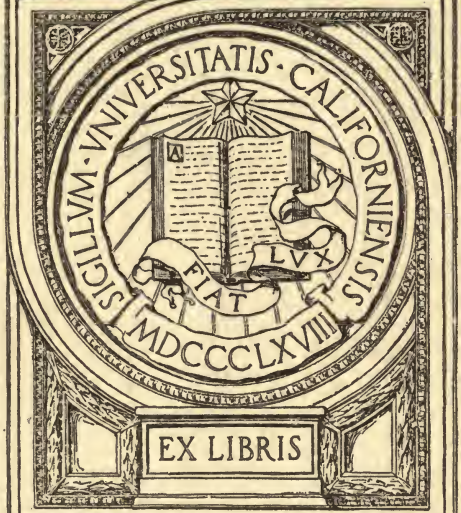

Presented by the author

Medical '84

Agriculture Ex '81

MESSAGES TO MOTHERS

A PROTEST AGAINST ARTIFICIAL METHODS

Presenting a Simple, Practical and Natural Scheme for the Right Diet, Care and Treatment of Mother and Child, and for the Conservation of Power in Physiological Functions, the Result of Twenty-three Years of Successful Practice

BY

HERMAN PARTSCH, M. D.

AUTHOR OF

THE ILLS OF INDIGESTION, THEIR CAUSES AND THEIR CURES

PAUL ELDER AND COMPANY

SAN FRANCISCO AND NEW YORK

Preface

THIS *work is the combined utilitarian results of a series of vital human-nature studies, as pursued by a regular physician in the course of twenty-three years of practice. The work is offered as a contribution to the common stock of hygienic learning.*

It is addressed primarily to mothers, because it concerns them chiefly, and because the writer therefore regards them as the most impartial judges of the findings presented, and because through women lies the line of least resistance to these particular steps in the progress of hygienic learning. If my work passes woman's trial and judgment, it will receive the serious attention of the medical profession all the sooner for having been first submitted to women.

I do not encourage the domestic practice of medicine, and, with one harmless exception, have not mentioned a drug or a medicine.

I recognize a subconscious intelligence, otherwise referred to as nature or instinct, the promptings of which are called intuitions.

Preface

These intuitions I have sought to understand and have learned to trust unreservedly, and in all matters of food selection and rejection I do so trust them and am by the results fully justified in so doing.

Accordingly, in the dietary details of the treatment of disease, I must differ radically from the prevailing practice of the medical profession generally.

The prevailing scheme of practice, for example, in the great group of digestive disorders, especially of young children, does not succeed, and I have no doubt about the propriety of assailing it, especially since I have an extremely simple, successful and perfectly natural scheme to offer in its stead.

H. P.

Berkeley, California.

Contents

Chapter I

Power in Physiological Functions

And in All Organization, Growth and Work

ALL PERSONS who are successfully engaged in affairs mechanical agree that perpetual motion is a fallacy, that nothing mechanical can be done without power to do it. But all sorts of authorities ignore the idea of power being involved in physiological functions. One whose word has weight has even declared to me that no power, or at any rate no appreciable amount of power, was involved in the organization, development and growth of a fetus.

It will only be necessary to present a series of familiar and interesting facts, and the conclusion becomes apparent and evident that power *is* involved in *all* forms of organization, development and growth. This conclusion is almost the entire foundation of my book, and I must necessarily devote considerable space to the very interesting grounds upon which it is based.

We cannot successfully employ at the same time, for distinctly different purposes, a combination of muscles and a combination of mental

faculties. The superintendent in a factory stopped a foreman who was about to lend a hand at some heavy lifting. Said the superintendent to the foreman: "I don't want you to work, I want you to think; and I don't want these men to think, I want them to work," alluding to the laborers.

Much reading and knowing are very likely to involve the habit of thinking automatically and not to the purpose of the work in hand and thus spoil a person for a good occupation without qualifying him for any other. The illiterate servant who knows his business is better and more efficient than the scholarly one who knows much else; this is apparent in the comparison of Chinese and Japanese, whether as servants or otherwise. The best farmers I ever knew were illiterate men, but by no means ignorant in regard to the essentials of their work and their business. The best business men are also comparatively illiterate, but they know and do business better than the men who know and think a good deal besides.

Recently I was much interested in what proved to be better and cheaper than an experiment for my purpose. I observed the doings of two men, a gardener and his employer, on the grounds of the latter for one week,—the gardener working at somewhat skilled labor all the more atten-

tively because the employer was constantly present, and the employer steadily talking all day and compelling the gardener to pay attention and talk also. The gardener was a good, natural, unsophisticated character, not disposed to strike nor even to display any sign of the agony within him. The employer did not know that a gardener has not *power* enough to operate his muscular instrumentalities and his mental instrumentalities at the same time for different and unrelated purposes. At the conclusion of the six days' service the gardener found himself thinner, weaker, irritable, dyspeptic, tired and almost prostrated. Now ordinarily a man is supposed to keep strong and well at gardening, and mere talking is not suspected of prostrating anybody, but it was the thinking in addition to the working that used up more *power* than his food supplied him and caused him to draw upon his power-storage battery of fat and burn that out to the extent of making his shrinkage as plainly apparent to others as his fatigue and distress were to himself.

The brain and muscles are instruments of labor. They are under ordinary circumstances not injured during periods of action more than what is easily restored during periods of rest. But an instrument can never do anything anywhere on its own account, it must always require

power to operate it; it is the *power* that does the work.

It requires much more power to operate the brain in the processes of voluntary and designed thinking than it does to operate any combination of muscles at the hardest manual labor during the same length of time. From any comparison of the maximum number of hours at mental labor and at manual labor, respectively, that men can endure per day and retain their normal weight with good digestion, sleep and good temper, it is deducible that an hour of purely original mental work costs even more power than two and one-half hours of hard manual labor.

Ignorance of this fact has cost a great many thinkers a great deal of illness and it has even cost the lives of many at the very commencement of their careers. The only two essentials involved in labor of any kind are the instrument and the power. Of course there is a directing intelligence which also involves an instrumentality and also requires power.

When a man works beyond the point of fatigue he becomes disabled, however slight his disability may be. This disability means that he has either exhausted his supply of power for the present, or that he has disabled his instrument. No doubt many cases of disabled brains occur and result

from overtime mental work. Cases of this kind occur every year in any community where strenuous intellectual pursuits prevail; a few at least being reported, more must occur than the public becomes aware of. Often the obituary of a young man emphasizes his unusual ability, and it seems as if the strenuous efforts of the prodigy, encouraged by parents and teachers to improve on the natural gifts possessed, involved the use of mental faculties to an extent that ruined them, with illness and death as the final result. In the persistent effort to make more of what is already a youthful musical prodigy, he is deprived of his natural and necessary childish play and associations, confined indoors, exhibited in the lime-light at untimely hours and worked excessively on matters that are hard and difficult enough for mature mental instrumentalities. His career is brilliant but short; excessive and prolonged strain serves as cause of a break in the instrumentality, and the career ends, often in death.

An editor told me of two brilliant young men, assistants to his position, who committed suicide. In addition to their prescribed work of six hours daily, six days a week, both these men did much extra work of the purely original mental kind with a view to improving their qualifications for advancement. I am told that editorial writers

are allotted six hours a day, six days a week, for work, and that they break down at about forty years of age, the weaker ones sooner, while the stronger ones last longer. The aspiring young man in such a position who, in spite of feeling to the contrary, insists on spending some remaining hours at hard mental work is, of course, in danger of being wrecked long before forty and, perhaps, fatally. There are lessons in these cases of illness, insanity, suicide and sometimes murder, but the utility of them is not much appropriated.

Cases in which the disability, or illness, is due to exhaustion of power, in which the brain as an instrumentality remains intact, are numerous and conspicuous; the subjects of such cases live with sound minds to a good old age generally and, though quite miserable and almost constantly sick, they generally recover their health spontaneously during old age. The reason for their recovery is that they have retired from work and now, power being no longer excessively drawn upon for overtime work, they have enough power for digestion and bodily maintenance in general. These almost life-long invalids of body, but sound of mind, with their recovery of good health on retirement, prove that the brain as an instrument of labor in their cases was not damaged by the habitual overtime work which kept

them sick for years. That they recovered on retirement proves that their dyspepsia was due to their appropriation of so much *power* for their work that not enough was left for digestion.

Dyspepsia was the salvation of such men as Schiller, Darwin, Carlyle, Herbert Spencer and many others. For, had not the sufferings of one day compelled them to rest the next and given nature a chance for at least a partial restoration, they would have ruined their instruments so early in life as not to have been heard of beyond the small circle in which the misfortune had occurred. Had they had the *power* to work sixteen hours a day, seven days a week, they would have tried to use their instruments of mental labor that long. It was *power* that failed them; they must have felt and, I suppose, to some vague extent must have understood this, but they did not understand that their digestion in particular and their physical maintenance in general failed because the *power* for these purposes was diverted to operate the brain.

