confinement to the house. His success was remarkable, and did not fail to raise the usual professional outcry; for the faculty had no notion of any officious meddling *ab extra*. But cures were made,

notwithstanding. Still, this improvement in the treatment of the disease was no more than a happy guess. It could not possibly be more than a blind empiricism—but has a great portion of the art of medicine, it may safely be asked, up to the present time, been anything more? However, the attention of medical men was at length forcibly drawn to this new view of the disease and its treatment; we have now apparently got at its true pathology; and there would seem, therefore, to be little doubt as to the broad principles on which its treatment should be conducted. We have seen that pulmonary consumption is in an especial manner a blood disease—that it depends primarily on a vitiated condition of the digestion—and when we come to examine ourselves on the scientific rationale of treatment, it would appear to require no great stretch of logic to conduct us to an inevitable conclusion. The case stands simply thus. Whether through want or through dissipation, or through over-exertion of whatever kind, a human being's constitution becomes impaired. One of the very first symptoms of this vital depression is mani-

fested in an enfeeblement of the powers of digestion. Hence the formation of bad chyme and chyle. Hence the necessary formation of impoverished blood—and hence the continued tendency, as we have seen, to exudations into the lungs of tubercular matter; sometimes, indeed, capable of re-absorption, but much more generally going on to softening, ulceration, and the death of the patient. I have shortly stated Professor Bennett's doctrine, that the deterioration of the blood in phthisis depends ultimately on an imperfect assimilation of the food—the albuminous portions being supplied to the system in excess by the process of digestion, the oily or fatty portions in deficiency. But be this theory wholly or only partially true, or be it even wholly erroneous, it is nevertheless absolutely certain that consumption is invariably connected with a depraved digestion. Every physician knows that this is one of the most formidable difficulties he has to contend against in the treatment of phthisical patients; because not only does the want of appetite prevent the patient from taking food in sufficient quantity to afford the

system due nutriment, but, from the depraved state of the alimentary canal, the quality of the blood that is formed is necessarily vitiated, and therefore inadequate to perform the function of support to the economy.

It is very plain, therefore, that when we come to reflect on the rational treatment of phthisis, our thoughts must at once be directed towards the primal matter of improving the digestion. On this point there is no room for a difference of opinion, so far as theory, at least, is concerned, however widely sundered may be the actual practice among medical men.

From the time when physicians opened their eyes to the pathological error of considering phthisis, or its distinctive exudation, as the product of an inflammatory action, which of course would have necessitated the usual anti-phlogistic or lowering treatment, from that time the analeptic or *feeding* treatment became necessary, to the utmost that the patient's assimilative powers would allow; and hence the general adoption of cod-liver oil as a curative agent, from its great nutritive properties and comparative digestibility.

We have seen, however, that an unfailing concomitant symptom of phthisis is a loathing for food in the first place, along with an incapacity to digest it in the next—this leading to nausea and vomiting, with all the debility and discomfort they occasion. Our first great practical effort, therefore, must be to alter that state of things—to improve the digestive powers; for if we cannot effect this end, our cod-liver oils and all other nutritive attempts would surely prove abortive and useless. This also is known to every physician as the grand practical difficulty in such cases; and this brings us at once to consider how that difficulty is to be met. But first let us inquire what the actual practice is in this respect, and what are the means generally employed to restore the digestive apparatus in such wise as that the work of nutrition may be improved, and the life of the patient prolonged, or possibly saved. In the case of the rich (and be it observed I speak here of the practice of the best physicians of the old school—of those who are conversant with the new pathology of the disease, and act upon that knowledge), the general course of

the treatment is somewhat as follows:—First, cold in any of its forms must be sedulously guarded against, and the rule is that the patient shall be cased in flannel. In the next place, a mild temperature is much relied on, and the invalid is confined to the house, except in the very finest weather. Or change of climate is recommended, usually to the South of Italy or to Madeira, or, more recently, to Egypt. Then artificial tonics are largely given, including the different kinds of astringent bark along with the mineral acids; and the different preparations of iron are strongly recommended, with, last and most, cod-liver oil.

I might enter at some length into an examination of the effects of each of these various agencies, both as I have seen them in my own experience, and as the best medical authorities report upon them. I shall do no more, however, than state generally that, while I believe many of them have their value, others appear to me decidedly contra-indicated by a scientific comprehension of the nature of the disease. In this class I would certainly include the whole list of tonics and cough-mixtures, the latter of

which I have often witnessed to produce the most markedly damaging effects, by undoing that which, in point of fact, we most labour to accomplish—to wit, the restoration of the healthy appetite and the healthy digestion.

“It is by no means uncommon,” says Dr. Bennett, “to meet with patients who are taking at the same time a mixture containing squills and ipecacuanha to relieve the cough; an anodyne draught to cause sleep and diminish irritability; a mixture containing catechu, gallic acid, tannin, or other astringents, to check diarrhœa; acetate of lead and opium pills to arrest hæmoptysis; sulphuric acid drops to relieve the sweating; quinine, iron, or bitters, as tonics; wine to support the strength; and cod-liver oil in addition. I have seen many persons taking all these medicines, and several others, at one time, with a mass of bottles and boxes at the bedside sufficient to furnish an apothecary’s shop, without its ever suggesting itself apparently to the practitioner that the stomach, drenched with so many nauseating things, is thereby prevented from performing its healthy functions. In many cases, there can

be little doubt that this treatment of symptoms, with a view to their palliation, whilst it destroys all hope of cure, ultimately even fails to relieve the particular functional derangement to which it is directed."

Of cod-liver oil, of course, it is difficult to speak over-praisingly, *when the patient can be got to digest it*, because it certainly seems to supply the economy, in the lightest and, on the whole, the most tolerable of forms, with that fatty element which experiment would appear to show that it requires. But it is not always available, owing to the enfeeblement of the digestive powers; nay, it sometimes creates such nausea as to do positive harm. And, on the whole, it may safely be said that its exhibition is a secondary matter in the cure, in point of time, requiring a certain improvement in the powers of life before it can be of any utility. When that has been once accomplished, however, its value as an article of diet—for that is its true medical import—is immense, in exact proportion at once to its nutritive powers and to its digestibility.

But that, with all the means usually employed

hitherto to combat this fearful complaint, comparatively little success has been attained, is forcibly evidenced by the annual return of deaths. This holds true, as every one's experience will tell him, in regard to the higher and middle classes, who can secure the advice of the highest medical authorities, and carry out their injunctions, so far as pecuniary means are a consideration, to the letter. But now let us look at that much larger class of phthisical patients who are forced to seek relief, through public charity, in the wards of our large hospitals. Why, the lack of success in the treatment of consumptive patients in hospital is alike notorious and deplorable, and in some hospitals it is in fact sought to be given up altogether.

