The Abernethian code of health and longevity, or, every one's health in his own keeping, by the proper regulation of the stomach and bowels ... Containing full rules for the application of this system ... with an introductory view of the living functions of the animal economy / [John Abernethy].

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## ABERNETHIAN CODE

OF

# Mealth and Longevity,

OR,

EVERY ONE'S HEALTH IN HIS OWN KEEPING

BY THE

PROPER REGULATION OF THE STOMACH AND BOWELS.

In order to the attaining and securing those invaluable blessings,

FOUNDED ON THE PRINCIPLES AND PRACTICE OF

### JOHN ABERNETHY, ESQ. F. R. S.

Senior Surgeon to St. Bartholomew's Hospital.

CONTAINING

FULL RULES FOR THE APPLICATION OF THIS SYSTEM,
BY SUITABLE REGIMEN, DIET AND EXERCISE;

WITH AN INRODUCTORY

VIEW OF THE LIVING FUNCTIONS OF THE

## Animal Economy,

Shewing their mutual relation to each other,

AND HOW THEY SEVERALLY DEPEND ON THAT PART OF THE MACHINI
THAT INFLUENCES AND REGULATES THE WHOLE.

CONCLUDING WITH SOME

MOST REMARKABLE INSTANCES OF LONGEVITY, AND ITS COMPARATIVE ESTIMATE IN DIFFERENT CLASSES OF SOCIETY.

Principiis obsta, &c.

It is better to prevent than cure.

PUBLISHED BY J. WILLIAMS, No. 44, PATERNOSTER ROW AND SOLD BY ALL BOOKSELLERS.

# ABERNETHIAN CODE

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11925

### TO JOHN ABERNETHY, Esq.

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When the great Frederick of Prussia took the City of Prague, he found in its cathedral the Twelve Apostles of pure gold. These, like other conquerors, he made his prize; and when reproached for this apparent sacrilege, he replied, he had only executed their master's command in sending them to travel over the face of the earth. In the same manner, it is to render the digestive system more extensively useful, that the present dress is assumed for it, and where the importance of the stomach is pointed out by a chain of facts you have never brought into view. The celebrated seventy-third page of your book, is however inserted, that no reader may be under the necessity, particularly if he is economical, of making his pilgrimage for it to Longman's, according to your usual directions.

I am, Sir,

Your's,

THE AUTHOR.

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### TO THE READER.

THE only infallible means for preserving sound Health, and attaining a hale Longevity, are by simple Domestic Medicines, adapted to the constitution of every Individual and Family, more particularly for the Nervous Invalid, and those of a delicate, ailing habit, founded on the great Principles of JOHN ABERNETHY, Esq. F. R. S. and Senior Surgeon to Saint Bartholomew's Hospital; whose golden rules for health consist in an attention to the due regulation of the Stomach and Bowels, the grand Elaboratory by which the Blood, the source of Vitality, is prepared and transmitted to every part for the purposes of Life, or, in fact, by simply promoting the process of Digestion and the natural and free Secretion of all the Organs.

The Medicines connected with the Work are, "The Alterative Digester," and "Chylopoetic Aperient." The former (marked No. I.) to correct and invigorate the Stomach, two of which are to be taken every forenoon; and the latter (marked No. II.) to regulate the action of the Liver and Alimentary Canal, two only, when necessary. By these convenient forms, every one is enabled to be his own Physician and Apothecary without the aid of the Profession, and on such rational grounds as experience has fully proved and which no thinking man who

reflects on the subject can dispute.

The Work and Medicines are to be had either together or separately, of Mr. Williams, Bookseller, 45, Paternoster Row, and of the different agents appointed by him, the latter in small parcels, at 1s. 6d. and 3s. each. By this plan every Purchaser becomes a Patient to himself, and receives the Medicines as the known Prescription of a great Medical Character, there being nothing of mystery or empyrical secresy connected with them.

#### ADVERTISEMENT.

THAT every man becomes his own physician at forty is an old proverb, or at least that he should be able by that age, to know his own constitution, and what will agree or disagree with him, is obvious, otherwise his observations of himself, have been made to little purpose; but to teach a man from his youth to preserve his health, strength and vigour unimpaired, is the grand secret worth acquiring. This Hippocrates, the father of physic first laid down, and returning to his precepts, Mr. Abernethy has said, and on every occasion enforced it, that it can only be done by a strict attention to the regulation of what may be termed the primary organs, which constitute the elaboratory of the machine, and on this principle, the whole of his system is built-a system simple and clear, and which every man can carry into effect in his own person, without the aid of the profession at all. The celebrated maxim of the great Boerhaave, to keep the head cool and the feet warm, was directed solely to the equable circulation of the blood, or to lessen the accumulation of blood in the head and preserve the energy or vital powers of the extreme parts. It is evident, however, that the same maxim is more completely and successfully carried into effect by the regulation of the primary organs, or the functions of the stomach and bowels being properly performed; for thus no morbid accumulation will take place to produce congestion in any part: the circulation, on the contrary, will go on free and unobstructed through every series of vessels destined for it, and the fluid be transmitted at the same time in a pure and healthy stream.

The same observations may be extended to all popular systems of medicine; for even the primitive medicine of Westley, and of authors of the same class, as regarded the preservation of health, has depended solely on the cure of disease—not on its prevention. Hence the unmeaning farrage of medical recipes for this purpose with which such works abound, while the present leading and simple principle does away the whole complex machinery of such architects of health, and buries them in rubbish, as swerving from the path of nature and common sense in their medical recipes distributed and supplementations.

in their mode of proceeding.