As early as 1859, and more plainly in 1874,* the late Professor Joseph Le Conte showed and explained that all the forces of Nature are correlated and transmutable, that all the different forces of Nature are only different forms of the same energy. In accordance with these most

* "The Conservation of Energy."—STEWART.

useful facts, first taught by Le Conte, we may as well admit — we can almost see in ourselves that we *must* admit — that all the different energies in the animal body are correlated and transmutable. In our bodies, the heat, motion, electricity, and digestive, growing, healing and mental energies, and the chemical energies of our foods and our fat, are all only different forms of the same force.

As I am only considering energy or force as an agent which, through some instrumentality, accomplishes some work in the body, I use the same word that is employed in factories and shops. Force applied to work in a shop is called power. The fundamental proposition in this discussion is, that it requires power to operate every function of every organ and of every cell in the body. We shall see that mental work, muscular work, digestive work and the work of physical maintenance of the body in good order, are all performed by the same power in different forms.

Normally we all take in fuel enough to give us a large surplus of power beyond what is required for bodily functions and maintenance. This surplus is available for what we call work. The body that is maintained in good order has also a power-storage battery, which is simply stored fuel in the form of fat, which will supply

power to maintain the bodily functions and even to do work when, on account of sickness, we cannot take food and when, owing to such misfortunes as are happening somewhere any time, we cannot get it.

Our fat is our power-storage battery. When not otherwise useful it may at least be ornamental. To the migratory bird, the hybernating bear, the ship-wrecked mariner, the besieged soldier and sick patient, the storage battery, when there is one, supplies the power to bridge the interval between meals. This interval may be, for the migrating bird long enough for him to fly two thousand miles, for a hybernating animal a whole winter season, for a patient the duration of his illness, for a ship-wrecked mariner or a besieged soldier, this interval between meals may be endured until either has, for the sake of power, burned up his timbers to an extent, according to "Yeo's Physiology," as follows:

Fat	97 per cent
Muscle	30 " "
Liver	56 " "
Spleen	63 " "
Blood	17 " "

In such cases the nervous structures not only remain intact but in good order, and all the materials appropriated for the emergency are so completely restored, on the return to normal

conditions, that in the end one is none the worse for having been so situated.

Dr. Edward Hooker Dewey of Meadville, Pennsylvania, resorts to fasting as a means of curing his patients. He reports enough cases to demonstrate that fasting is a safe therapeutic means when administered knowingly. He reports Miss Kuenzel of Philadelphia as having fasted forty-five days at a loss of twenty pounds and with complete restoration from a serious illness in which her mind was involved and on which account she was taken to an asylum where she did not improve. This was in 1899. Miss Kuenzel was a refined woman, twenty-two years of age and weighed one hundred and forty pounds at the start and one hundred and twenty pounds at the conclusion of her forty-five days' easy fast without any trouble to herself or any one else. She took no drugs and there was nothing but nature to which credit was due for recovery. Credit was also due Dr. Dewey and the friends for trusting this "nature of the animal" to perform this restoration.

Nothing is done without power, and in this case the power which it cost to restore order in the body of this patient and to keep all her bodily functions, excepting those of the digestive apparatus, in action, was represented by the twenty pounds of fat which disappeared. The

average daily quantity of power required was represented by four-ninths, or less than half a pound of fat. The patient was up and around, went to entertainments and took long walks, a seven-mile tramp on the thirty-seventh day.

The amount of power that some men and women require to do mental work per day is represented by the amount of fat per day which they gain in weight when they stop work, otherwise making no change. This daily gain, for a week or two, is in many cases a pound. This matter is, of course, generally observed only in cases of persons who have been reduced in weight by overtime work. The power which a hog in the pen gets from its food is stored in the form of fat, because there is nothing for the hog to do by which it could pay out the power. In 1866 I saw the grass getting scarcer, thinner and shorter as we moved at the rate of a hundred miles a week westward from Omaha, while our oxen, drawing heavy loads, were also as gradually getting thinner. The grass was their only food and must have been far from being sufficient to supply the power that drew the loads. The fat of the oxen was used up to furnish the power.

Power is required for self-control, for self-government. "He that ruleth himself is mightier than he that taketh a city." Not *much* power is required for this purpose; self-control does

not make one tired, does not exhaust one's power, but it requires always the presence of a high measure of power; high pressure, the steam engineer would call it, or high voltage, the electrician would say. Successful self-governors are strong men and women. Children are, and some invalids ought to be, governed by parents or guardians. It does not seem to require much power to make up one's mind, or to come to a decision or conclusion; but this seems easy only to the strong, while the same action seems about impossible to those who are powerless. To be short of physical power means to be short of mental power. For much that children and other subordinates do, they are spared the trouble and do not require the power to make up their minds; their parents and superiors do that for them and only the action is left to be fulfilled. To this extent one may be controlled by the mind of another. That a thing is easy to do, if you only make up your mind, is true; but it is harder to make up one's mind to do a thing, if he is weak and powerless, than it is to do the thing.

An hysterical woman is simply one who is powerless, owing to digestive disorder or overtime work, and her self-control is not easy for the further reason that it is not habitual. She cries or laughs automatically when there is provo-

cation to that effect. It requires little or no power to laugh or cry, but it requires power not to laugh and especially not to cry, and it requires still more power to make up her mind not to cry or to stop crying. Of course, she stops crying in time, because crying occurs in self-limited periods.

It sometimes happens that nothing can be done for a patient because there is no guardianship. There are insubmissive and lone men and women, sixty years of age, more or less, with affairs to which they have given their attention and their power to the last unit of their storage batteries. Now they are weak and sick and have not power to make up their minds to resign affairs wholly or partly to others. Bodily functions fail for want of power; they call for help, but when help arrives they occupy the whole time with their own automatic talk; they never listen, never understand, never succeed in grasping the proffered helping idea. A child would not, either. They need a guardian. One such person was given the ominous suggestion to wind up his business. He did so, expecting Death as the next comer. But power being released from business, it became available for bodily functions; restoration took place and he made a complete spontaneous recovery.

Talking and compulsory listening cost much power; either one alone can exhaust the power

of a person to the point of prostration. That such prostration is called "nervous prostration" or "nervous exhaustion" shows the state of the prevailing misunderstanding of this matter. People seem to think the nerves are out of order. "It's your nerves," repeats the doctor to the patient, and no wonder he fails to do any good for her. Power has not been taken into reckoning. If the electrician did not take power into reckoning, he might also repeat, when your electrical apparatus failed to work, "It's the wires." The nerves are all right; I doubt that they are ever out of working order; I am sure the blame is misplaced. The nervous system seems to be self-repairing and self-maintaining, and is not even impaired by the extreme exhaustion of starvation. The subconscious mind cares for the nervous system and preserves it from all harm except that of poisons. Wires may get out of order, but the nerves, I believe, never; it is the *power* which *operates* the nerves that fails.

What mind *is,* we do not know; we know to some extent what it does. We know it operates through instrumentalities, and that the cells, or groups of cells, of the well-known gray nervous matter, mostly within the skull but much of it elsewhere in the body, are the instrumentalities. There are circumstances enough which tend to

prove that mind is helpless without power to operate its instrumentalities. Whatever the human brain may achieve, it is the fuel foods, chiefly the starches, sugars and fats, that supply the power to accomplish the achievement. The same power might otherwise operate a pick and shovel, or the same fuel might be burned in a furnace and yield power to run a machine, or a dynamo and produce electricity. Mind should be reckoned as including all that intelligence within us that governs all the activities of every organ, including the brain, and of every cell. We are conscious of some mind and unconscious of what I believe to be the greater part of it.

We have then conscious mind and we have subconscious mind, which we often refer to as nature, "nature of the animal," with the small initial letter to distinguish it from the Universal Intelligence, spoken of and written as Nature with the capital initial. Mind attends to voluntary actions of the body; the subconscious mind attends to the involuntary functions and to all organs and cells of the body, governing and maintaining each organ and its function and keeping them all in coördinate action. Even a faint idea of what is going on in the body, and the coördinate character of it all, must give us a very exalted notion of the subconscious part of our minds.

The subconscious mind does much more than conduct the mere animal functions; it contributes very largely to the mental work of solving problems, developing inventions, organizing and formulating arguments, essays, books, musical compositions and so on. The subconscious mind originates ideas and delivers them to mind like prepaid parcels, as O. W. Holmes said. The organization and growth of mental untertakings, like the production of a book, go on much unconsciously, and, though under direction of mind, they are the work of subconscious mind rather more than of the conscious.

It can be shown that the work of the subconscious mind is done at the expense of power. Many of the best writers have been ill with digestive disorders coincidently with the progress of organization and growth of a piece of work. While the time they spent voluntarily working at their tasks may not have been excessive, their attention was on their work at all other hours of the day and night. Ideas merged into consciousness at off times, even during sleep, causing them to awaken, showing that organization and growth of the work were going on at such times and at all times until the work was complete and ready for delivery through pen on paper. At all times, then, so long as one or more subjects were the objects of paramount attention, was the subcon-

scious mind busy and using power for the organization and growth of the new intellectual structures, and the more complicated the organization and greater the structure, the more power it required.