On referring to the statistical report of Guy's Hospital for the year 1856, I find the following statement:—That the number of patients admitted in that year, suffering from disease of the respiratory organs, was in all 455, out of whom 112, or 25 per cent., died. And I also find the accompanying, and not very reassuring, comment—"The mortality,

as usual, will be observed to be highest in the diseases of the respiratory organs, the total deaths being fully double those of any other section, and furnishing somewhat more than one-fourth of the fatal cases that have occurred in the Hospital within the course of the year. By far the larger proportion of these, namely 65 (or upwards of 50 per cent.), are referrible to pulmonary consumption; and when we keep in view the little material benefit which such patients receive by their temporary residence, it becomes a question how far it is expedient to admit a class of patients merely from the urgency of their symptoms, and, at the same time, necessarily preclude others from the benefit of the charity, whose diseases might be found more amenable to medical treatment." This must certainly be regarded as an admission more candid than encouraging to him who takes an interest either in humanity or in medicine. But, indeed, it is not surprising, for the plain truth is that it is thoroughly opposed to the dictates of physiological science even to imagine that pulmonary patients could derive any very large amount of benefit from

the kind of treatment they actually undergo in the wards of a metropolitan hospital, or, to put it stronger, from any course of treatment *possible* in such a locality. I say so advisedly. The prime elements of success are not there—and the enlightened physician ought to recognise this. If we have interpreted the nature of consumption aright, and if it be true that the disease, from whatever cause arising, resolves itself proximately into a morbid derangement of the digestive organs, by means of which impoverished blood is elaborated, with the tendency to transude into the lungs and form tubercle, then we must look for a natural check to the complaint in the possibility of improving the function of digestion, with the view of thereby ameliorating the blood and thus avoiding the risk alluded to.

But how will this be effected? Once again I say, by bringing into operation the combined appliances that constitute the natural system of treatment. In this way, and in this way alone. It is by endeavouring to exalt the natural powers of the economy by means of the regulated agencies of air, exercise, water,

and diet, with the addition of healthy moral influences to the utmost that is possible, that we can alone hope to prevent the phthisical diathesis in the first place, and to cure the complaint in the next. For that it is curable occasionally, even with only a partial use of the above means, and that too when far advanced, has been demonstrated of late years beyond a doubt. When once, by our hygienic appliances, we have succeeded in restoring the appetite and invigorating the digestive powers so far that good substantial food can be retained in the stomach, and become properly assimilated, we may be said to have conquered the first and greatest difficulty. The cream and cod-liver oil diet, and whatever else is fortifying to the system in the way of food, may then follow with some hope of a good result; but without the improved digestive powers, of what avail can they possibly be? Hence the anxiety, as one would imagine, that must necessarily be evinced by the enlightenment of the profession to endeavour to secure to consumptive patients the full benefit of all the hygienic means, in their entire plenitude, as an

indispensable basis of operations. How far this is so, however, or can possibly be so, may be gathered in some measure from the sites of the great bulk of our metropolitan hospitals for the sick, situate as they are amid the stench of cattle-markets, the back-slums of a squalid population, or the roar of the world's highway.

I am perfectly conscious, indeed, that arguments of convenience, pecuniary and otherwise, will be cited in defence of the present receptacles for the sick, and this is precisely the best indication we have that the minds of the profession are not yet wholly alive to the importance of the hygienic or hydropathic view of the treatment of this formidable disease; for so long as the consumptive patient is denied pure air, to say no more, it is as clear as any proposition under the sun, that it is perfectly hopeless to attempt to give him even a fair chance of recovery. And the already quoted opinion on the subject, contained in the last Report of Guy's Hospital, is perfectly intelligible. The only question is, will this state of things be allowed to continue for ever as a reproach to our common profession, or shall we gradually

acquire more Brompton Hospitals, pushed out into the country, where the hygienic treatment of consumption, its only rational and radical remedy, may be carried out to its fullest extent? Meanwhile, it is a hopeful sign to witness the recognition of the natural principle so far as to have led to the establishment of one suburban hospital for the reception of this class of patients; and although I can by no means subscribe to many of the internal arrangements of that institution, and still less to the drug medication, especially the use of naphtha and iron, on which a chief reliance appears, although somewhat hesitatingly, to be reposed,* yet I gladly hail the step as one in the right direction, and I confidently accept it as an omen of a still further professional advance, in the future establishment of kindred institutions in the vicinity of all our large towns, for the treatment of every form of chronic disease on the broad and infallible basis of hygienic principles.

Adopting the views of one of the most dis-

* See the First Medical Report of the Hospital for Consumption and Diseases of the Chest, presented to the Committee of Management by the Physicians of the Institution in the year 1849.

tinguished pathologists of the day as to the nature of consumption, I have endeavoured to show in a few words the simple rationale of its treatment, both on the grounds of strict science and common sense, for the one does no more than fortify the other. But if the truth of these views shall be admitted in the case of phthisis, which we have shown to be a constitutional affection, and if it be conceded that the natural system of treatment, including, it need scarcely be repeated, cod-liver oil and all other nutritive auxiliaries, is not only the most efficacious but the sole physiological means we can employ to combat this disease successfully, whether in the way of prevention or of cure, it will surely follow, on the same grounds, that a system similar in principle will be necessary in the treatment of all chronic disease whatever. In this way I might go over the whole category of disease in detail, examining the individual pathology of each, and I make bold to say that the same fundamental principles of therapeutics would be found to apply throughout. But this is not necessary for my purpose. The instances which have been already cited

will afford an abundant illustration of my position to every candid and reflective mind, and I could not hope to do more by an array of additional cases, however extensive. If the *principle* which forms the groundwork of the new therapeutics shall only have been clearly recognised, my purpose will have been accomplished, and it will not sound like presumption to say—*ex uno disce omnes*.

Before quitting this branch of the subject, it may be necessary to say a few words on one or two of the features more particularly characteristic of the manner of carrying out the hydropathic or natural system in practice. It is well known that in general the peculiar treatment which goes by the name of hydro-pathy is carried on in establishments designed and set apart for that precise object; that the patients mostly reside under the same roof with the physician, and eat at the same table. It may be asked, is there any special value in such an arrangement to recommend it emphatically to the invalid? I answer, the greatest. First, it must be remembered that the site of a hydropathic establishment is invariably chosen

because of its general salubrity, above all because of the purity and freshness of the air and the excellence of the water. But that is not all. A hydropathic establishment is dedicated, wholly and solely, to the purposes of health, and its internal economy in every particular is modified by that consideration. Hence the greatest regularity is observed as to the times and ways of doing everything. The patient must rise, must bathe, must eat, must walk, and must retire to rest, at fixed hours, whose observance is jealously enforced. This engenders, first of all, regularity and system, and it encourages periodicity in the action of many of the most important functions of nature, a habit of which every physician knows the immense value. Another great advantage is, that the physician has his patients almost always under his eye—that he is thus enabled to see that all the measures of treatment he may deem necessary are carried out on the part of patient, bathman, and every one concerned, in a most thorough-going manner. Moreover, being on the spot, he is in a position to discriminate with the utmost nicety the effect

upon the invalid of every item of the curative process he is undergoing, and of thereby modifying the whole with something like a proper scientific accuracy. And this surely, if it entails a vast amount of extra labour on the physician, is as certainly a vast and altogether unusual benefit to the patient. But I hold it, for my part, to be of an almost equal value to both.