### PRINCIPAL FUNCTIONS

TO SHOOT WALLES HAVE OF

OF THE

## SYSTEM.

The formation of the blood in man, and, it may be said, in all other animals, is the grand purpose for which the preparatory organs are arranged, and the transmission of this living fluid through its various channels, for special purposes, constitutes the entire economy of the system. From the blood every part of the body is originally produced: this takes place while in the womb, by means of the circulation in the mother; and it is only after birth, when the lungs are expanded, as an essential and primary function to the circulation of the blood, that man depends for the continuance of existence and health on his own powers during the remainder of life.

In order to a complete and healthy formation of the blood, three important functions must be always regularly and correctly carried on.

First, The functions of the digestive organs to prepare and

assimilate healthy nourishment.

Secondly, The functions of the bowels and their appendages,

to separate and carry off the useless part received; and

Thirdly, The functions of the pulmonary system, or the lungs, to inhale that essential matter which gives colour and vitality to the blood, thereby completing it; and to remove also that matter again in its effete state, after the expenditure of its vital principle.

But it is only the functions of the two first parts of the system that are within our management and proper regulation.

The functions of the lungs, as under the influence of atmospheric agency, depend on circumstances that are too much beyond our controul. Such being the case, we are restricted to trace only the nature of the digestive and expulsive organs, and from them alone, draw the necessary conclusions that tend to the preservation of health, the cure of disease, and the extension of life, or in other words, the means of attaining longevity, which can only be a real blessing, with the possession of health, and the power of enjoyment.

The principal organ is the stomach:\* no animal can exist

\* The vital importance of the stomach to life, may be judged of from the following facts. Such simply organized animals as have no visible brain, nerves, lungs, heart, or blood-vessels, and even vegetables, contract and re-act on impressions being made on any part of them; and being cut in pieces, each becomes a living individual. They separate the elements of dead matter which re-unite within them in various and specific proportions, and extend their fibres; they propagate their kinds whose particles and fibres are arranged into specific forms, as all consolidated fluids are; they have a preserving and resisting power called vis conservatrix, and medicatrix naturæ; become deranged in their functions and structure by excess, defect, or peculiarity of impression; recover from various morbid states; regenerate lost substance; cease at length to answer impressions, and spontaneously separate into their elements, which form new combinations in nature.

In an animal, which, besides a stomach, the seat of the first assimilation and simple life, has nerves and brain, the medium of sensation and thought, the energy of which is increased by a heart and lungs; the assimilating, moving, sentient, and thinking powers become parts of one whole, necessary to the action and effect of one another, acting as it were in a circle, modifying and improving the system, in which the smallest puncture producing contractility, pain, and hæmorrhage, seems

to shew that life, mind, and heart exist in every point.

Cold-blooded animals, whose circulation is languid, and respiration occasional, live and move for several hours without brain, heart, or lungs: the heart of a young hot-blooded animal, continues its motions for some time after its connection with the brain is cut off; in consumption there is sometimes scarcely a vestige of lungs left; some persons have the power of suspending the action of the heart, and it is sometimes suspended without the will, while the other functions continue entire.

After decollation, it is said, a viper traversed several walks in a garden; an ostrich continued running in a circular course leading to an accustomed place of refuge; and a cock impulsively continued its motion towards some grain that had been just presented to it; a turtle, whose strength, considering its

without it, and life has remained even in the perfect animals. independently of almost every other organ. Placed at the middle, the stomach is felt to be the centre of every impression on any part of the body or mind, and the seat of muscular exertion and fatigue. It is the receptacle of food, poison, and medicine, the effects of which are propagated to every part. It is most subject to disorders, most accessible to remedies, regulating and regulated by the motions and sensations of the whole system, and accomodating itself so as to keep all the parts in balance. In most cases, it is the first organ that feels, and the last that fails. It seems to be the centre of power and motion, from which the vital principle, whatever that is, is determined into the different parts, and expended upon them. In sleep, the sensibility of this organ is lessened, and the temperature of the body also, two degrees. This is found by long-fasting in sleep; the slow operation of medicine, and the suspension of stools. The fits of nervous diseases, generally attsck in sleep, shewing a change in the state of the stomach. Temperature of the surface particularly affects the stomach, and young animals and maniacs being as it were all stomach, bear remarkably the effects of changes of temperature

The stomach thus characterised, is situated at the end of the gullet, and receives by the action, or peristaltic motion of the latter, whatever is taken into the mouth, after it has undergone, if solid, the action of the jaws or the process of mastica-

massy shell, must be very great, lives for months without the head; fœtuses have been born alive without brain, cerebellum or spinal marrow. In dropsy of the head, nothing has been found but the membranes; some have lost a considerable part of the brain and recovered; all the involuntary motions, and even the use of the limbs, have continued a day or two after the spinal marrow has been divided; the involuntary ones continue when the senses and brain are locked up in sleep, lethargy, and apoplexy, and in the suspended action of the heart and lungs in syncope. In mania the vigour is often increased and the sensibility diminished, while the contrary is generally observed in indigestion, gout and nervous diseases, in which the intellect is often unimpaired. The contractility lasts much longer If an animal be killed by destroying its brain than otherwise; death, occasioned by over-exertion of the muscles, by the electric, carbonic, or azotic fluids, or by the poison of a viper, prevents the muscles from becoming rigid, and disposes to a much quicker putrefaction; and the life in vegetables, particularly in their seeds, in a chick before incubation, and in the hibernating animals, as in the swallow, mountain-rat, and dormouse, resists the tendency to putrefaction, and freezing.

tion, and has been mixed with the salivary and other secretions that are elicited from the surface in its descent, all necessary principles by their admixture: then entering the stomach, in this admixed state, it becomes further blended with the gastric liquor, or animalising fluid, the grand solvent to the whole; and the changes it here undergoes, are the effect equally of heat, of mechanical action and chemical agency—all exerted for its preparation into that nourishment which contains the principles that united, tend to form the red fluid we term blood, the basis of every part, whatever form it assume, in the fabric of the body.