So much power, indeed, has many a work cost its author, that in sacrificing what was necessary for digestion, protracted illness has been the result because not enough power was reserved for the maintenance of that physical integrity called health. We may say truly and in all sincerity that Thomas Carlyle, for example, suffered from the sickness of pregnancy. He never wrote but one book without being miserably sick before it was organized and completely developed and ready for commitment to paper. This sickness, we will take more pains to show, was due to failure of the digestive functions, because power, that was present and available for digestion, was diverted to the work of organization of the book. The principles are just the same when, as in the case of pregnancy as ordinarily understood, it is the organization and growth of a fetus, with only this difference,—that in the case of a book the whole affair is largely subject to control by the conscious mind, whereas in fetal pregnancy the conscious mind has nothing to do with the case, as we shall see later.

It may be required to know what are the

means of avoiding this sickness of mental pregnancy? I should say, and base my saying on theory confirmed by experience: limit your voluntary work at your undertaking to a short sitting in the forenoon and afternoon, or to forenoon or afternoon only; sit only so long as you can do good work, and no longer; rest absolutely from such work at least one day in seven; do not work on the subjects nor on any other mental work during the evening. If you are irritable, sleepless and dyspeptic under this plan which allows the subconscious mind to continue work between sittings and at all other times of day and night and Sundays, then *divert* your attention sometime daily to some other occupation or pastime which does not require more than the simplest mental effort and only the least power. This will interrupt the work of the subconscious mind, stop its appropriation of power and allow you enough power for bodily functions and normal maintenance. Rest from voluntary mental work at least one hour after each meal so that your digestive apparatus may have the benefit of *all* your might for digestion. Do not watch the clock for the expiration of this hour of rest after each meal, rather watch your feelings for the moment when power becomes available for operating the brain.

Since it is true that each one can do his own

work best in his own way, let these instructions be disregarded and work as you please so far as your health will permit. If you *need* these instructions, but think their adoption involves a waste of much time and a long delay of the end of your work, remember that those who were sick a great deal, as Darwin, Carlyle and Herbert Spencer were, lost a great deal of time owing to illness, and, even when well enough to work, could only sit a short while. Spencer worked one to two hours daily; Darwin, three to three and a quarter hours daily; Carlyle tried to work all day and half the night, seven days a week, but, of course, was on many days too ill to work at all. These statements are not true for the entire working careers of Darwin and Spencer. Before settling down to these limits they worked overtime and became ill and their ills forced them to the limits mentioned. It must be remembered, for it is one of my premises, that a unit of mental energy is worth at least two and a half units of muscular energy; in other words, an hour of original mental work costs as much power as two and a half hours of hard manual labor.

The sickness of fetal pregnancy, though often very distressing and sometimes unnecessarily fatal, is a simple matter and can now be explained in a simple way, which in turn leads to

natural, simple and easy means of prevention and cure without drugs. Power, the part it performs in the case, is the principal thing to be considered and understood in the premises. Every constructive process of matter and mind requires power. In Nature there are two kinds of constructive processes: one is growth simply, the other is organization, and the two are always carried on in the same structure but not always at the same time. Power is indispensable to the organization and growth of every plant and every animal and every detail of the same. Power is required for the healing or restoration of any part destroyed or injured.

Organization requires more power than mere growth. The hardest and most fatiguing part of constructing a book, a plan, or any mental composition, is its organization. The bird does not grow in the egg, it is only organized there. The fat of the egg is the stored power which is employed in the organization. This fat is in the yolk and, in the case of the hen's egg, is equal to half the weight of the egg minus the shell and water. Leaving water out of the reckoning, the fuel material is by weight equal to the material used in the structure.

The caterpillar accumulates and stores material very similar to the yolk of the hen's egg, says Professor Woodworth, entomologist. This

material supplies the power which effects its change of organization, or reorganization, to that of the butterfly. This is a great change, and the relatively great loss of weight by the time the process is complete indicates what a large share of the caterpillar's own material has disappeared,—burned up to furnish power for the reorganization. "The weight of the emerging butterfly is in many cases not one-tenth that of the caterpillar," said Professor Joseph Le Conte. In the case of the hen's egg there must be a similar loss of weight. A promised determination of the amount of this loss has up to the last moment failed to reach me. I suggest, at any rate, that the weight of the newly hatched chick will be found to be a surprisingly small fraction of the weight of the fresh-laid egg, the loss representing the fuel that supplied the power that effected the organization of the bird. The same must be true for every egg in which organization takes place outside the parent body.

It happens regularly with many plants and animals that an extraordinary amount of power is needed at times and under circumstances when none at all is obtainable, or when its requirement can only be supplied in part. Under these circumstances the power is stored in the tissues in the form of fuel material ready for the emergency when that arrives. Thus plants store

fuel as well as building material for use during the organization and growth of flowers, fruits and seeds. While most plants can accumulate these materials fast enough to produce fruit or seed annually, others require more than one year. The century plant is said to require from ten to seventy years, according to soil and climate, to accumulate the large quantity of starch in its great thick leaves with which to produce its great flower stalk and its enormous crop of flowers, and then seeds, for which purpose it finally gives up *all* its power, even that vital power called life—

"For it blooms but once and, blooming, it dies."

Migratory birds during a season of feeding store fat to supply the power that is to carry them on their flight of possibly two thousand miles, during which they are to have neither food nor rest.

Chapter II

Sickness of Pregnancy

Its Cause Revealed and Its Prevention Explained

IN THE case of fetal organization, development and growth, the question of power is paramount. Her food is the woman's source of power and material for organization, growth and maintenance, and the food is also the source of power used for any work or play of body or mind. Generally a woman in a good state of health will be about as busy as she is able to be, whether with work or play of muscle or brain, or both. Even if time is given to company, it keeps her brain busy, and mental effort uses up power much faster and more of it than hard labor in the same length of time. She eats what and all she feels she needs, and pays out power in various ways all she feels she can, and that is all correct. In regard to the various objects of her attention—the house, the children, the husband, the relations, the dressmaker, the callers she *must* receive, the calls she *must* make, the church and its various auxiliaries, the reading she must do—they are of such character that she is not likely to leave them unattended to, nor to rele-

gate them to some one else, until something happens to change the current of domestic events. Her routine of duties is established and is not easily alterable. Her routine of dietary subsistence is also established and is not easily changed. She is a woman of "regular" habits, perhaps, and while she has all due respect for the law of change, she may not be aware to what little things that law applies. So far, however, she is perfectly well, which proves that her ways are correct so far, and so they are.

Let us suppose that the lady's efforts have been using up her power to the last unit, that now the stage of pregnancy begins and there arises at once the additional demand for power as well as material for the organization, development and growth of the fetus. The perpetuation of its kind is *above all things* the paramount concern of the animal. It is not strange then that we find the fetus to be the paramount concern of the subconscious mind, nature.

This nature (of the animal) is complex, just as the conscious mind is; it has faculties just as the conscious mind has. Thus there is evidence of the presence of what I have called the gastric intelligence, a detail of nature that we have opportunities of knowing better than any other subconscious faculty. We cannot know what this nature *is,* but we can to some very impor-

tant extent know what it *does*. I have already alluded to this intelligence as performing what is called unconscious cerebration; we must give the same nature credit for attending so perfectly well to all the functions of every organ and cell in the body—when not interfered with by conscious mind. Nature governs them all and maintains them all in coördinate action. We, the mind, need know nothing about what is in us, nor what is going on in us. Mind, with its always incomplete and doubtful knowledge of body and mind, cannot even take any initiative toward assisting nature without great liability to do harm. Mind has no business in nature's jurisdiction. This nature is a very highly developed intelligence and an infant inherits it in this already perfected state.

This nature is not amenable to improvement by education of mind. This nature under natural conditions does not mislead; it is practically inerrant, as Naturalist John Burroughs said. Mind, under the influence of learning, does mislead; especially misleading is *all* that learning pertaining to the needs of the body in health and disease when appropriated by those who are well. That learning is not yet elevated to the dignity of science and is not yet generally fit for appropriation in the sick-room. In cases of functional disease the greatest results of

benefit to the patient come from doing nothing. This is from observation and experience. This is what the "Christian Science" method of healing amounts to and is the method that amounts to a virtual resignation of oneself into the care of his own great subconscious intelligence, the capacity of which for healing and restoring order out of disorder has not yet begun to be understood. It does not need to be understood by animals in a state of nature, nor by children that are let alone in their selections with only foods in reach that are natural and simple—not unduly mixed nor artificially modified. But those who are immersed in the pursuit of understandings cannot afford to leave an understanding of their own natures, so far as that is possible, out of consideration. One may at least know his own nature well enough to trust it.