This arrangement has its advantage, more or less, to every kind of patient that may come under the treatment, but there are some species of disease to which it is of an altogether especial value. Take the case, as an example among many, of a patient labouring under nervous excitement from an addiction to ardent spirits. To such a man, the advantage of medical treatment in an establishment is incalculable. First, every temptation is removed from out of his path. In the treatment itself, a natural and healthy stimulus is substituted for the morbid and artificial one to which he has been accustomed; he is surrounded by good influences; and he knows that the doctor's eye watches him continually. Under the combined operation of

all these means, he is enabled to relinquish in a short time, and with comparative ease to himself, a habit against which he probably would have struggled in vain while living in his own home, and with no support except in the intermittent suggestions of his own unstable will.

And this leads me to point out in a single word the general *moral* value of the kind of treatment pursued in a hydropathic establishment. I say, first, that, as in the case above cited, the patient is placed in a position, physically and socially, that renders it comparatively easy for him to break off bad habits. There is smoking, for another instance. Every one who has been largely given to this habit will know how inveterate it becomes—how difficult to relinquish under ordinary circumstances, and by the mere force of will. So also of snuff-taking, perhaps even more inveterate than the other still. And yet I have witnessed, over and over again, with what comparative facility both habits may be abandoned when their devotee is once put upon the healthy *régime* of hydropathy. Here, too, as in the

case of the drunkard, there are physical and moral means simultaneously at work to assist in the desired end. There is the daily and almost hourly routine of the physical treatment, the bath, the fresh air, invigorating exercise, filling up the day pleasantly. There is the strong force of example, then, to assist a flagging will; the being continually surrounded by other health-seekers, all of them struggling for that prize, and more or less earnest in a course of well-doing. No one who has an inkling into human nature will be disposed to undervalue that. And there is, in a general way, and as applied to cases of every description, the moral benefit to be derived from the necessity of sacrificing luxurious and idle tastes and habits of every kind, of overcoming the antipathy, too natural even in health, to do that which, however advantageous to us, costs a determined and sustained effort; in one word, of reconciling ourselves to the truth that health, when lost, is only to be retrieved by a laborious process, in which the patient himself is called on to play by far the principal part, and of faithfully and manfully

carrying out that fundamental truth in a systematic routine, till the end is accomplished.

In this way it will be seen that the treatment may fairly be said to act as a moral gymnastic; and it is quite certain that it would be wholly impossible to carry that treatment out, in its entirety, except in an establishment dedicated exclusively to the purpose, and organized in all respects in accordance with its requisitions.

I might speak also of the agreeableness, in a social sense, of the kind of life prevailing at a hydropathic establishment, as a feature of undoubted import. Every one knows from his own experience the value, hygienically speaking, of cheerful and easy society. To the invalid, it is of especial moment. It lightens and brightens his way, and makes his work sit lightly upon him. It keeps him in spirits, prevents him from brooding over his own ailments, and is, in fact, of incalculable value. That, too, is an advantage supplied by a hydropathic establishment, and one which, as yet, is almost peculiar to this system of treatment. Indeed, in ordinary town prac-

tice, of whatever kind, it is plainly impracticable.

I have thus endeavoured to explain, as . . . shortly as possible, the simple philosophy of hydropathy. I have indicated its various appliances and their several uses, and I have sought to impress the reader with my own strong conviction as to its efficacy and its general applicability. Do I, then, regard it as a panacea, an infallible specific for all curable diseases? It would be folly to suppose it. Without entering into a discussion on the truth or falsehood of the doctrine of specifics, as entertained by one large class of practitioners, I may simply state that hydropathy rests on a totally different conception of the philosophy of the cure of disease. Its stand-point is unconnected with any such notion. Its rationale is based on one broad and distinctively characteristic idea, to wit, that nature possesses within herself, in the original construction of the living organism, her own means of restoration, when that organism is overtaken by disease; that she is constantly endeavouring to work out her own cure; that she frequently

succeeds in her efforts without any external assistance whatever; and when her powers are not sufficient to this end, and the aid of art is to be invoked, that aid must be founded on a consideration of the primary laws of health as unfolded by physiology, and a main reliance reposed on a systematic application of them in the cure of disease. In a word, hydropathy is grounded, as a system of therapeutics, on the belief that the mass of chronic diseases are most effectually and most safely cured, as I have more than once stated already, by the identical means, infinitely modified, of course, according to circumstances, that are requisite for maintaining the animal economy in health. Its reliance is on the natural agencies of health. Its cardinal medicines are the apparently simple medicaments of air, exercise, water, and diet, which, along with healthy moral influences, compose its not very extended pharmacopœia. These are the tools with which it works, and I, for one, can answer for their efficacy. But, however generally applicable, it would not be consistent, either with science or with fact, to assert that these means will

succeed in restoring health, absolutely and independently, in every case of chronic disease that admits of cure. To say as much, would of itself be a suspicious circumstance in the estimate a rational mind would be led to form, especially if it were at all versant with the nature of disease, of any system of therapeutics, or indeed of any system whatever. Perfection belongs not to any human combination, whether in the region of medicine, or in any other. The utmost, therefore, that we can say in reference to hydropathy is, that, when rightly understood, it appears to be based, as a system of cure, on principles that bespeak the allegiance of the candid, because of their foundation on physiological law; that it certainly does work marvellous cures, and those very frequently when it is resorted to as a *dernier ressort*, by means of the natural agencies alone; and this, as we believe, not only without doing damage to the powers of the general economy, but, on the contrary, by relying on its ability to exalt the same, and so to enable nature to throw off the specific disease, and re-assert her own

constant tendencies towards the state of health.

All this, however, may be perfectly true without by any means involving the notion of a panacea, or anything of the sort. And surely, by the wise, such a notion could no more be expected than countenanced. But although no panacea, I do not hesitate to affirm that hydropathy, as I understand this term, and have endeavoured to explain it, is adapted, more or less, to every form of human ailment; and that even where it is of itself insufficient to effect a cure, yet it can always, and should always, be employed as the groundwork of all medical treatment, to which in particular instances other means may be added as auxiliaries. I make this statement the more emphatically, because it is the fashion, both amongst some medical men and a portion of the public, to assert that hydropathy is adapted to a select class of cases alone, these being, as they aver, those of patients of naturally robust constitutions, who can therefore stand with impunity a good deal of heroic treatment. Such an idea proceeds from either

very great ignorance of the nature of the hydropathic procedure, or it is due to a physiological mistiness not very creditable to the possessors. I am not without some hope that the simple and truthful explanation I have endeavoured to give in the preceding pages may assist in removing such a misconception.