The stomach, then, from its great and essential functions of preparation, possesses both extensive powers, and also universal sympathy with the whole system: hence every deviation from its healthy condition is not only shown by particular symptoms in the organ itself, but also by extending its morbid influence to various other parts of the body, where no local derangements to account for such symptoms appear to exist.

The state of the tongue or mouth is always attended to, as marking the state of the stomach, according to which, the sensations of taste are various, and the saliva and mucus vary in quantity, consistence, taste, smell, and color; even the state of mind or character seems connected with it; vigorous and ferocious animals being generally carnivorous, with muscular vigor in proportion to their voracity. But the healthy state of the organ is marked, at all times, by a regular return of appetite after every meal, and by its easy digestion or solution, without any symptoms showing the process retarded, partially suspended, or the principles of nourishment received improperly evolved: wherever the latter takes place, the blood is but imperfectly supplied with the essential properties it ought to convey to the different organs; and thus the latter cannot exercise their peculiar duties or offices in the economy, in such an accurate manner, as to keep up the standard of health.

During ordinary hunger, the power of the stomach over the muscles is diminished, which state is called weakness, and there is also a diminished action of the heart and arteries, particularly at their extremities; and this esurient state, like that of other appetites goes off, is apt to change into the loathing or sick state, then returns, becoming irresistible, and enabling

<sup>\*</sup> A blow, or the wind of a cannon ball over the stomach, kills, without leaving any mark, and if any of its nerves even be cut, or itself wounded, the aliment remains undigested: the operation of an emetic proves also this extensive sympathy, by exciting a general agitation of the whole system, and from this violence the relief of many diseases.

the stomach to dissolve leather, and other indigestible matters, and producing excessive thirst, delirium, and other symptoms.

On the sight of food, the mouth fills with water, and on taking some, the esurient or hungry state, with its symptoms, in removed. The organ then feels comfortable, the muscles and organs in general, particularly those most fatigued, recover their strength, the circulation is promoted, the secretions flow, the respiration becomes free, the countenance brightens up, serenity and vigor are imparted to body and mind, and the heart opens in benevolence.

### Symptoms of Faulty Digestion.

The process of digestion then, or the preparation of what we eat and drink, is the great function of the stomach, but this process becomes often impaired or in fault, and the symptoms of imperfect or faulty digestion, first appear in that organ or part of the body which is naturally weakest; hence, often the distance of it from the original seat of the disease; and hence, also, the complication of symptoms which mark this primary foundation and source of ailment.

One of the first marks of vitiated digestion, is lowness of spirits, or a peculiar langour and lassitude that sickens at exertion, and shews any thing but what are in common language termed good spirits; this is followed by want of rest, or disordered sleep, and the person awakes in the morning with a sense of weariness and fatigue, instead of being refreshed; deficiency, or loss of appetite, then ensues, and Nature no longer employs her protecting monitor, in the sensation of hunger, when the organ is thus out of order, or in a torpid state.

To these primary, or leading symptoms, are added a dry, hot skin, occasioning, by the retention of saline matter in the blood, an offensive breath; the tongue also is foul, and in the morning appears covered with a crust, conveying to the person's own sense, a bad and disagreeable taste: with these symptoms are joined, also, a heavy, dull countenance, a sallow look, and sympathetic pain of the head.

### Symptoms of a Faulty State of the Bowels.

When the bowels partake of this faulty state, they are marked by an irregular action of the canal; if examined, also, the excrementitious matter voided will be found changed in quality, which in a healthy state, should be neither too solid nor too liquid in consistence, and in colour be like that of rhubarb made into a paste; but in derangement of the digestive process, this matter varies in colour from perfectly white to black—the former proclaiming a deficiency of bile, and the latter a fault in the liver and large intestines. In this state, there prevails flatulence, irructation, and extrication of gaseous matter, which is never known in health; and hence arise various uneasy symptoms in the stomach and alimentary tube. Indeed, in the continued identical structure from the gullet to the rectum, the state of one part is apt to affect that of another, so indigestion occasions flatulence, spasms, and pains in the intestines, and vice versa, the state of the insestines affects the stomach.\*

### Causes of Indigestion.

The causes of imperfect digestion are, all the refinements of civilisation, and whatever draws us from a life of nature, or a condition of simplicity in diet and all its attendant auxiliaries. Of these may be enumerated:

First, All stimulants, as spirits, wines, and the too free use

of purgative medicines.