Nature often expresses itself; it makes selections and demands which the untutored mind, with nothing artificial in reach, would make no mistake in interpreting. Nature can be trusted to make no mistake in the selection of foods. A child, even a baby, will make no mistake in selection, but the tutored conscious intelligence, that assumes to do selection for it, *will* and *does* make serious mistakes and repeats them a thousand times over. Here was a case in which mind and nature in the same person were at variance one

evening on a question of selection; twenty-four hours later they disagreed again on the same point, but had in the meantime changed sides in relation thereto. There was here a longing for corned beef and cabbage so dominant as to compel a chronic dyspeptic to call for and eat it. On the other hand, his conscious mind strongly but vainly remonstrated, and he fully believed he was doing wrong and that he would surely suffer for eating the combination, and so he ate it with fear of the results. Then he was surprised and delighted to find that he did not suffer at all; not even the expectation of suffering had been competent to bring it on. Having found that he could digest corned beef and cabbage and regretting that he ate it with fear when he might just as well have enjoyed it, the man decided to go to the same place twenty-four hours later and have corned beef and cabbage again and enjoy it. First it was the subconscious mind that made the selection, the conscious mind dissenting; twenty-four hours later it was the conscious mind that made the choice, the subconscious was not yet heard from. The combination was again called for, consumed, enjoyed without fear, rather with the pleasing consciousness of the demonstrated fact that it agreed with his stomach. "It agreed" is not correct; corned beef and cabbage, cooked, must be dead and cannot be supposed to have

living intelligence to agree or disagree; but the stomach has the intelligence and can agree or disagree on the choice made by the conscious mind. The gastric intelligence did not agree on the choice of corned beef and cabbage a second time in twenty-four hours. The stomach struck, did nothing with the mess, so it was left to decay in the stomach and serve as the cause of such a bad night that the man when met five years later had not again eaten corned beef and cabbage. There are plenty of other and similar examples, and the reader is very likely to know of several of the kind.

Illiterate people, not having the advantages of learning, have also not its disadvantages; they are not misguided by it; being governed more by inerrant nature, they have better luck in matters of health of themselves and children. I speak of misappropriation of learning and of being misguided by learning; I mean that when one is well he should not allow himself to make any change in the care of himself, or in his diet, as a result of what he reads, or what "they say." He should not be influenced into making any change in his selection by any alleged ease or difficulty of digestion, nor by the relative nutritive values of food materials, nor by the alleged fitness of special foods for special purposes. Mothers who happen to have sick chil-

dren have been alluded to as ignorant in regard to matters of health, diet and disease. Ignorant is not the proper word; even if the mother is absolutely illiterate, she has her subconscious mind and a natural wisdom sufficient unto all that she is constituted and therefore designed to perform. She succeeds in raising children and must certainly be given credit for knowing how. It is only of the artificial and conventional symbols and formulas by which natural knowledge is expressed and communicated that she is ignorant.

The welfare of the fetus is of the same kind of paramount importance as the life of the race; accordingly we find the subconscious mind uncompromising in its attention to it. The mind now has no chance to contest any point in regard to the fetus. I write with reference always to that standard of woman who holds firmly to what her subconscious mind indicates as right. The fetus is the subconscious mind's prime object of solicitude now. From the moment that life is kindled in the ovule the subconscious mind will see to it that material and power are supplied for its organization and growth even if material and power fail for other purposes of body and mind. The demands of the subconscious mind for the fetus are to be constant day and night for nine months, and during the first

three months, more or less, the demand for power is extraordinary, because during the first three months organization takes place.

Sickness of pregnancy affects mostly the women who employ their minds, and its severity is proportional to the amount of power paid out in the form of mental effort. The educated, the thinking, the reading, the talking women, are the ones most likely to suffer. This includes also the woman whose work, like housework and care of children, is a matter of too much anxiety and thought to her. It includes also the little woman who manages a big house and is doing a big woman's work. She is a little instrument applying herself to a big undertaking. The speedy woman is pretty sure to come in for a share of this sickness *because* she is speedy and pays out power unduly fast and soon exhausts her supply. That is why she is thin; she keeps her storage battery of fat burned low, or so promptly pays out all power derived from her food that none of it can be stored as fat. Power varies as the square of the speed; if the speed be doubled, the cost of power will be fourfold; if the speed be increased threefold, the cost of power will then be ninefold in any given time.

Sickness of pregnancy, then, is *one* of the evils that have come with, or have been augmented by, learning, which has possessed women with

more to think of and more to care for, demanding of them to pay out so much power that in many cases their bodies are ill-maintained and their health is defective in comparison with those who use their brains less and reserve their power rather for their personal maintenance and duties of a more natural and domestic character.

The lady finding herself pregnant will generally make no reduction of her efforts, of her expenditure of power. She will carry on her usual duties, and her subconscious mind will give the fetus all the power it needs, and it needs a great deal day and night for the first three months. The quantity of food not having been increased, the supply of power remaining as before, there is not enough to keep up the usual work and supply the fetus also. The fetus is first served, whatever happens, and the mind, erroneously and contrary to feeling expressed by subconscious mind, continues to direct that all the work of muscle and brain continue as usual. But there is not power enough for all this, so the shortage must fall somewhere,—some function must fail. Two things happen now simultaneously: functions of brain and stomach fail and disorder and suffering begin. The mind of the patient does not understand this matter; her subconscious mind does understand it, as will appear from what she will now be com-

pelled to do by way of emergency treatment entirely regardless of any conscious wishes or wisdom.

The subconscious mind applies a partial remedy for the brain's deficiency of fuel by increasing at intervals the pressure of blood in the brain. Nausea is the sensation one feels when the brain is in a short time affected by poverty or deficiency of blood. If one lies down without a pillow, blood pressure in the brain is increased and the patient feels less nausea, or none at all, showing that the recumbent position without a pillow is a proper detail of treatment. If the patient does not lie down, or if lying down does not relieve the nausea, the subconscious mind will compel the patient to perform and repeat the act of retching in spite of the mind of the patient or of her physician. This is the subconscious mind's way of increasing blood pressure in the brain and making conditions as favorable as possible for the brain to get a better supply of fuel material. In retching, the contents of the chest and abdominal cavities are so squeezed as to force upward some of the blood contained in their vessels. This is not vomiting, and is just as likely to take place when the stomach is empty. When there is material in the stomach and it happens to be squeezed up this will not be essential but only incidental to the process, because

there is nothing to prevent it. The stomach has nothing to do with retching except to be passively implicated in a purely incidental way.

Sometimes the failure of the brain, owing to shortage of fuel, is rather sudden and we see to some extent just what it fails in. We see that it fails to maintain consciousness, as a result of which all that depends upon consciousness fails also. The subconscious mind warns the patient to lie down, but it is so much the fashion to try to weather through an unpleasantness and not give in and be the subject of a sensation. The premonitory feeling is disregarded, or the circumstances may not permit lying down; the patient falls unconscious. The recumbent position into which the subconscious mind puts the patient is the temporary emergency treatment, and soon consciousness is regained, because in this position gravity increases blood pressure in the brain as compared with the upright position in which gravity diminishes it. This scene is of common occurrence in church at early morning services to which it is customary to go before eating.

Poverty of blood in respect of nutritive material, especially fuel or power material, is in these cases the cause of nausea. The subconscious mind's plan of retching is temporary and merely for the emergency; something worse

might happen if the subconscious did not so increase blood pressure in the brain. The real remedy consists in supplying nutritive material, eating. Eating may seem out of the question; the thought of food may be repugnant; the sense of hunger is present but is obscured by the ugly sensations of the illness; the patient, however, will soon feel the better for eating and will thus be convinced that eating is the proper thing under the circumstances. What shall the patient eat? That cannot be prescribed, because no one can select for her, not even her own mind can select. Diet learning, such as it is, is ridiculously out of place in the sick-room; it not only fails in the sick-room and in the hospital, but it kills many a patient—this selection of one mind for the stomach of another—in proof of which there is much evidence that is only now beginning to receive attention, and more, I think, from the popular mind than from the medical profession. The subconscious mind of the patient must make the selection always. Let the patient disregard all learning on matters of diet, on the relative nutritive values and the relative ease or difficulty of digestion of things, and give attention to *feeling,* which is the language of her subconscious mind. The only care then remaining is to make no mistake in the interpretation of the feelings. The subconscious mind knows nothing

that is unnatural; it neither knows nor calls for artificial conglomerations. If, for example, one longs for something sweet, let her look at dates, raisins, figs or any other sweet fruit, fresh or in a good natural state of preservation, and take what she feels she wants. To conclude that the subconscious mind calls for candy is to misinterpret the call, yet the simpler candies are likely to serve one's purpose very well, such as nut candy and molasses candy; these are very nearly natural. Of the sweet fruits, the best for any person are those which that person likes best and can most frequently eat. There are two varieties of dates in the market, the golden date and the Fard date. Dates are found to be in the most constant demand by the greatest number of persons for the greatest length of time, and are, therefore, the best sweet fruit available. Sweet fruits are natural objects of natural demands; candy is not the object, it is artificial, the primitive woman did not have candy. On the selection of foods during this illness more will be said later.

We will next consider the cessation of work by the stomach because power has failed. Action of the stomach simply stops; not even the gastric juice is supplied, for it requires power to supply that also. The gastric juice is among other things the sterilizing agent; when it is not sup-

plied the food must undergo decomposition and, if it does undergo such change, a whole string of distressing evils will follow, such as only a chronic dyspeptic knows of. Here the subconscious mind comes to the rescue again; it causes the entire mess to be sent up as a lesser evil than what must otherwise follow. This is vomiting and is done by design, but it is the subconscious mind's business, and in such emergencies this has its way. When it appears that the process of sending material up from the stomach is difficult, when repeated attempts are made with much distress and poor success, it is likely that the content of the stomach is too nearly solid, not liquid enough to float up easily. One, two or three cups of very warm water should then be taken, which is promptly used by the stomach as a carrier. The stomach never sends up water except as a means of floating up other material. The stomach having been emptied and the food having failed to serve as a source of material and power, the subconscious mind has recourse to the woman's fat for power and her other structures for material with which to build the fetus. The fetus does not in any known respect suffer in this affair, but, of course, there is a limit beyond which this rejection of food cannot go without danger to the life of the woman and of the fetus also.