In the treatment of disease, then, cases certainly do occur in which, in the present state of our knowledge, we are not warranted in relying solely on the natural method of cure, although we can always (and to a certain extent always do, whether we recognise it or not) employ it as a groundwork of operations or as an auxiliary. A well-known instance in point will occur to every one in the case of *secondary symptoms*, in the treatment of which, so far as the present lights of medicine go, we certainly have hitherto considered ourselves bound to employ such remedies as mercury or the iodide of potassium. But the application of these means to the human economy, although they do undoubtedly often appear to cure the specific morbid poison for which they are given, is unquestionably an

evil pregnant with results, inferior only to the original complaint, in their damaging effects on the constitution. Still, in the present position of the medical art, we are forced to give them, always, however, under a protest, always with the conviction that we are driving out one devil by means of another only less baleful than himself, and, I can answer for myself, always with the feeling that such practice is a slur on the repute of the healing art. But having been driven into a corner, as it were, by a huge and threatening difficulty, and having been forced to do evil that good may come, for it amounts to that, when we have achieved our end in the suppression of the original complaint, we have next to bethink ourselves of doing something towards eradicating the bad effects produced by our remedies. And this we cannot hope to do but by the hygienic appliances of hydropathy. Fortunately, the disease I have mentioned is one, out of a comparatively small class, in the treatment of which we are still compelled to rely on the aid of drugs, and it is not to be doubted that the time is not far distant when we shall be able

to dispense with them even more than at present.

And this leads me to make a few remarks, somewhat more definitely than I have yet done, on my own personal views in regard both to the present state of the healing art and its probable course and development in future.

It is impossible to take the hastiest survey of the medical practice of the present day, as compared with what we know it to have been even so recently as twenty years ago, without feeling satisfied that a wide revolution in opinion, and in practical procedure alike, has overtaken this great department of human endeavour. The transition and the change are constantly on the lips of practitioners who can barely yet be termed veteran. With the astonishing strides of physiology, indeed, such a revolution became inevitable. With the new physiological impulse, the usual struggle commenced between a practice founded on empiricism and old tradition on the one hand and on science and reason on the other, and, as invariably happens, the latter is carrying the day. Physiology, in fact, has been to medicine what

the spinning-jenny has been to manufactures, only that the revolution due to the former has not been so instantaneous and complete as that of the latter, but is still silently going on and bearing its fruits from year to year. The marked effect of physiology on the profession has been to draw attention more and more to the value of hygienic medicine, in proportion as the knowledge of nature's own operations has been clearly understood. And I believe I am not wrong in asserting at the same time, that along with a growing belief in hygiene has arisen a corresponding scepticism in drug medication, with the modifications in every-day practice which this change has also certainly induced.

We observe the operation of this change, I say, both in a negative and, what is of much greater significance and value, in a markedly positive manner. Negatively it is seen, as just stated, in the extraordinary alteration in practice which is everywhere visible in the present day, to such an extent indeed as to have virtually transformed the profession, even to those who adhere to the allopathic faith and treatment in their entirety.

What has now become of the incessant use of the lancet, for instance—an instrument that formed the invariable pocket-companion of every medical man, and which mistaken physiological views induced him to employ on his patients with a rashness astounding to the weak minds of the present day? Why, it is scarcely ever seen, and, by the younger men in the profession, one might almost say is absolutely never used. The same may be said, to a large extent, of blistering, and of the inordinate use of the more powerful drugs, such as blue-pill, calomel, opium, the drastic purgatives, and so forth. It is a notorious fact, indeed, that the older and more experienced the practitioner, the less does his confidence in medicine, and the greater his reliance on nature, become. In a word, the heroic treatment has gone out, and has yielded, in the hands of the best men in the profession, to a mild expectant procedure, just sufficient, in many cases, to rescue its employers from the charge of do-nothingism. In a more positive way, the revolution in medical creed and practice is evidenced in a growing disposition to

rely with a full confidence on the natural means of cure as the sheet-anchor in the treatment of chronic disease.

It would be easy for me, in corroboration of this assertion, to cite the opinions of numbers of the classic ornaments of the profession, many of which have come down to us in the form of pungent proverbs, well known to every medical man, and not over-complimentary to our common art, as it has been. It is no part, however, either of my wish or object, to place the Astley Coopers and Lawrences, the Johnsons and Parises, in the witness-box for the purposes of a depreciatory cross-examination. Their testimony is curious, to say the least of it. But it is much more agreeable to look at the present for its progress, than to recur to the past for the sake of exhibiting its failings, and it is still more agreeable to look forward to the advancement of the future of medicine from the recorded opinions of some of the wisest of its present practitioners. These opinions may be fairly regarded as "signs of the times," in reference to the treatment of chronic disease,

and I therefore deem it advisable to cite a few of them by way of illustration.

The first extract I shall give is from Dr. Williams's *Principles of Medicine*, a work of so established a repute in the profession that it must always carry a great weight of authority along with it. He speaks of hydropathy thus:—
“ The reaction which follows the judicious use of cold as a therapeutic agent, may prove serviceable, not only in resisting the further influence of cold, but also to remove congestions and irregularities in the circulation from other causes, and to excite in the capillaries and secernents new actions, which may supersede those of disease. It is thus that the water-cure of Priessnitz chiefly operates, and although too powerful an agent to be entrusted to unskilled and unscientific hands, it promises to become a valuable addition to the means of combating diseases, particularly of a chronic kind.”*
Now, although, as I have sought to show, the water-cure is in reality dependent for its success on other agents besides water in any of its forms or applications, and is altogether

* Williams's *Principles of Medicine*, second edition, p. 55.

of a more catholic nature than indicated above, yet there is no doubt that, so far as it goes, Dr. Williams's view is quite correct, and it is gratifying to recognise the frankness and love of truth which, in an age of transition, with all its perplexities and jealousies, prompted the writer fairly to admit the existence of a scientific and highly curative principle, in a system of therapeutics hitherto considered as rank quackery by the professors of what has been termed *par excellence* legitimate medicine.

The next extract I shall make is from Mr. Quain's *Treatise on the Rectum*, also a standard work. In speaking of the treatment of hæmorrhoids, he thus expresses himself:—

“But how is relief, and that as permanent as possible, to be afforded in such a case? My answer is, not in the continued use of drugs, but by attention in detail to the various circumstances which conduce to the maintenance of a healthy state of the system. Thus:—While the diet is regulated—made more moderate in quantity, as well as less stimulating—the skin is to be thoroughly cleansed by daily ablution. Active exercise is to be taken for at least a

couple of hours each day, afoot or on horseback : and the effect of this, it is to be borne in mind, is all the more salutary if a degree of perspiration accompanies the vigorous exercise of the limbs. By the action of the skin, which is one of the great emunctories of the system, and the increased nutrition of the muscles, the internal congestion, before adverted to, is removed or prevented ; and a feeling of elasticity, of health, in a word, is substituted for the former feeling of heaviness and discomfort. During five years the gentleman whose case forms the groundwork of these observations has pursued this plan, taking his exercise on horseback ; and during that space of time he has been free from any recurrence of the hæmorrhoidal affection, as well as from (with only occasional exceptions, easily accounted for) the throbbing of his head and uneasiness down the left arm. It is not always easy to convince people that medicine cannot safely be made a substitute for moderation in diet, pure air, and exercise of the limbs—in short, *for all the natural circumstances which experience shows to be necessary for the preservation of health.* To the