Secondly, All liquids in excess, especially when taken warm, for they weaken the tone of the organ, and dilute the gastric

<sup>\*</sup> What weakness, spasms, pains and aches, stiches, depravations and deprivations of sense and motion, and uneasy feelings of body and mind, does not a little air pent up occasion, and its expulsion instantly relieve? What symptom has not been occasionally referred to indigestion, and what remedy does not fall under the treatment of it and its effects? What disease is free from some affection of the stomach or canal, and what fever does it not mark in its beginning, its progress, remission, crisis, and cure? The diseases of children are acknowledged to be mostly from the stomach and bowels, and they are known to be cured of alarming symptoms by a puke, a glyster, or a purge. A person feels weak, loses colour and spirits, has head-ache, giddiness, and shivering, and the predisposed suffer fits of their diseases, without suspecting, as there is no sickness, want of appetite, costiveness, or affection of the stomach, that they proceed from it, till a natural vomiting or looseness, an emetic or cathartic relieve the complaints. Fits, as of asthma, chin-cough, hysteria, and gout, are generally preceded by some affection of the canal, and diminish or go off by the expulsion of air or other matter.

juice, lessening its solvent powers: this is the case with tea, punch, and other dilutions; but,

Thirdly, If this is the case with excess of liquids, that of solids is no less pernicious, for gluttony over-distending the sto-

mach, prevents a full secretion of bile.

Thus the pleasures of the table, whenever enjoyed beyond moderation, are purchased at the expense of health. Even the quality of what we take requires equal attention to avoid injury or doing wrong, as well as the quantity, and the more food is deprived of the nourishing principle, the more unfit is it for the purposes of aliment. Hence various experiments have been made on the digestibility of the different substances we eat: but whatever the state of digestibility of such substances, it should be laid down as a maxim, that no food should be submitted to the powers of the stomach without due mastication: for the want of proper and minute divisibility will render all food, whatever its nature, less digestible than it otherwise would be.

This process of mastication properly conducted should reduce the aliment into a soft mass, and mix it intimately with an albuminous fluid, derived from the passages already stated it pervades; but when all this is done, in order to show the mutual sympathy that influences the system, digestion is often interrupted by disorders of different parts, or affections of the mind.

This process of digestion, at the time it takes place, seems to be the centre of fluction: nature here concentrates her powers for this great and primary object,—the formation of non-rishment, and suspends, as it were, for a time, her attention to other parts, till this is prepared: thus as a proof of her attention, and of the general influence which seems to take place

in the completion of this process.

The fever of digestion is consciously felt in a slight sense of cold shivering, with a quicker and more contracted pulse, and as the process advances, the skin or spasm of the surface relaxes, and the insensible prespiration augments, like the febrile paroxysm that marks the efforts of nature aroused by the influence of disease. Of this daily progress of symptoms, after meals, persons of weak and irritable habits are particularly sensible.\*

But the effects of food, as of every thing else, being relative to the state of the stomach, what is light to one is heavy to another; and a cordial in some states occasions vomiting. A heavy meal oppresses the stomach, and depresses its power over the other parts of the system, often inducing alarming symptoms, which are frequently relieved by a puke, or by spirits or aromatics increasing the power of the stomach.

### Order of the Digestive Process.

Digestion, then, both in animals and vegetables, is an essential, primary, or preparatory process to the system of each, and as the food passes down into the stomach, the saliva supplies it with the principle of oxygen, while the gullet pushes it on by its peristaltic motion, like the intestines, into the organ; here it becomes blended with the gastric jnice-a most powerful solvent, and also with other agents, and here the chyme or crude mass of nourishment is formed, the food being for this purpose subjected equally to a vital, mechanical, and chemical action. The first is evident from the process being influenced by passions of the mind, the second from the mastication and shifting of it, so as to change the site of its surfaces, and the third from the several fluids with which it is mixed, while, in order to give greater force and active powers to the organ, it is supplied with a larger proportion of blood vessels than any other in the body. It is, however, in the intestinal canal and duodenum that the real chyle or nourishment is perfected; and this part of the animal structure is more or less complicated in its form, according to the nature of the food from which the chyle is prepared: the more indigestible the food of the animal is, the more complex is its form, as in all the carnivorous tribe; while in the herbivorous it is found clearly more simple; but in man it observes a certain medium between the two, as living equally on animal and vegetable food. As the chyle is perfected in the canal, so the separation also takes place here between it and the excrement or feculent matter, the one being absorbed and the other passing on in order to its discharge: this separation is effected by the joint mixture of the bile and pancreatic juice, part of these liquors attaching itself to the chyle and the other mixing with the excrement, and stimulating its expulsion. The chyle thus separated is then absorbed from the internal surface of the intestines, and passes on by vessels to its proper reservoir, where the complete animalisation, by its mixing with the blood, takes place.

Whatever the nature or form of the food, the product or chyle is always the same, being a white homogeneous fluid, which is equally the produce of animal food and strong liquors in a northern climate, where the constitution is obliged so vigorously to support itself against the action of cold, or of vegetables and watery liquids in the enervating tropical regions.

### Leading Sympathies of the Stomach.

From this view, digestion appears a paramount function in the economy, and on this account the organ performing it has a peculiar connexion and sympathy with the other leading ones that possess prominent duties in conducting the preservation and continuance of animal life.

The first of these sympathetic organs is the lungs, whose office is to regenerate the blood, the great source of vitality; and the other is the liver, which regenerates the blood, through the mother in the fetal state, and afterwards continues its aid in this process in a manner we cannot explain; but for this purpose it seems peculiarly organised with two distinct sets of vessels, in the same manner as the lungs. Indeed, such is the effect of sympathy, that some kinds of matter affect different parts of the same organ, and the sensation is propagated to a greater or less distance without any probability of absorption. So an irritation in the lungs is often felt at the epiglottis; in the liver, at the shoulder; in the kidney, at the testicle and thigh; in the bladder, at the end of the glans penis; in the colon, at the navel; in every part of the system at the stomach; and in the stomach, at every part of the system.

How often, after death, are morbid states of brain, lungs, and heart, in vain looked for, while the cause of all the symptoms is either invisible or found in the stomach, which had not

seemed previously to suffer.