In the prevailing professional practice there is danger, some deaths do occur, but only as a result of the practice. The cause and nature of the illness not being understood, the treatment is rather more likely to do harm than good; I have not known it to do any good. A successful and absolutely safe method of treatment, briefly stated, would consist of doing absolutely nothing for the patient. Being left to the guidance of her own feelings, her own subconscious mind, she would do about the right things and get along well. Let the patient alone, relieve her of duties, of company, of advisers; attend to her wants as *she feels* them. From that moment her condition improves and in a day or two she is pretty well and will get on satisfactorily if only she is not, by what she reads or what "they say," induced to return to the erroneous ways the moment she is again comfortable.

So much, so persistently and so fast is power appropriated for the organization and growth of the fetus, that the fuel material of the last meal is exhausted before the next meal is taken, which is most likely to happen during the longest interval between meals, as between the evening and next morning. The patient no sooner gets out of bed on to her feet than she is sick; she may even feel sick before she gets up; it is common to be awakened by the sensation of nausea

as early as two o'clock in the morning. Eating is the remedy for the emergency; but it is better to prevent these emergencies. To do so means eating at bedtime and eating before rising in the morning, having breakfast in bed. There should be as little delay as possible in getting something to eat when nausea is present or felt to be coming. Nausea in these cases when the stomach is empty is to be interpreted as an urgent sense of hunger. After breakfast in bed let the patient remain in bed in undisturbed peace thirty to sixty minutes; let the feelings be watched instead of the clock; let the patient get up when she feels like doing so.

As a matter of precaution let there be within reach, so as to be got without raising the head, a few edibles that can be resorted to in case sickness is felt very early in the morning. What these edibles are to be, is to be determined by each patient for herself. She should not act on, even if she listens to, what others say. She should not even waste power listening; what was good for them may not be good for her. Other minds with their learning cannot influence or govern her bodily functions; she has her own subconscious mind which will mind its own business all the better when let alone. The bodily functions are exclusively under the jurisdiction of the subconscious mind which expresses

its needs by feelings that merge into consciousness. Let the patient consider these exclusively in making her food selections. A combination of illness, anxiety and hunger puts the patient in a condition to appreciate the help of so much as a suggestive list exhibiting many materials from which she is to select the few she wants. Such list, in the fashion of a bill of fare, will help much, and it should be made without worrying the patient so much as to consult her about its making; but when made she must read it, or have it read to her, for the purpose of selecting what is likely to be wanted within reach during the night or early morning or between meals.

This list should include everything that can be made available, ready to eat and that is good. A foodstuff is proven to be good by the fact that it has been and is much and often used by many. While this suggested list is to be made by or for each patient according to circumstances of availability and season, I suggest that among other things it contain so far as practicable the following: —

Almonds, English walnuts, Brazil nuts and filberts (unbleached nuts are in the better state of preservation).

Raisins, the best clusters.

Dates, both varieties.

Figs, best dried, when fresh figs are unavailable.

Pop-corn, prepared at home, unmixed with other matters.
Olives, pickled; some ripe, some green.
Onions, some fresh, some pickled.
Beef, dried; cooked or not cooked.
Fish, dried; cooked or not cooked.
Crackers, plainest fresh, in variety.
Biscuits, cold; no objection to hot.
Rice, plain boiled, cold or hot. (Mixed with a little pure olive-oil and a shake of salt, even cold rice is very fine.)
Fruits, fresh, raw or stewed (without sugar).
Fruits, dried, freshly stewed (without sugar).

Whatever alleged outlandish thing the gastric intelligence may demand, it will be right to eat it. Besides the likelihood of having to eat at bedtime and very early in the morning, it may be necessary to eat during the forenoon and afternoon.

Good drainage of the body will contribute largely to good physical maintenance. The patient should not go thirsty. Besides the fluids that go with the meals, hot water should generally be taken about four times daily. The best temperature of a hot drink is that which best suits the patient. On a hot day one can drink cool water enough for drainage purposes, but on cool and cold days experience very much favors the hot-water beverage. When one is eating three times a day the best times for hot water will be an hour to an hour and a half before each meal and just enough to quench thirst at bed-

time. Two glasses of hot water is a small quantity to take at one sitting. Any adult can easily take five glasses in ten minutes and ten glasses in thirty minutes. Such quantities are sometimes taken *necessarily,* with much good and no harm as the result, but this is only mentioned with a view to showing that two glasses constitute only a moderate quantity of hot water to take at one sitting.

One's conscious mind may take undue advantage of the subconscious mind; it often does; the subconscious through feeling pointing one way, the conscious through reason, example or other motive, leading to diametrically opposite ways. The subconscious mind often gives way, not without protest, however, allowing precedence to mind in many cases in which the two are at variance. By the time we have lived long enough, those of us who work will have noticed many times that we like to have our meals in peace. We will have had occasion to notice also, as Shakespeare did, that "unquiet meals make ill digestions." Still more strongly do our feelings prompt us to rest from bodily effort and especially from mental effort a while after meals. Animals rest after eating, so do all peoples of all nations, excepting the victim of master and circumstance in the city; but often we allow ourselves to be lead into disregarding these feelings

by which our subconscious mind would direct us, and into disregarding the universal custom of resting an hour at noon. We sit still enough bodily at our meals, but vigorous talking, reading or any other volitional mental effort prolonged throughout the sitting costs power. The pregnant woman cannot spare this power because it is all needed for digestion. She should not talk at all at meal-times after she begins eating nor for an hour afterwards. I know that is hard for a woman not to do, and she may need help for the purpose, some one with authority to say: You are not giving your stomach a fair chance, or "unquiet meals make ill digestions," and this may prove more effective if the monitor does not forget to mention that Shakespeare said so.

No matter how weak and delicate a patient may be, there will be power enough present, ready and available for digestion of anything she may really need; but the mind can cause the diversion of that power, during meals and the hour after eating, to effort of mind and body for which the stomach's allotment of power is appropriated. The little, busy, speedy, thin woman will, by rapid talk during meals and a bustle of business directly after eating, use up all the power present and available for digestion, so that the stomach is helpless, cannot

even supply the gastric juice to save the mess from rotting. Good thing, then, and very necessary, that the gastric intelligence should order it up. Nothing wrong with the works, only the power is switched off. The treatment of the case when a meal has been thrown up consists of lying down, head low, no volitional mental effort as in talking, listening or reading. Then in two to five minutes the patient will feel like eating again, which will be the proper thing to do.

To prevent this action of the stomach in general, the patient must reduce her expenditure of power. It is quite likely that it will be enough to eliminate the mental effort of reading, talking and listening; that much will help immensely and may be enough. If not enough, then the patient must eliminate that work which entails mental effort and anxiety, such as skilled work. Specifically, she should not read anything, should neither make nor receive calls, should do nothing that can be left undone or for others to do. It is of the utmost importance to have meals in peace and quiet, and rest from work, especially mental work, at least one hour after each meal, and during that hour she should not even be spoken to.

The patient may succeed very well by carrying out these instructions only halfway; she

may find herself an easy case; if so, so much the better. Certainly a woman will not do all these things unless forced by illness to do them. However, it is my duty to supply the maximum possible requirement; let each one help herself to what she needs. There is no reason for restraint from those pastimes which afford pleasure without drawing more than very lightly upon the patient's power.

Sickness of pregnancy affects chiefly and most severely those who most employ their minds; accordingly, educated women come in for a large share of it for the reasons explained. The illiterate woman who does skilled labor will also suffer, and, I am told, they do in Japan where women not only work but work somewhat speedily and put skill and art into about everything they do. Among negro women in the South this sickness is scarcely heard of. Among illiterate women whom I have known, there seems to have been none of it. Unskilled hard labor is not unfavorable to the health of the pregnant woman; it really costs little power even if it does require strong instrumentalities.

Chapter III

Natural Infant Feeding

The Reason Why It Fails and the Way It Will Succeed

NOTHING short of disabling misfortune or actual disease should be allowed by any mother to excuse her from feeding her infant in the one and only natural, safe and best way. The Great Infinite Intelligence has provided this one way of feeding the infant. The little finite human mind, influenced and aided by its higher education, is miserably failing in its attempts to devise and supply substitute schemes for Nature's one prescribed method. Admitting that the substitute schemes often end well, who can say that the natural way would not have ended better? Who can say at what age of later life the right and the wrong, the better and the worse, the natural and the artificial, of infant care ceases to exert any influence in favor of good or evil, health or disease, strength or weakness, success or failure? At any rate, it is the known evil results of the substitution of the artificial for the natural that must influence us to abide by the natural way of infant feeding. "Statistics from

America and Europe show that in all large cities infant mortality has been steadily increasing for the past twenty-five years," wrote Dr. L. Emmett Holt in 1898, and he blames artificial feeding more than all other alleged causes. In Holt's experience it has been exceedingly rare to find a healthy child who has been reared in a tenement house and who has been artificially fed from birth. He also observes that while among the poor the capacity for maternal nursing seems to be diminishing year by year, among the better classes it has come to be the exception and not the rule. In Holt's private practice not one-third of the mothers have been able, though willing, to nurse their infants. The greatest number of deaths during the first year of life among rich and poor alike are caused by digestive disorders that are due, says Holt, to artificial feeding.