person of sedentary habits, the aperient drug gives relief for the moment, as it not only evacuates the bowels, but also unloads the blood-vessels of the abdomen, in a degree, by exciting a serous or watery discharge from them. When absolutely necessary, and for an occasion, the purgative is as salutary as it is an efficient aid in the removal of the attack of illness. In this way it is really beneficial—not so, however, its continued use. Besides, the fact is not to be overlooked, that the frequent resort to aperient medicine creates a strong desire for the continuance of the practice, owing, it is said by those who experience the effect, to the sense of ‘ease and lightness’ it occasions. So in time a habit is created—one, too, as difficult to be got rid of as any other habit. Our patient admitted that for several years he had commonly taken purgative pills, with senna draughts or castor-oil, once or twice a week; and that when leaving home he used to consider medicine of that kind as much a necessary part of his luggage as any portion of his wardrobe. I have here adverted in general terms to the general plan

of management, dietetic and medicinal, that it is proper to pursue. In actual practice all must be stated in detail; and it is best in most cases that the instructions for diet, as well as general management, should be written down, as well as those for medicine. Remember that, as much of the illness that is suffered is induced by the common things with which we are all constantly surrounded and influenced, so the relief and prevention of the evil is in a great measure to be obtained by the direction and control of these. Common things must be carefully attended to by the practitioner; things that are not common will command attention.”* Now, in honest truth, if I were to take this passage as a fair exponent of Mr. Quain’s opinions on the treatment of chronic disease, I should be disposed to consider him as good a hydropath as I know. He is so in all material points except the name. I would defy any hydropathic physician to lay down a body of rules for the treatment of piles differing largely from those indicated with so much sense by Mr. Quain; only that, in addi-

* Quain on *The Rectum*, pp. 8-11.

tion to the all-essential natural means he recommends, the former would certainly have pressed into his service two or three of the applications of water peculiar to the hydrotherapeutic system; and to these I think it probable that Mr. Quain, to judge by the general tenor of the above passage, would be one of the last to object, either in principle or in practice.

I might further illustrate the views of the thinking men of the profession within our own day by citing innumerable passages from the works of Dr. Andrew Combe, who, as he was amongst the first labourers in the field, so he probably did more by his writings and his practice than any man of his time, to inculcate a trust in nature and natural agents in the treatment of disease as well as the preservation of health. And to those who desire to learn what may be done for these two ends by the rational means of an enlightened system of hygienic procedure, the admirable biography of Andrew Combe by his distinguished brother will afford an instructive example. I wish, however, rather to confine myself to living authors, and shall add to the foregoing selec-

tions a few of the closing sentences of Dr. Hughes Bennett's Lecture on the "Present State of the Theory and Practice of Medicine," delivered to his class in the University of Edinburgh, on the opening of the Session of 1855-56. "It is true," says he, "that the contradictory character of medical doctrine has in all times excited the ridicule of the weak-minded, and still constitutes the ground on which medicine is attacked by the ignorant and superficial. Yet the differences which exist no more prove that there is no foundation for medicine as a science, than the great variety of religious sects shows that there is no truth in religion, or than the varied decisions of our courts of law prove jurisprudence to be a farce. All these contradictions depend upon imperfect attempts at correct theory; and this latter once rendered perfect, it will be seen that health and disease are governed by laws as determinate as the motion of the planets and the currents of the ocean. This conviction is now everywhere gaining ground, and the public are beginning to distrust the man who merely boasts of his experience in the action of his drugs, and to

place confidence in him who treats according to natural laws and simplifies his remedies. Even quackery has changed its features, and instead of deluding the so-called intelligent class by the wonderful powder or universal pill, it spreads its destructive fallacies under the mask of startling phenomena, or of some therapeutic law. But notwithstanding the discouragements which knowledge has received, and will ever suffer, from the indolent or narrow-minded, at no period has the tendency to cultivate scientific medicine been more strongly manifested than at this moment. Everywhere in Europe we observe a noble effort to enlarge the foundations on which its practice is based. Everywhere we see natural philosophy advancing—enthusiastic chemists pushing forward organic analyses—anatomists unwearied in their researches concerning development and the structure of tissues—physiologists experimenting and concentrating all the resources of modern science, in order to elucidate organic laws—and pathologists busy in connecting the symptoms observed in the living with alterations in the minutest tissues

and atoms of the dead. At this time medicine is undergoing a great revolution, and to you, gentlemen, to the rising generation, do we look as to the agents who will accomplish it. Amidst the wreck of ancient systems, and the approaching downfall of empirical practice, you will, I trust, adhere to that medicine which is based on anatomy and physiology. If you now resolve to follow in the legitimate path of improvement, to which all reason and experience invite you, be assured that the toil of mastering what is now known of correct generalization will not be in vain. Everything promises that, before long, a law of true harmony will be formed out of the discordant materials which surround us; and if we, your predecessors, have failed, to you I trust will belong the honour of building up a system of medicine which, from its consistency, simplicity, and truth, may at the same time attract the confidence of the public and command the respect of the scientific world." There is no one who will not add a hearty amen to this hopeful and earnest wish for the future of medicine.

But by far the most remarkable and startling

views that have yet emanated from the ranks of the school of old physic in reference to the treatment of disease are to be found contained in the work of Sir John Forbes, entitled *Nature and Art in the Cure of Disease*, and published within the present year. This book is altogether a singular phenomenon, when we consider the quarter from which it has proceeded, and it must certainly have fallen like a bomb-shell into the strongholds of conventional opinion in medicine. One does not know whether most to admire the candour or the daring of the man, who, in such a position, could offer such a book to the profession as the result of a long life of experience with the mature reflection of "years that bring the philosophic mind." Nothing but the talismanic *prestige* of the highest professional consideration could have saved it from an overwhelming storm of abuse on the part of the myrmidons whose function it is to keep down all rebellious attempts in the sober house of physic. Sir John Forbes's Treatise is manifestly the "harvest of a quiet eye," and as such it would be entitled *a priori* to all the respect that can be accorded

to it. It is the production of an intellect observant at once and philosophical—capable of taking a large grasp of facts and of generalizing correctly from them. What, then, is the conclusion to which all his observation and reflection have led in reference to the treatment of disease? Let one or two specimens suffice. “Such has ever been the want of trust in nature,” says our author, “and the over-trust in art prevalent among the members of the medical profession, that the field of natural observation has been to a great extent hidden from them; hidden either actually from their eyes, or virtually from their apprehension. The constant interference of art, in the form of medical treatment, with the normal processes of disease, has not only had the frequent effect of distorting them in reality, but, even when it failed to do so, has created the belief that it did so: leading, in either case, to an inference equally wrong; the false picture in the one instance being supposed to be true, the true picture in the other being supposed to be false. With this impression on their minds, it was scarcely possible for practitioners not to

form a false estimate alike of the power of nature and of the power of art in modifying and curing diseases; underrating the former in the same proportion as they exaggerated the latter. And the consequence has been that diseases have been treated mainly as if nature had little or nothing to do in their cure, and art almost everything. A principle so false, adopted as the ground of action, could not fail to be the source of the gravest doctrinal errors, with practical results of the most deplorable character. The great object of the present volume is to expose these misconceptions and misappreciations, and to substitute in their place juster views of the animal economy in disease, and juster views of art's relation to it. If I succeed in effecting this object, even in a slight degree, so as to impress the minds of some of the younger and less prejudiced members of the profession with the truth and importance of the principles advocated, I can entertain no doubt that a great good will thereby have been gained for practical medicine."