### Animal Processes.

Thus, however minute and complex the parts of the animal structure, the whole presents a beautiful picture of nice but simple arrangement: all the processes of which are intended for two great objects—the renovation and depuration of the body, in order to its preservation and well being. The processes of renovation in the animal economy may be reduced to three:—

First, The process of digestion, or preparation of nourishment.

Second, The process of animalisation, or conversion of it into blood; and

Third, The process of regeneration, or restoration of this blood to its pristine condition, when deprived of any of its principles in its passage through the circulation.

Thus in the same manner, to complete the work, three other processes are employed to depurate the system when renovated

by the former.

First, Is by the intestines, to carry off from the body what

is noxious and effete in the preparatory process.

Second, Is by the kidnies, to deprive the system of saline impurities circulating in the blood, and derived from the same

source; and the

Third, Is by the skin, acting for the same purpose, the one by mutual sympathy with the other: thus, in cold weather, the kidnies are the active depurating organ, while, in warm, the skin takes the lead.

## Deductions on the Importance of the Primary Organs, particularly the Stomach.

After this detail, the primary organs are to be looked to in the proper exercise of their functions, as the foundation and leading apparatus of the whole, for continuing the welfare of the machine, and especially the stomach.

1. As we have seen, in no case can life exist without this

organ.

2. All matters for the support of life must pass through it.

3. It possesses a universal sympathy with every part, for the aid and help of the whole.\*

We have only to state the case of the celebrated Venetian nobleman Carnaro, to show what the proper regulation of

these functions will do, in the attainment of longevity.

Carnaro, till he arrived at the age of forty-five, had led a most dissipated life; finding the powers of his constitution to be rapidly declining, he consulted two of the most eminent physicians in Italy, who attributed his complaints of indigestion, general lassitude, and occasional gout, to his mode of living,

<sup>\*</sup> Thus it may be said, that while every part continues under the dominion of the stomach, no mechanical or chemical change of a morbid nature can take place in the solids or fluids of the system; and from the natural accommodation between the stomach and other parts constantly tending to a level, and forming an equally, though sometimes slenderly, balanced constitution, morbid impressions are often resisted, local complaints arising in the course of disease become tolerable, and changes and extremes of the ordinary impressions, which are all felt at the stomach, can be borne in a remarkable degree; but when the balance between the stomach and other parts, by means of internal or external impressions, or evacuations, is diminished or lost, as in an ill or broken constitution, a slight change in ordinary, morbid, or salutary impressions, is felt.

and told him he must make his choice, either of temperance or death. Regarding long life as the greatest blessing mortals can enjoy, and greatly dreading death, he adopted the former; he commenced a vigorous war against his passions, and, after some efforts, gained a complete victory. Virtue then triumphed, and crowned him with the blessing of Heaven and the esteem of his friends. He selected his articles of diet, and made a wholesome repast of one dish, and abstained from all savory sauces and spirituous liquors; he took only a sufficient quantity to satisfy nature, and so great an advocate did he become for temperance, that he was satisfied that what he left at a meal did him more good than what he consumed. care not to expose himself to sudden vicissitudes in the atmosphere; he abstained from violent exercise and late hours, and selected places for his residence the air of which was salubrious. Thus his constitution and intellects were, by the adoption of this well regulated plan, fully preserved.

Though Carnaro is a strong instance of the happy effects of a well regulated plan, there are others who, without any of those rigid regulations, deserve more implicit imitation. The Cardinal de Senlis, under a less restricted plan, lived a hundred years—an equal age to Carnaro; and his maxim had been, in the previous years of his life, to live with the caution of an old man when young, so that when old in years, he was still, in

constitution, a youth.

The celebrated John Westley is another instance, who, with a natural weak and infirm habit, was able to undergo much bodily and mental exertion, for a long life, and to possess the mens sana in corpore sano, solely by adhering to certain rules he had laid down.

In more modern times, Sir John Sinclair recovered his health by a similar plan, though without any of those rigid regulations which mark the plan of Carnaro. Sir John observes,-" though naturally possessed of a sound constitution, untainted by any hereditary disease, yet, about the year 1797, he fell into a weak and enervated state; found himself unequal to manage his private concerns, of prosecuting useful enquiries, or of applying his mind to political pursuits, with his former zeal and energy; he saw, also, many of his contemporaries die at an early period, before their constitutions had, apparently, suffered much decay. By reflecting on these circumstances, and a number of others, with which the subject is connected, he came to the conclusion, that more die from their own faults than from actual disease; and that life might, accordingly, be prolonged, and health enjoyed with satisfaction, by a proper and regulated conduct with each individual, in regard to the various circumstances connected with the continuance or support of life: accordingly, by laying down a proper plan of proceeding for himself, he pot only recovered his own health, but was enabled, by his advice to others, to render them an equal benefit. These circumstances led him to publish his celebrated work, entitled, "A Code of Longevity," where he brings forward, as a leading professional example of his precepts, the celebrated physician Galen, who, by a certain plan strictly adhered to, reached the age of one hundred and forty years.

These cases then offer abundant proof how a proper and restricted mode of proceeding, in diet and regimen, even in a weak constitution, will ensure a healthy longevity, for Carnaro died at the age of ninety-seven. It is at the same time not to be disputed, that nature alone has often done that for the individual which the above system is so well calculated to effect, without any of the restrictions now insisted on; but even in these cases of what may be termed natural longevity, it has never happened but where the primary parts of the machine, the stomach and bowels, have originally been, in their fabric, the strongest parts of the body. These remarkable instances have chiefly occurred in cold climates, and amongst the lower orders of society; and the most remarkable examples of it that occur in medical history are as follows.