No source of a married woman's happiness is so prolific as the group of all-round good boys and girls that she is raising. Whether this group is only in prospect, or is present, or has scattered, each to where he or she can best thrive, is there any other sphere or any other purpose, to which a married woman can devote the best attention and effort of her life, that will be productive of so much pleasure of such supreme quality for so great a length of time? But the achievement of this happiness is imperiled by some dangers

to health and life for which we do not feel ourselves to blame, and other dangers to health and life for which we do find ourselves to blame. A death, a chronic illness, a life of imbecility, or insanity, having come to pass, can we say it was or was not due primarily to one or more departures from the course prescribed by Nature for the raising of children?

A brute knows enough for the perpetuation of its kind, even under great difficulties. That is knowing much, and that knowledge is of wonderfully good utilitarian quality. Stripped of education, are we not in our illiteracy just as well equipped with knowledge as the brute? However, being improved by education and being moved and influenced into allowing ourselves to be governed by the spirit of learning, we have, wisely enough, determined that our children shall be of better quality than we were, that we shall do better for them than our poor illiterate parents did for us, better than our poor and less learned cousins are doing for their children. More than that, thanks to our learning and ingenuity, we are able to reduce to a minimum the care, drudgery and self-sacrifice that our poor illiterate mothers endured for our sakes.

The bright idea is suggested, or occurs to the educated mother, so early as to permit its employment to the fullest extent of its alleged

utility, or at any rate the idea comes and is adopted in time to relieve the mother from that close confinement to home, that untidiness of dress and appearance and that constant association with the baby that must prevail when it is fed in the natural way. The bright idea will be fruitful of still more and greater good; bottle feeding of the baby will permit the mother to enjoy much of the freedom of the woman who has no baby. What an immense difference in favor of the mother does the modern bottle feeding make! Great is the temptation, therefore, to resort to it, even when there are no other than the mother's selfish motives for doing so. Only the good ends are thought of, possible evils are not considered, trouble is not looked for; only successes of bottle feeding are paraded. As for the many complete failures and the many more partial failures, the less said the better; the subject is painful to those who know, and they are not believed when their views, derived from experience, are offered.

There is an uncatalogued list of deaths, chronic ills and imbecilities for which, as cause, some details of infant care seem, by the circumstances of the case, to be indicated as responsible. If, in the survey of an infant's life, nothing were to be found wrong or unnatural, except that it is being, or was, fed in an artificial way, that fact

alone would prove to be a sufficient wrong to account for any evil in the catalogue that might be present or follow. Bottle-fed babies that were sick and growing from bad to worse, under the otherwise most favorable circumstances and conditions, have recovered with apparently miraculous haste when restored to the natural way of feeding by the help of some other baby's mother, or a milk-giving goat, showing that the illness and danger to life in the case, not to mention the enduring unhappiness that might have resulted, were entirely due to the departure from the natural and only right way of doing this particular detail.

Many babies die from no other cause than that their mothers fail to feed them naturally. It is disease that sooner or later kills, or more or less irretrievably injures the child and damages all its prospects. In case of death the disease is named as cause, with no reference, however, to the cause of the disease. The number of deaths is great, but the number of cases of illness arising out of the unnatural procedure called bottle feeding is vastly greater. We display our successes, but keep the curtain drawn down over our failures. "That's the way we lost our first," said a man to me; "my wife failed to nurse it and substitute methods failed." But that was said in confidence and was not allowed to serve

as a lesson to the present and prospective educated mothers of the community.

Within my little sphere of work and observation there have been women who failed to feed their babies naturally. In these cases the ladies were so well and strong that there seemed to be no reason why their milk supply should so prematurely fail. Why does the milk supply fail prematurely? My answer follows and is a matter of simple instruction; where all intentions are good, it will enable the mother to abide by the natural and only safe way of baby feeding, if she is in a reasonably good and comfortable state of health.

The physician is, of course, dominated by his views of the case in hand, which views are generally in accord with the consensus of professional opinion in regard to such matters,—all of which is proper so far as the physician is concerned, however much the basis of such opinion—even the consensus of opinion—may be open to suspicion. The physician in turn dominates the patient, presumably with her consent, but sometimes without such consent, either of the patient or any of her family, as, for example, when confinement occurs in a hospital alleged to be first class in respect to all material and intellectual equipment. It does happen that able-bodied mothers are discharged from such hospi-

tals with infants which they are unable to feed, because their mammary glands have without their knowledge or consent been "dried up" by means of drugs. This is the physician's way of anticipating and settling at once the question of the mother's ability to feed or not to feed her baby.

In other cases the mother will have fed the baby one, two, three or more months; then it will be apparent that the baby is not thriving, that the milk supply is scant, or deficient in some detail of quality. Tests of the mother's milk are made and show it to be defective in important respects. The bottle method is then introduced and the breasts are allowed to go out of service, and once out of service for even a few days, the mammary glands cannot, so far as I know, be induced to resume their milk-giving function.

The past and present examples of mothers, educated and cultivated, easily feeding their babies naturally, are enough to justify the conviction that these able-bodied mothers who are being "dried up" by design can also feed their babies. I will show and am prepared to demonstrate that safer means based on simpler reasoning easily give us not only better but perfectly natural, good, old-fashioned luck in feeding the baby. The prospective mother having been duly

warned of an innocent-looking danger that would imperil the chief enduring source of her life's happiness, I must ask her attention to the same principles and the same reasoning that I have employed in explaining the sickness of pregnancy and its treatment.

We understand now that for the organization and growth of the fetus the mother supplies the structure materials and the power. After birth the mother still supplies the baby with structure and fuel materials, but out of the fuels the baby evolves its own power for its growth and functions. Until the beginning of the weaning period the mother in the natural course of events still continues to eat and digest an additional share of foods and to elaborate the same into milk for the baby. The *power* which the mother appropriates for this extra digestion and this elaboration is here the one chief item of interest, the one thing to be understood. Conditions being at all favorable, the mother will certainly take in and digest foods enough for all purposes, and the power sufficient to elaborate plenty of milk for the baby will certainly be available for that purpose. The always consistent nature of the animal—the subconscious mind—certainly always attends to this matter so perfectly, so naturally, so easily and, I may say, so automatically that one needs take no cognizance of the process

and needs no learning to aid it. That the mother requires more than her personal need of food is a simple fact only to be noticed as such, but this fact is not to influence the mother in her selection of foods, neither in respect to quantity nor quality. Conscious knowledge of extra needs is very likely to induce interference with that natural selection which is prompted by the subconscious mind so unerringly and so perfectly that conscious aid or interference simply hinders and renders selection inefficient and erroneous. I mean to say that the illiterate nursing mother makes a better selection of foods without conscious thought than the learned mother does with the aid of what she reads or hears on the subject. It will be enough to say that the mother should have what she feels she needs and therefore wants.

A case presenting itself, we assume that the mother is in a reasonably good, comfortable and useful state of health, that she takes food enough, that her milk-producing laboratory is in good order, that power for its operation is ready and available. On these points it is not likely to be necessary to make any inquiry or offer any instruction, so well does the subconscious mind take care of them when not interfered with by the conscious mind. The milk supply, however, does not materialize in the case.

As already explained in the discussion of power in physiological functions, an hour of purely mental work costs as much power as two and one-half hours of hard manual labor. The illiterate mother has plenty of power even though she performs hard labor, because a day's manual labor will not ordinarily exhaust her supply of power so far as to leave her without enough for the elaboration of milk. When appropriated for necessary or unnecessary mental effort, at rapid rates of speed, the quantity of power used will often be so great that the supply will become exhausted, the woman will be tired, the milk supply will for an afternoon or an evening fail. A maximum combination of talking, reading, music and study, with some manual labor, and all these at a high rate of speed, will leave no power for the elaboration of milk. This view of the matter will readily be confirmed by the educated mother of experience who has correctly fed all her babies. She will remember an afternoon, some callers, speedy and lively gossip, a riot of voices, jolly time, rather strenuous though, and that evening there was only the scantiest supply of milk for the baby.

Elaborating milk is an *extra* duty, just as carrying and supporting the fetus was. It makes an extra demand for power, just as any extra duty would do. Compensation *must* be made by

omitting some other expenditures of power, by leaving some other things undone. Power for the elaboration of milk will surely always be present and available; but designed, prolonged and speedy mental effort will cause that power to be diverted and appropriated for the mental effort.