Again: "The object of the work is not

simply to exhibit in an independent manner the general fact of the respective and relative powers of nature and art in curing diseases, but to establish the more special fact that nature possesses vastly greater powers than art in curing diseases, and, consequently, that its extent is beyond the common belief of the junior classes of medical men, and men in general."

Once more: "Perhaps there is hardly anything in the whole range of ordinary everyday knowledge—that is, knowledge with which every one is more or less conversant and familiar—which is so little understood by men in general as the real nature of the medical art, and its actual power in ministering to the relief and cure of diseases. Respecting this latter point, its power, the ignorance of the lay public is generally extreme. The belief commonly entertained is that, in the vast majority of the cases of disease in which the patient is restored to health, the principal, if not the sole, agent in this restoration is the artificial treatment, that is, the drugs and other remedies, prescribed by the medical attendant. By such persons

nature, or in other words the inherent powers of the animal economy, are either entirely ignored as having any share in the result, or their share in it is regarded as extremely slight and unimportant.

“In acute diseases of short duration, more particularly, as in many fevers and inflammations, the abatement of the severe symptoms which often ensue speedily after the administration of remedies, is invariably attributed to the active measures had recourse to in such cases; a conclusion which, however false, can hardly be wondered at under the circumstances. When the observer sees bleeding, blistering, vomiting, purging, and all the other heroic arms of physic brought into action against the disease, with the avowed object of curing it, and when the disease is seen to abate or disappear within a short period after their employment, the inference seems inevitable that the artificial treatment was the exclusive agent in effecting the cure.

“In chronic diseases, especially those of long standing, the apparent demonstration of art’s powers is not so striking; and still, in the pre-

vailing ignorance of there being any other agency to explain it, the result is as confidently set down to the treatment as in the other case. So general, indeed, is this belief, and the confidence in its validity so strong, that it is rarely shaken, even by the most untoward events. In the most obstinate and prolonged diseases, extending, it may be, over months or years, if the patient at length gets well, the medical treatment still receives the credit of the cure; and the physician, if he has continued to preserve his patient's confidence throughout, is sure to be lauded for his knowledge and skill, in having been able so long to make art hold its ground against so severe and obstinate a disease, and finally triumph over it."

Sir John goes on to express his want of surprise that this mistake should be so prevalent among the lay public, and he even thinks that, all things considered, its almost universal existence among medical men is as easily accounted for. "When all the circumstances hostile to the attainment of truth in this particular are duly weighed, I think it will be

admitted to be scarcely possible for even the most philosophical student to escape their unhappy influence in the first instance, or to get completely rid of it afterwards.

“If the influence is ever wholly overcome, I believe it can only be through the teaching of a long, well-sifted experience, directed and enlightened by an independent spirit, and a due endowment of that philosophical scepticism, comparatively so rare, but essential to all scientific investigation. The mind of ordinary or inferior power, here as elsewhere, can scarcely ever escape from the conventional thralldom in which it has been nursed.”

Finally : “However favourably we may look on remedies, and although we may admit their validity in many cases, they can at most be regarded, in relation to the case of most diseases, only as the voice, hand, whip, or spur of the rider to the progression and course of the horse : they may stimulate or excite the natural faculties to do the work which they themselves have no power to do ; they may possibly, also, regulate or direct the course of action of the natural faculties (as the rider

guides his horse) so as to force them to a speedier, or even a different issue; but the essential agency in both cases is exclusively in the individual organism, not in the extraneous spur;—the muscles of the horse in the one, the *vis medicatrix* in the other.”

I might go on to quote from this admirable work at great length, and the temptation to do so is strong. Agreeing, however, as I do so heartily, with the general tenor of Sir John Forbes's ideas both as to the nature and course of diseases, and as to the general efficacy of nature in working her own cure, I am not prepared to go all lengths with him as to the inutility of art. But first it would be necessary to define the precise meaning of art, to establish clearly in what it consists. If by the term “art” Sir John Forbes means to signify the system of drug medication as practised by the great body of the medical profession, then I entirely agree with him; but this would manifestly be to confine the term within very narrow limits. It seems plain, on the contrary, that unless some such arbitrary and restrictive signification be employed, the term art must be

made to include every species of attempt to modify or control disease, whether such attempt consist in the administration of powerful drugs, or whether it proceed, as is the case with the hydro-therapeutic treatment, on the opposite principle of combating disease by the systematic use of all those natural agents which we group together under the one title of hygiene. This consideration, to say nothing of its scientific truth, is not to be overrated in practical importance; for if the medical art had nothing better to fall back upon, or to look forward to, than simple negation,—if it were, in the future, compelled to content itself with playing the part very much of a mere spectator of the course of disease, and nothing more,—it appears to me that such a state of things would go far to justify all the reproaches its enemies are ever so prone to heap upon it. How little I anticipate the risk of such a result, however, will be apparent to every one from the preceding pages.

But the main object I have had in view in quoting so liberally from Sir John Forbes and others, has been to demonstrate the channel

in which, more or less, the opinions of the advanced thinkers in medicine appear to be running in our day. Clearly it is towards the abandonment of the old conventional empiricism in practice, and it is towards establishing on its ruins a system of therapeutics based on anatomy and physiology. We spoke of the apparent medical tendencies as exhibiting themselves in a negative and more positive manner, and the express sentiments of the authors I have cited have been adduced in evidence of the latter. I might notice other indications. If I am not misinformed, it has been under consideration to establish in King's College a Chair of Hygiene as a necessary branch of medicine. There has already been organized, and there is now ably supported, a quarterly journal of hygienic medicine, under the editorship of Dr. Richardson, with a staff of orthodox medical practitioners, whose function must necessarily be to regard disease and its treatment from the hygienic or natural-means point of view. I have already noticed the establishment of Brompton Hospital in one of the healthiest suburbs of London;—on what prin-

ciple, or for what cause, if not from a recognition of, and a desire to carry out in practice, to a certain large extent, the hygienic conditions of cure?

And now, with such indications as these before us, have we the data to enable us to form a rational judgment as to the probable medicine of the future? On taking a retrospect of the past, we have seen that the practice of old physic consisted, as was most natural, in great part, of a conventional routine, handed down from generation to generation by tradition, and grounded on the results of tentative experiment alone, irrespective of scientific principle. That practice dates from the first dawnings of the art, through the whole progress of its history, right into the heart of the present generation. But it has received a palpable check, and it may safely be asserted that, as an independent and exclusively self-subsistent system of therapeutics, monopolizing the whole art and profession of medicine, it is for the future wholly impossible. Judging then from the past, and more especially from the history of the last twenty years, once more

we ask, to what species of medical treatment in disease is the scientific mind of Europe tending in time to come? As before stated, unquestionably to a system of therapeutics based on anatomy and physiology. In fact, if we have any faith in the final triumph of truth, we cannot doubt it for a moment.