### Remarkable Instances of Longevity.

Isabel Walker, a Scotch woman, died at 112, without much severity of regimen; but she was distinguished by a placidity of temper, and possessed that happy medium state of habit, neither lean nor corpulent, favourable to long life.

Peter Garden, a Scotchman, died aged 131; his stature was tall, and his employment agriculture, which he continued to his death, with a remarkable appearance of freshness and youth.

John Taylor, a Scotch miner, lived to 132; he always used tobacco, and his teeth continued sound to the last.

Gylloul Macrain, a native of the island of Toura, in the Hebrides, died, after keeping 100 Christmas masses.

Lawrence, a native of the Shetland Islands, married at the age of 100, and died at 140.

Kentigern, or St. Mungo, Bishop of Glasgow, lived to the age of 185, as certified on his monument.

Catherine, Countess of Desmond, who died in the reign of James the First, was 140; and thrice, in the course of her life, she renewed her teeth.

Thomas Parr, a native of Shropshire, was buried in the Abbey of Westminster, at the age of 152.

Henry Jenkins, of Northallerton, Yorkshire, lived to the age of 169, being first a labourer, and afterwards a fisherman.

Sarah Rouen, 164, and John Rouen, her husband, 172, were married 147 years, both natives of the Directory of Carsoueber.

Petratsch Zorten, a native of Hungary, and a cow-herd, lived to 185.

The greater proportion of these persons were natives of Scotland; though it is remarked that the most numerous instances of longevity are to be met with in Norway and Russia; out of 6229 persons in Norway, 63 had lived to a hundred; and out of 726,278 in Russia, 216 attained one hundred years, 220 above it, and four one hundred and thirty. In the list of longevity, enumerated above, all these persons were of a low situation of life, except the Countess of Desmond; and the diet of all of them seems to have been moderate, and in some instances abstemious. Parr's maxims of health were, to keep your head cool by temperance, your feet warm by exercise; to rise early, and go soon to bed; and if you are inclined to get fat, to keep your eyes open and your mouth shut, or, be moderate in your sleep and diet.

The diet of Jenkins is said to have been coarse and sour; and in the north of England, distinguished for long-lived people, it is much the same, consisting of salted meat and sour

leavened hot bread.

Zorten's diet consisted entirely of milk and cakes, with a glass of brandy; and, being of the Greek church, he was, to the last, a strict observer of all their fasts.

### Comparative Statement of Longevity.

To these facts, we may add, in comparing the different classes of society with respect to longevity, that the profession of a gardener is the most healthy; next to it husbandmen are also healthy, but from their great exertions and exposure to every weather, they are soon worn out, and generally old men before fifty. Manufacturers are neither healthy nor long lived; miners, who are much below ground, are generally healthy, and often long lived. Soldiers, unless cut off by the casualties of war, are long lived, as well as sailors, who are generally healthy; and this is proved by the records both of Chelsea and Greenwich Hospitals. Persons engaged in commerce, if not too speculative, and their minds racked with anxiety, are generally long lived. The voluptuous, both in town and country, are commonly cut off in their prime. Dancing-masters are long lived, from their constant exercises; singers, on the contrary, are short lived. The learned professions, at the farthest, seldom exceed the age of eighty. In addition to these remarks it may be observed, that married men, compared with bachelors, are long lived; for the life of a bachelor is generally short and uncomfortable. In respect to the sexes, women are generally longer lived than men; and mothers longer than single women.

On this solid foundation, then,—the healthy action of the stomach and bowels, is the present code of longevity built, which no speculative reasoning can overturn, and which every practical fact tends to confirm and enforce. The means of carrying it into effect are simple and clear, neither wrapt in mystery nor needing disguise to recommend them; and along with the regulation of these primary functions, they require only the auxiliaries of diet and exercise, under such controul, as to render the plan successful.

# Method of counteracting Indigestion, or of preserving a healthy state.

All the preceding symptoms of indigestion proclaim weakness in the primary part or the stomach, and the consequence of this weakness here is, that the sympathetic organs, or the liver and intestines, unavoidably partake of the same state. Wherever weakness occurs, in any organ or part, its functions become retarded: hence accumulation follows, and congestions are formed, that clog the wheels of the machine. The first and leading point then is, to remove this disposition to disease; and for this purpose the bowels must first be unloaded of their contents, and the energy of the liver, next excited, to perform actively its peculiar secretion: when this is once effected, being the fundamental indication, then the second, or relief of the organ itself, comes to be the remaining object in view, which consists in restoring to the stomach its energy, or healthy tone; and these two indications must go hand in hand, in order to give and continue effectual relief.

## Use of the Chylo-poetic Aperient.

In performing the first indication, much attention is to be paid both to the means and to the frequency: to the means has been given the appellation of the Chylo-poetic Aperient, the operation of which is intended to be gentle; not too stimulant or drastic. To its frequency, its use should not be repeated oftener than once or twice a week; acting then, as the gentle assistant, not the violent outrager of nature in her efforts.