While it is the educated mother who is most likely to fail to feed her baby, it is not at all necessary to argue against higher education of women on this account; but the educated mother, while nursing a baby, must certainly, under the circumstances, allow her mind to remain mostly at rest; she must abstain from voluntary and designed thinking and from mental work which involves and induces such thinking. There is no objection to automatic thinking, because that does not seem to use up power appreciably. It will be enough to glance at the headlines of the daily paper, to look at the table of contents of a magazine, to see only a minimum number of the quietest friends. To have help to do all her housework and then use her time all the more for mental effort, makes matters so much the worse. It is an advantage to a woman to have to do her own housework, if for no other reason than that it keeps her from mental effort that is much more exhaustive of power. To read regularly a morning paper and an evening paper

is in itself an exhausting vice, not to mention much other magazine and novel reading and talking that the educated woman will do. The milk supply fails in quantity and quality because the power, which is present and available for elaborating milk, is diverted to operate the brain in the performance of all the mental work and play that the educated woman seems to think it her duty to do and to continue doing through the periods of pregnancy and nursing.

It seems hardly necessary to specify further what the nursing mother will now do when she finds the baby's natural milk supply deficient in quantity or quality. From what has been said of the cause, she will understand the remedy without further explanation. But repetition is favorable to impression of the learner, so a very brief summary, defining the natural management of the case, even at the expense of repeating some things that have already been said, will, I am sure, be advantageous to the learned mother who is seriously concerned in this matter. The mother, while nursing a baby, is supposed to be in a reasonably good, comfortable and useful state of health. She should and she certainly may eat anything she feels she needs and as much as she feels she needs. When it is understood that she should limit her selections to such things as are included within the range of natural

foods, those that are least affected by artificial modification and conglomeration and that are fresh or in a good state of preservation, then it may be said she may eat anything and everything she wants and as much as she wants. The want that is to be respected and satisfied is that which is based upon a need, not that which is based upon the like of a thing. The "need" wants get us into no trouble; the "like" wants lead us beyond the range of natural foods into that of the artificial, and the unduly mixed and conglomerated things that are contrived to satisfy likes rather than needs.

Experience, of the individual, of the family, of the community, of the race, is the teacher in matters of food selection. Of what weight, for example, is the adverse opinion of the chemist in regard to rice in the presence of the fact that rice is, and for the longest time has been, the most used and most repeatedly used of all cereal grains. Feeling in this matter of selection is reliable, reason is unreliable. Food selection is a province of the subconscious mind, which will so persistently insist on minding its own business that the educated conscious mind of the same person cannot assist it in selection; much less can the educated mind of the doctor, or any other person, meddle with a patient's own function of selection. But while that very useful member of

society can never arbitrarily select and successfully prescribe foods, he can and should assist the patient to the true conclusions from experience in general and her experience in particular, and assist her to the correct natural interpretations of her longings and bring her back to the domination of her own subconscious mind when learning, which did not happen to be science, has led her astray in the matter of selection.

The nursing mother must have good digestion; digestion requires power. From the moment she begins to eat she must refrain from such mental effort and be free from all such annoyance as will use up power and cause diversion of the same from the function of digestion. "Unquiet meals make ill digestions." The same personal quiet must continue during her undisturbed rest of about an hour after each meal. Since it is *mental* effort that consumes power so fast and causes the diversion of so much of it from the apparatus of digestion, it is from *mental* effort that the nursing mother must especially abstain during and for an hour after meals. The rule of resting after meals need not be so strictly enforced in regard to any easy and trifling duties that may seem necessary and that she may wish to do and find pleasure in doing. But the absolute rest, relaxation, of mind and body in an easy-chair, and alone, will generally be the best thing

under the circumstances. Strenuous effort at quieting the mind should, of course, not be attempted, because that would involve the very mental effort that we are trying to avoid. Let the automatic thinking go on as it will; let it busy itself with the passing objects seen from the window, or with the passing subjects of memory; the hour will thus be made pleasant and will seem to pass quickly. Automatic thinking does not seem to consume power appreciably. It is the intentional, volitional thinking that uses up power faster than hard labor. The recumbent position is not favorable to digestion. The semi-recumbent position is the best, as on a reclining-chair, or on a lounge which permits head and shoulders to remain considerably elevated and the abdominal wall to be relaxed.

The mother adopting these instructions will at first watch the clock for the expiration of the arbitrary hour; later on, after some weeks, it will be her feeling that she will watch for the moment when she may go to work. The propriety of the rest will be felt; that there is no power just then available for work will also be felt. The power is there, but it is being used for digestion; it can be diverted and used for work, but then digestion would be defective. In about an hour power becomes available for work; feeling informs one of that fact and prompts her to

go about her duties. From that moment rest is no longer necessary, desirable nor agreeable. To rest somewhat in this fashion is, as any one must know, in accord with universal custom of many familiar animals and all peoples. Under artificial conditions and under the mastery of employer, this natural custom, I may say this natural law, of having our meals in peace and a rest afterwards, is much disregarded, with no gain in the matter of work done by the individual and certainly with deterioration of the individual health.

The mother being in a reasonably good state of health, it should not for a moment be believed that she cannot feed her baby naturally. The mammary glands should be assumed to be in good condition, power is certainly present and available for the elaboration of milk, the subconscious mind of the woman is to be trusted absolutely for the good condition and good working order of every detail required under the circumstances. There remains, then, only one thing for the conscious mind to see to; that is, let not the power of the woman be diverted for mental effort to such an extent that not enough is left available for the elaboration of milk. Experience will soon teach her the limit to which she can safely go in the direction of mental effort and yet do justice to the baby.

Chapter IV

The Maternity Nurse

Spontaneous Intuition Compared with Artificial Training

IN REGARD to the details of infant care, the thing the mother feels like doing, or the way she feels like doing it, will be about right, because it is so prompted and directed by her subconscious mind, her inerrant nature. The mother will not allow herself to do that which she feels is not right in infant care and she should not permit the same to be done by a nurse, however learned and artificially trained, who may prove so dominant as to insist on it as authorized by what she has read or been taught on the subject.

The baby's health will to some extent depend on the mother's health, which is therefore an object of solicitude. The mother will have her wits about her and will not quite need to resign herself into the absolute guardianship of the nurse. The mother's subconscious mind will still continue to be her guardian intelligence and is still to be trusted in the matter of details of her personal welfare and especially in the matter of the selection of her foods. The mind of a domi-

nant nurse, stocked with its artificial learning and its contempt for the real scientific lessons and examples of Nature, should not be allowed to induce the mother to do or select anything to which she feels an aversion.

An Example.—A complication of chronic digestive disorders, lasting many years, had its origin during confinement when the artificially wise nurse insisted on the patient consuming spoon victuals that she did not want, instead of the common, plain, ordinary diet that the mother did want, but which the nurse did not allow her to have.

Second Example.—An artificially trained nurse holds a baby balanced on her left hand while with her right she bathes it with a sponge. The baby is in an extreme state of alarm during the bath and cries all that time in a manner heartrending and damaging to the mother. The procedure takes place out of the mother's sight where the dominating nurse has her own artificial way unobserved and uncriticized, allowing the inference that the nurse and her modern method are correct enough, but that it is the baby that is naughty. This was done thirty days. The mother seemed unable to obtain any good reason for the baby's crying and did not find out until *her* mother came, saw and rightly explained that the alarmed state of the baby

was due to finding itself abruptly grasped and lifted to mid-air and there poised in the unnatural situation of nothing for its head and limbs to touch or rest upon.

Daily to the extent of thirty days a state of mental terror was combined for the baby with its bath, and as many times was the anxious mother alarmed for the safety of the child. It is at least our fear that this baby will suffer from future evil results of the impression thus ruthlessly made and deepened and intensified by repetition. The baby's health depends upon that of the mother to some extent; if the mother's health suffer from this repeated agony, still so much the worse for the baby.

Third Example.—Another artificially trained nurse, and I am told there were more of her kind at the artificial institution of her origin, had a reason why the baby should not be allowed to the breast until after the expiration of three days. The mother's respect for up-to-date learning allowed her to be dominated into yielding to the nurse, and so the baby was forced to begin its career with a three days' fast.

Our conscious mind does not clearly enlighten us on the nature and remote results of the agonizing impression made on the plastic instrumentality of the infant mind by an enforced absolute fast during the first three days of its life,

but our subconscious mind persists in presenting the feeling that such unnatural, cruel and unnecessary procedure can only be fruitful of future evil to the victim and incidental unhappiness to those responsible for him.

The misguided nurse will suffer no evil consequences for her blunders; for *her* mistakes the innocent victim will suffer and incidentally the victim's mother, the family, and finally, but almost surely, the state. The nurse is not responsible, the mother is. No mother should for a moment resign to a disinterested stranger the direction of the affairs of her baby, and her own feelings and common sense should be regarded always as a higher authority for action than what she reads or what "they say" on the subject.

The baby was forced to fast three days before it was allowed access to its mother's breast; it was, however, given warm water during this time. These must have been three days of agonizing "lock-out" from its natural food, its natural drink, its natural medicine, its natural and necessary function of developing the nipple and from its only occupation. These were also three days of arrested development for the baby and three days of doubt, anxiety, fear and suspicion on the part of the mother who trusted in the latest learning and who must have felt

that she was ignoring her own inherited, natural, maternal wisdom.