Now, the main object of this essay has been to show that hydropathy, or the treatment of disease by the natural agents, is precisely such a system, whether it be called by that name or by the more correct title of the physiological practice of physic, or rational or hygienic medicine. And it is therefore my conviction that it must ultimately take its place as the indispensable basis of all medical practice. That is the position I claim for it, and I must repeat that I am anxious to draw a more especial attention to this fact, for the reason that even those who approve of hydropathy so far—men like Dr. Williams and Sir John Forbes—appear to regard it rather in the light of an auxiliary to drug-medication at best, and as being adapted to but a limited number and kind of cases. This is a cardinal point on which, with

great submission, I would join issue with these distinguished authorities. My view of the matter is precisely the converse of theirs; and I assert fearlessly that if hydropathy, rationally understood, be conceded to be identical with hygienic medicine, and founded on physiological law, then it must necessarily form a part of the treatment of every case of disease, and more, it must of necessity form its groundwork. This is saying the very least. When that is done, it remains to be added that the natural agents will of themselves suffice to cure in the bulk of curable chronic affections; while I am of opinion, nevertheless, that cases do arise occasionally not only where drugs may be given with advantage, but where they are absolutely essential. I believe moreover that this will be the ultimate order of things in medicine. More and more, as we have seen, the minds of the ablest thinkers in the profession, and of the men of the largest experience, are drawn into an increased reliance on nature and the means of her own choosing for the maintenance of health and the cure of disease. Hear Sir John Forbes again:—"The

conviction of the great autocracy of nature in the cure of diseases is much more widely spread among the senior members of the profession than is at all believed by the great body of practitioners. It is this conviction, influencing their proceedings, that so often makes the practice of these men obnoxious to the charge of inertness from their younger brethren. They are accused of being as inactive as 'old women,' and are indeed accounted as such by the whole band of heroes fresh from the schools, as well as by those of maturer age, whom experience has never taught to doubt respecting the conventionalisms of their early training. It is as an old member of this inert fraternity, and as the expositor of doctrines sanctioned by their opinions and practice, that I have ventured to take upon myself my present task; and I feel assured that, if I were allowed to adduce the many eminent names who join with me in opinion, whether from the ranks of living or dead physicians, the doctrines I venture to promulgate would meet with much readier acceptance from the profession and the public

than they are likely to do under the authority of any individual. At any rate, I must be allowed to appeal to the enlightened experience of such men, as one of the most fruitful and valuable sources of evidence in behalf of the truth of the proposition under consideration—to wit, the great and extensive capacity of nature to cure diseases, with little or no assistance from art.” And so on *passim*.

The plain truth is, indeed, that between the opinions of such men as Sir John Forbes and those of the practitioners of scientific hydro-pathy the difference is, in a great degree, merely nominal; and it is my very firm belief that if the “inert fraternity” he alludes to had been somewhat younger men when hydro-pathy was first practically set on foot, or if that system had originated with a man, or men, of science, and had been in its first beginnings free from many of the extravagances which defaced it, however much allowance is to be made for them, these gentlemen could not have consistently refused to embrace its principles, identical as these are with their own, nor its practice, conformable as it also is with

theirs, except in so far that, being as it appears to me quite as natural and as scientific, it is also much more positive. The hydropathic physician, it must be allowed, recognising the enormous value of hygiene, at least makes the attempt to carry it out in his treatment. He cannot be accused in the smallest sense of saying—*Video meliora proboque, deteriora sequor*; nor is he content with mere negation.

But it is to the rising generation assuredly, as Dr. Bennett has well said, that we are to look for the large reform in medicine. Youth is naturally progressive—age is marked by conservatism. The latter quality may have its own great uses when rightly directed, and it will also retain its value in medicine as in politics; but it must ever be yielding, in the one case as in the other, before the superior force of progress. Hence, although we may hail with infinite satisfaction the declaration of Sir John Forbes, that his own therapeutic views are largely entertained by the veteran magnates of the profession, we must be well aware that these heretical notions *are* confined to a small band of independent thinkers, and are

looked at more than askance by the great body of the routine practitioners who graduated forty years ago. It is to the young men of the profession, therefore, that we must trust for carrying out the work of medical reform. And indeed, if I were to relate my experience of the opinions of the thinking portion of medical students in my own day, which I took great pains to ascertain, I should say that the work of reform, so far as it depended on them, would proceed at a rapid pace, but for certain practical drawbacks. In nine cases out of ten they were extremely sceptical as to the value of drugs, and as thoroughly impressed with those physiological doctrines which, if carried out into practice, would have led substantially to the adoption of hydropathy. Nor is this wonderful, for it always appeared to me that, apart altogether from the lessons that reflection and experience might teach, a student had only to listen to a course of lectures on *Materia Medica*, however ably the subject might be treated, in order to become at once struck with the highly unsatisfactory nature of the implements he is called on to work with.

With a few grand exceptions, is it not a uniform history of remedies that appear to have been selected very much at hap-hazard, that have had each its little day of popularity, and finally become as much despised and neglected as they were originally puffed to the skies?

I might dwell at length upon this point, and I might add, as an additional argument against the over-prevalent use of drugs, the extraordinary facts which analysis has of late years brought to light, showing that adulteration has gone on in such a wholesale fashion that it is next to impossible to procure medicines of genuine quality and strength. How strangely, for instance, to the young aspirant in medicine must such a statement as the following sound, taken from the report of Mr. Simon on the sanitary condition of the city of London in the year 1854. Mr. Simon says:—
“It is notorious in my profession that there are not many simple drugs, and still fewer compound preparations, on the standard strength of which we can reckon. It is notorious that some important medicines are so often falsified in the market, and others so often mis-made in the

laboratory, that we are robbed of all certainty in their employment. Iodide of potassium, an invaluable specific, may be shammed to half its weight with the carbonate of potash. Scammony, one of our best purgatives, is rare without chalk or starch, weakening it perhaps to half the intention of the giver. Cod-liver oil may have come from seals or from olives. The two or three drops of prussic acid that we would give for a dose, may be nearly twice as strong at one chemist's as at another's. The quantity of laudanum equivalent to a grain of opium being, theoretically, 19 minims; we may practically find this grain, it is said, in 4·5 minims, or in 34·5. And my colleague, Dr. R. D. Thomson, who has much experience in these matters, tells me that of calamine, not indeed an important agent, but still an article of our Pharmacopœia—purporting daily to be sold at every druggist's shop, there has not for years existed a specimen in the market.”* When to such an exposé as this is added the yet more recent testimony of Dr.

* *Reports relating to the Sanitary Condition of the City of London.* By John Simon, F.R.S., &c., pp. xxi. and xxii.

Hassall, based on the most careful and accurate scrutiny of the subject, who shall wonder if the young student should feel distrustful of an armoury whose weapons of offence against disease, he is duly informed beforehand, are not only uncertain, but in too many instances absolutely spurious and worthless? In good truth, this appears to be jesting with a subject wherein, of all others, a jest is lamentably out of place; and yet, amidst this sad embroglio of inaccuracy and confusion, the men are not wanting who are eager to dub with the ever-ready "quack" any honest inquirer that endeavours to quit this slippery ground for a more secure footing on the *terra firma* of physiology and common sense.