Perhaps, from no cause, do diseases of the gut or rectum so frequently arise, as from the rash and imprudent use of purgatives. With many, this has become such an established habit, that a motion is never procured without the intervention of art. Thus an exciting cause of disease is constantly applied. Nay, since popular medicine gave such a rage for drastics under the name of Antibilious Pills now so numerous and so unscientifically compounded, from that time diseases of the rectum seem chiefly to have taken their origin, for they are at least four-fold within these thirty years. Nature intended that this part should be kept in a certain degree distended by its contents, and where these are thrown off too frequently, and that by a strong action producing irritation, this natural distension not only is not allowed to take place, but from the irritation an unnatural contraction of the fibres of the gut is induced; which, by the frequent repetition of such irritation, gradually thicken and harden, so as to occasion disease by this thickening and contracting of the cavity in whole or in part. Once in 24 hours is sufficient for the purposes of health, and thus contraction will be prevented on the one hand, and irritation on the other. The rectum is to be considered as the natural Water Closet of the system, which does not require to be too often or unnecessarily emptied, and if proper regard is paid to this idea, we shall not hear so often of strictures of the rectum, or the use of Bougies for their removal. The best Bougie is the contents of the part.

### Use of the Alterative Digester.

The second indication is performed by what is termed the Alterative Digester, or such means as invigorate; for the weakness of the stomach is oftener caused by loss of tone in its muscular fibres, than from any other source. Its secretion is not so readily affected as its moving powers; and as digestion is connected with more circumstances than the mere application of the gastric juice; so in the means employed to act on the organ, these circumstances are all to be taken into account, both in the prescription and its use; for the same caution as regards acting on its contents, is not so necessary here as in the intestines.

Such are the principles of the Abernethian system, thus shortly explained: and whatever form of medicine is adopted to execute these views, it can only act properly, by answering the two objects pointed out. To this system Mr. Abernethy was

led by his observations on the hospital practice. He saw there that local disease, or affection of a part, induced a general derangement of the body and interruption of health; and in the same manner he saw that a general derangement as completely in fluenced this state of local disease. Reflecting on these facts, he was led to believe, that if the primary organs of digestion and expulsion are kept in a healthy condition, the health of the whole machine must be regulated by them, and follow their healthy condition, as links of the same chain. The plan of medicine to do this is clearly simple, and can never fail of success, when assisted at the same time by a proper attention to diet and exercise.

In confirmation of the first, or the powerful effect of diet, the celebrated instance of Carnaro has been already stated; and in addition to that case we shall here insert Mr. Abernethy's rules on the subject, which he strongly and constantly recommends to the perusal of every patient that consults him, as taken from the celebrated seventy-third page of his work.

### The Abernethian Creed.

"The method of treatment," he observes, "which I have adopted is simple, and founded on the opinions I have formed of the nature of the disease, and on physiological views of the functions of the affected organs. Believing the disordered parts to be in a state of weakness and of irritability, my object has been, to diminish the former and allay the latter. Believing also that the secretions into the stomach and bowels, upon the healthy state of which the due performance of their functions depends, were, in consequence of such disorder, either deficient in quantity or depraved in quality, I have endeavoured to excite, by means of medicine, a more copious and healthy secretion.

"In conformity to these views of the subject, the patients have been recommended to be particularly attentive to their diet. The food should be nutritious, and easy of digestion: strong, plain broths, animal food of loose texture, milk, eggs, and farinaceous vegetables, are the articles which appear most advisable. But, as custom and inclination have so great an effect in regulating the action of the stomach, I have contented myself with recommending patients not to eat any thing which it was probable that they could not digest. It seems reasonable to suppose, that if the food be properly digested, it will not irritate the intestinal canal; but that if digestion fails, the animal and vegetable matters will undergo chemical changes in their passage through the long tract of inlestines, and thereby

maintain a state of irritation in those organs. I have urged patients not to oppress the powers of the stomach by too great a quantity of food, nor to take a second meal, until time has been allowed for the digestion of the first, and for the recovery of the powers of the stomach. Whilst I have thus advised patients to eat moderately and not too frequently, I have also cautioned them not to let the stomach become irritable by too long abstinence.

"The quantity of food should of course be proportionate to the powers of the stomach. If it receives more than it can digest, no nourishment is obtained from the superfluocs quantity, and the undigested aliment not only acts injuriously in the bowels, but in the blood, and in the urine, as has been mentioned. There is also another view of the subject. Moderation in diet not only insures the complete digestion of the aliment, but it prevents the blood vessels from being overloaded and kept in a state of action exhausting to their strength. When also important organs may be in a state of nervous irritation and disorder of function, if there be a plethoric state of the blood vessels at the same time, those vascular actions are likely to ensue, which may produce an alteration of their structure, and irremediable disease.

"The function of digestion will not, however, go on well, even where these circumstances have been attended to, if the stomach be deprived of a stimulus to which it has been long accustomed. Uneasy sensations will be experienced, denoting, if I may so express it, a discontented state of this organ, and a want of the expected stimulus. It is on this account injurious wholly to restrain those patients from the use of wine who have been in the habit of taking it. A moderate quantity of such a stimulus may be allowed after dinner, to prevent uneasy sensations, and to promote digestion; but strong fermented liquors must be injurious at any other period. It is wrong to stimu-

late the stomach when it has no task to perform.

"Even our food must be considered as exerting a medicinal influence in disorders of the stomach, when that organ is irritable. A vegetable diet and abstinence from fermented liquors may tend to tranquillise it. On the contrary, when it is weak as well as irritable, that aliment which is most readily digested is to be preferred, and cordials are sometimes beneficial. The effects of food and medicine can never be considered as resulting from their operation on the stomach solely, but from their conjoint influence upon the nervous system in general. Irritability of the stomach may arise from that of the brain, and unstimulating diet may tend to tranquillise the latter organ, and thereby alleviate the disorder of the former. On the contrary, a more generous diet may, by exciting the nervous system, produce that degree of energy in its actions, which invigorates

the stomach, and tranquillises its disorder. It may further be observed in some cases, that the kind of medicines or diet which is serviceable to the stomach, may aggravate the nervous disorder; and, on the contrary, that those means which seem to tranquillise nervous irritation tend to diminish the powers of the stomach.

"A regular diurnal evacuation of the bowels is particularly necessary, since the detention of the fæces must prove irritating to these organs. Purging medicines sometimes relieve unpleasant sensations; but they do not in general produce even this effect; and all active purges seem to increase the disorder. It is natural to suppose, that strong stimuli will aggravate the

unhealthy condition of weak and irritable parts.

" It is difficult, in many cases, to regulate the actions of the bowels either by diet or medicine. They are costive for a time. and then fits of purging come on. The former state must be obviated, in order to prevent the latter. Medicines which excite a healthy action of the bowels in one person, are either inert or too active in another. Doses, which would have no effect in a state of health, become purgative in this disorder; a circumstance which shews that the bowels are irritable. There are some rare instances of the contrary, in which it is exceedingly difficult to excite the actions and secretions of these viscera. The object which I had in view, in all cases, is to excite the peristaltic action of the bowels, without irritating them, so as to induce them to pour forth and evacuate their own fluids. The administration of purgative medicines in very small doses, at regular intervals, is in many cases the best mode of effecting this purpose.

"At the same time I have not been inattentive to the error in the biliary secretion, which exists in the greater number of these cases. The relief, which arises from the increase or correction of the biliary secretion, in the majority of these cases, shews how much the liver is concerned in causing or aggravat-

ing the symptoms in these diseases.

"I have generally explained to the patients the objects which I had in view, in correcting disorders of the digestive organs, by saying that there are three things which I consider as right and necessary to the cure of disorder. First, that the stomach should thoroughly digest all the food that is put into it. The patient perceiving the necessity of obtaining this end, becomes attentive to his diet, and observes the effect which the quantity and quality of his food and medicines have upon his feelings, and the apparent powers of his stomach. Secondly, that the residue of the food should be daily dischaged from the bowels: here too, the patient apprised of the design, notes what kind and dose of purgative medicine best effect the intention; and whether it answers better if taken at once or at in-

tervals. Thirdly, that the secretion of bile should be right,

both with respect to quantity and quality.

"Whenever circumstances would permit, I have recommended the patients to take as much exercise as they could, short of producing fatigue; to live much in the open air; and, if possible, not to suffer their minds te be agitated by anxiety, or fatigued by exertion. The advantages of exercise in nervous disorders, upon which those of the digestive organs so greatly depend, appear to me very striking. It were to be wished that we had some index to denote the strength and irritability of the nervous system, serving as the pulse does with regard to the sanguiferous organs. Perhaps the strength, agility, and indefatigability of the muscles may be regarded as the surest evidence of energy of nervous power and bodily vigour. If this were granted, however, it would follow, that many persons possessing great nervous power, have nevertheless great nervous irritability. Many people who are extremely irritable and hypochondriacal, and are constantly obliged to take medicines to regulate their bowels whilst they lead an inactive life, no longer suffer from nervous irritation, or require aperient medicines, when they use exercise to a degree that would be excessive in ordinary constitutions. The inference which I draw from cases of this description is, that nervous tranquillity is restored in consequence of the superfluous energy being exhausted by its proper channels—the muscles. When, on the contrary, the nervous system is weak and irritable, exercise seems equally beneficial; but caution is here requisite as to the degree in which it should be taken. A weak and irritable patient may not be able to walk more than half a mile without nearly fainting with fatigue on the first day of the experiment; but by persevering in the effort, he will be able to undergo considerable muscular exertion without weariness. Does not this imply a considerable increase of bodily strength, and is not the acquisition of strength the chief desideratum in the cure of many disorders? The nervous irritability also, when dependant on weakness alone, will proportionately diminish with its cause. In the latter case the nervous energy seems to be augmented in consequence of our increasing the demand for it. am induced to make these observations from a belief that exereise is not employed as a medical agent to the extent that its efficacy seems to deserve. Attention to diet, air, exercise, and mental tranquillity, are more decidedly beneficial than medicines. Surgeons in London meet with frequent and convincing instances of the efficacy of pure air. Patients under the irritation of a local disease, who scarcely eat or sleep in town, recover their appetite, digestion, and sleep, so suddenly on their removal into the country, as to leave no room for doubting, that the change of air has produced this beneficial alteration in their health."

Such, then, are the dictates of Mr. Abernethy, to which be refers his patients, and without entering into the curious colloquial drama that on such occasions ensues, we shall observe, that his pecularities, though not always pleasant, will, like an unpalatable drug, though received with disgust at first, from the truths they convey, gain their full influence on the mind of every invalid in the end.

Thus, in conclusion, the Abernethian Code of Health and Longevity may be in its principles comprised in a nut-shell; and consists, as has been stated, in three grand points—

1. The due Regulation of the Stomach and Bowels, by the

use of mild Aperient Medicine.

2. Moderation in Diet to co-operate with this, and rather in

quantity than in respect to quality.

3. Exercise proportioned to the Constitution and circumstances of the Individual, taken chiefly in the open air.

This is the true system for Health and Longevity; and death will never take place where a proper attention to this system is observed, but by a gradual decay, or by unforeseen casualties, which no precautions can guard against. Thus, on the plan laid down, "every one may be justly said to have his Health in his cwn keeping."

FINIS.