But independently of the odium that attaches to every member of the profession who has the hardihood to step ever so little aside from the well-beaten track of routine, in the general case the young practitioner has to encounter a more formidable lion still in his path, the moment he quits the walls of the university; for the very simple question then forces itself upon him—how is he to get his

bread? It is not with him a question of what practice or what opinions are true, but what will yield him a livelihood? That is the grand touchstone. If the public are unenlightened, enlightened opinions on the part of the practitioner, instead of assisting him, will only stand in his way. And the plain truth is that the ordeal is too much for most men. Science and independence are no doubt very grand things, but they require a little solid backing in the form of rations—and, failing this, the man is to be excused who declines to starve in their cause. Thus it is that the great proportion of young graduates in medicine have no choice but to enlist themselves in the ranks of ordinary routine, until very often at last they are brought, through the force of habit itself, to believe quite conscientiously in those very remedies, or at least to prescribe them without hesitation, which they originally misdoubted, or even despised. To such an extent are we the creatures of circumstance.

Such a state of things, however, suggests serious reflections, of which not the least serious is this—that until the general public

become better educated in matters pertaining to health and the general principles of medicine, there is little hope for any speedy advance in the reform of medical practice. That this will ultimately take place, to such an extent as to enable them to form rational opinions on the subject, and to discern between truth and conventionalism, charlatanry and 'genuine enlightenment, no one can doubt. The importance of the subject is gradually pressing itself on the minds of all thinking men, and although physiological instruction has not yet taken a systematic form as a necessary branch in the curriculum of an ordinary education, there can be no question that a fair beginning has been made; and such appears in our day to be the rapid extension of ideas that are founded on truth, that there is no room left for a misgiving as to the chance of their ultimate and complete prevalence. And when the clear and broad doctrines of hygienic medicine have once fairly been taken hold of by the public at large, woe to the practitioner who fails to give them their due weight in the rationale of his medical treatment.

It is most certainly by this means, amongst others—by this *vis a tergo*—that the medicine of the future will be modified. And let not the most determined old-school routinist despond. Drug medication, more especially in the treatment of acute diseases, will, I verily believe, always retain its value;—nay more, may always continue to be in very many cases indispensably necessary. The only point that remains to be gained is to confine it to this, its own appropriate sphere, and not to permit it to trespass beyond those limits which science and the best experience together have prescribed for it.

I believe that the medicine of the future must of necessity be built upon this basis. Persevering, with the aids of chemistry and pathological anatomy, in the course of a most searching and continued investigation of the nature and symptoms of disease, and acquiring thereby, more and more, a decisive mastery in diagnosis, the science of medicine, so far as treatment is concerned, must take its stand on the groundwork of hygiene, in its broadest sense; and it must also be armed with all the resources

of the Pharmacopœia which an accurate and wide investigation of their effects shall have justified. Nor will this be any new union. The intuitive mind of Greece, ages ago, apprehended the wisdom and the necessity of such an alliance, which was commonly typified on their marbles by representing Æsculapius and the goddess Hygieia standing hand in hand beside an altar, to which they appear to be offering their joint and common contributions of service. Such a representation may still be seen by the curious on a bas-relief in the Louvre. And surely this co-operation, thus early and thus presciently suggested to the world under the above emblem, will come ere long to be finally established as a scientific necessity. The interests of medicine demand this reconciliation, and the interests of mankind demand it no less. That it will eventually be brought about, is as certain as that fire burns or that water drowns; but it is the solemn duty, nevertheless, of every member of the profession to help it on, meanwhile, by every means in his power. And this will assuredly not be achieved without considerable sacrifice of individual opinion on every side. The

holders of different views in such a science as medicine must learn to give and take, and must be mutually tolerant. Medicine does not enter amongst the *exact sciences*, and there are many considerations which will always deprive it of any title to mathematical precision. Within certain limits, therefore, and those wide enough, as all experience shows to be needful, there is not only room for legitimate differences of opinion, but they are plainly inevitable. This is the case, as every one knows, with professions where much greater certainty is attainable than in medicine. Look at the Church—and consider its divisions and sub-divisions without end—and reflect what the fate of even so small a section as the Established Church of England must have been, if, assuming a rigid standard of orthodoxy and insisting on one only interpretation of doctrinal difficulties, her policy had been to expel from her bosom every one of her children who was found dissenting ever so little from this standard. Had such been her course, it is certain that the Church of England would, long before this, have arrogated that title to herself very pre-

sumptuously and very untruly, for she must have been a wreck of which the fragments were scattered on many an alien shore. She must have been rent to pieces by schism, for it is notorious, from the events of even the last ten years, that within the pale of the Church, and therefore, it must be presumed, under the banners of orthodoxy, are men who differ from each other, not simply on trivial, but on the most cardinal points—and yet they are all churchmen. In this toleration the Church has evinced her great wisdom, and I am not aware that the spiritual interests of the people of England have suffered therefrom. The profession of medicine has no proper hierarchy, like the Church; and the body that are supposed to represent its orthodoxy have no power to exclude from its ranks any legally qualified member who may differ from them either in theory or in practice. But that is not sufficient. As before said, within certain limits, and even these not over-rigidly defined, a large toleration is to be exercised, in the interests of truth and of justice together, by all the members of the profession towards each other.

We are all fellow-workers at the same difficult task. One man considers that he can achieve it in one way, another, as well-qualified as he, but taking a different stand-point, is forced to think and act differently. In the name of common sense and common fairness, an appeal which should not be made to Englishmen in vain, let them both have free scope for their individual views and efforts. Who shall say which is right? Probably—nay, almost certainly—they are both only partially so; although, of course, truth may greatly preponderate on the one side over the other.

The main object of this essay has been to . . . claim thus much, and no more, for hydropathy. First to endeavour to explain it, then to ask at the hands of unbelievers at least toleration. I, for one, can truly say, that I was led to adopt the system, not because of its novelty, but honestly because it appeared to me to be the sole effort I could discover, in any quarter, to carry out systematically those great physiological principles in the treatment of disease which struck me, very early in my studies, as the natural foundation of all therapeutics. On

a more extended knowledge of hydropathy, derived from the practice of it as a physician in a large variety of cases, I have seen no reason to change my opinion of its worth. On the contrary, what was only theory in the first instance, and as such, not wholly to be relied on, has come to be consolidated by the lessons of experience, which cannot be gainsaid.

I have already explained the manner in which I understand hydropathy—as identical, namely, with the natural system of therapeutics. I began this treatise by taking exception to the *name* hydropathy, which must, I conceive, eventually pass away and become merged into something broader and better; and I have fully announced that I do not consider it, in the very smallest degree, as a panacea. But taking it for what it really is, I say fearlessly, that no unprejudiced mind of any intelligence can fail to recognise its truth and its value. And I earnestly look forward to its adoption by the medical profession as a step that will supply a clear, simple, and yet scientific principle of procedure, in a region where a scientific principle is sorely needed—as a measure not revolutionary,

but truly conservative—tending to supply a back-bone of strength, where it, too, is much required; lastly, as an inestimable boon to that public whose ever-advancing intelligence will enable them, more and more, to lay hold of the large results achieved in all the sciences, even if they do not comprehend the processes through which these have been attained, and who, if not guided in the pathway of truth by those whose more special function such guidance may be, will assuredly before very long take up the torch and lead the way themselves.

THE END.