There was also neglect or omission of the necessary function of relieving the mammary glands, which only the baby can best and most naturally do, which should always be the baby's occupation, entered upon when, after its bath, dressing, sleep and rest from the ordeal of its advent, it awakens and begins to struggle with evident motive and object in view. The mammary secretion, whether it be called milk or colostrum during the first three days, purges the baby; that is natural and therefore proper, and no attempt should be made to improve upon this detail. It is decidedly unsafe to make radical changes in methods established by Nature.

Still another painful and distressing evil result of the new idea was the intense suffering of the mother for two months from diseased breasts, from which, after three months, she was finally relieved by the natural wisdom and labor of a nurse who had no artificial training or learning, but who had natural intelligence and natural experience unadulterated with the utterances of those who have no children for the alleged benefit of those who have. And we have not yet the last of such indiscreet haste to adopt an alleged new idea where the old idea had proven itself perfectly good in a case where so much is at

stake. There remain yet the questions: What lasting harm does it leave impressed upon the mother? What evil-bearing impression does it leave upon the child?

Of new ideas "many are called but few are chosen" for adoption. The affairs of maternity should not at any rate be allowed to serve as occasion for experiment. There is altogether too much at stake in these affairs. Vastly better and safer is it to abide by ideas and methods that have survived from time immemorial and are sanctioned by usages that are universal in such cases than to adopt any that are but just come into local existence or have at best been but short lived. With all due respect for the learning and training of the nurse for other purposes, I should in maternity cases vote for the nurse who is simply a good plain woman, ready and willing to perform her part in a manner consistent with both the maternal instinct of the mother and of the nurse herself. The maternity nurse with natural experience only, has at present a better reputation for safe natural service than the learned maternity nurse with artificial training.

Chapter V

Ills of the Weaning Period

Their Causes, Results, Prevention and Cure

WHETHER the baby is fed naturally or otherwise, the time comes when it will express signs of dissatisfaction with its subsistence, signs of additional wants, longings and urgent needs. These begin to appear at any time from seven to twelve months of age and, exceptionally, earlier and later than seven and twelve months. The baby becomes restless, cross, crying more or less, pushing itself from the mother's breast or turning with plainly apparent displeasure from the sight of the coming bottle. It does not appear to be sick but we know it is not happy. If it has up to this time been well, that fact speaks well for the care it has received and there should be no reason why it should not continue well. Even teething will not generally be a disturbing cause sufficient to account for the unhappy, the distressed and worried condition of the baby. If the baby has arrived at the proper age, seven months or more, or, disregarding its age, if it is big enough and strong

enough, or *seems* old enough, even though it is not so, it will not only be proper, but it will be necessary, to consider possible additional wants on its part and therefore additional needs.

The baby is an animal in a state of nature, however artificial its material environment may already be. Personally, it is not yet artificialized; it has yet no likes and dislikes that can be regarded as having resulted from experience; it has yet no artificial habits. When, therefore, it wants a thing, we may seriously conclude that it needs the thing wanted. The baby wants its mother's presence, her sympathy, her contact, her embraces. The baby needs these and it would fail to achieve its best possible development of body and mind if deprived of these even in part, and it would not live long if totally deprived of these details of infant care.

In the case of the young baby it seems to me that if we omit the word *like* and do not use the idea it conveys, we will so much the better understand the subject of infant needs. Likes are acquired, are associated with experience, are matters of habit and may involve the use of things that are not natural foods. Wants, however, are constitutional and are expressions of the subconscious mind's demands for natural foods which the baby may never have had and of which it can have no conscious conception nor impression

based on experience. To say that a baby wants a certain item of food includes the idea of its liking that food, but excludes the idea, as we wish it to, of the liking being acquired and prejudiced by experience or even the slightest semblance of habit. That the baby likes what it wants goes without saying. When the baby *wants* a food it will certainly *need* it, and so serious and urgent is that need that the baby will not thrive without the object of that want. This statement is easily substantiated by experience, and some experience of this character can be found in almost every family; but it should not be taken to indicate any difficulties in prospect for the baby. A baby is the easiest, most submissive and most compromising character to deal with as a patient.

The baby's wants will have reference generally to classes of foods rather than to any special food of a class. When, for example, it wants a starchy food it will be satisfied with anv cereal grain, or any starchy root, that has been used by a great many people for a great length of time and has thus been proved to be a good food and capable of being oft repeated. When the baby wants meat, any lean meat will be satisfactory. So when it wants fat meat, it will not be very particular as to what variety. The baby will, of course, get the best there is and everything fresh

or in a good state of preservation. The baby's diet should certainly not include anything but natural foods in a simple, unconglomerated, unmodified state of preparation.

What are the best foods? The answer, made conclusive by observation and experience before the food expert and the chemist were born, is, those foods that have been used by any great number of people any great length of time and have been most repeatedly used during that time, *they* are the best foods. Those foods that we naturally and without prejudice select most frequently and which we may therefore designate as the most "repeatable" foods are for that reason the best foods. It is easier to see this than to prove it, and what is the use of proving what is so easily seen? Rice, for example, is the best of all cereal grains, because it is by anybody more often "repeatable," is used by more hundreds of millions of people and has probably been in use longer than any other cereal grain. The potato is by far the most "repeatable" vegetable in use among the most civilized peoples. Beef is by far the most "repeatable" meat. Beef fat is the most "repeatable" fat in ordinary use among us in the United States of America. Speaking of beef fat we, of course, include butter; but butter is not pure, as the milk cannot be entirely separated from it; the one to two per cent of

milk remaining in the butter soon spoils, and spoils the butter, so that in addition to being an impure fat it is also a stale fat.

Among oils used as foods, the olive oil is the most "repeatable." I mention only the best representatives of classes of foods that we must depend on. I do not mean to say that we should live on these exclusively, but I do mean to say that the subconscious mind chooses these items most frequently, and the choice is a matter of feeling and not reason. The conscious mind with its reasonings could never cause beef to be superseded by mutton, or turkey, or chicken. No other vegetable that we have in the United States could be made to replace the potato. It seems to me that we can use olive oil every day for life. We can use cotton-seed oil every day for a while, but we cannot long continue its use. We may try it designedly, but then we soon find that digestion fails. One oil may be as digestible and in every way just as meritorious as the other and we may not be able to tell them apart and we may not be able to detect any adulteration of one by the other; we may be satisfied to have our meat, fish and potatoes fried in either, or a mixture of the two oils, so far as the reasoning conscious mind is concerned, but you cannot fool the stomach with your cotton-seed oil, not even with your slightest adulteration. People will

say that cotton-seed oil disagrees with them; I would say that the stomach disagrees on the selection of it, and refuses to do its work if any cotton-seed oil is present. Whenever a person tells me he cannot use oil, I feel pretty certain that he has never fairly tried pure olive oil.

I am not forgetting to mention lard as a handy, "repeatable" and much used fat; but I leave pork and all food products of pork out of consideration except to find a fault with pork which may supply a motive sufficient to induce some people to abstain from it. The law of Moses very strictly forbade the use of pork. In Leviticus, eleventh chapter, the seventh verse reads: "And the swine, though he divide the hoof, and be clovenfooted, yet he cheweth not the cud; he is unclean to you." Moses must have been very particular in regard to this item of the law, and did not want to leave room for any mistake or misunderstanding on the question of pork, so he said further, in the eighth verse: "Of their flesh shall ye not eat, and their carcase shall ye not touch; they are unclean to you." That plainly meant the exclusion of lard and did not even permit a Jew to eat a piece of pie whereof the crust was shortened with lard. I do not for a moment doubt that there were the best of reasons for this unconditional prohibition of pork; I believe these reasons were deduced from

ages of experience which finally taught the necessity of the law as formulated by Moses on this subject of swine as a source of food. I do not know what these reasons were nor of any way of finding out. The best we can do is to see if there is at present any good reason why *we* should not even touch pork, and, if we find good cause for total abstinence from pork in our time, we may assume that it is the same as that which existed in the time of Moses.

Pork is extremely convenient and "repeatable" for all purposes for which it is used, and we all like it the world over in the shape of chops, roast, spareribs, pigs' feet, sausage, bacon, ham, and the lard in our pie crust and along with the several good things that are fried with lard. I would not stir up a hornet's nest in the pursuit of this pork question; I do not want to be understood as suggesting any change in the community's attitude toward pork. I am interested only in that small percentage of people who have ills from causes which do not trouble the community in general. I am only dispensing a little utilitarian learning for the benefit of the few exceptional men, women and children who need it. These few, however, make up a large sum in the aggregate, and an affliction of one member of a family is a matter of concern to the whole family; and the afflictions of a few in

the community are matters of concern to the community in general. It therefore appears to me that there must be a wide-spread interest in any reasons there may be why some people should abstain from pork absolutely. I have found *one* reason; it may seem disappointing to have found no more, but this one reason is big enough to equal several ordinary reasons. I found it thirty-five years ago and have had an eye on it ever since, so I am sure it is there and that it persists under all conditions and circumstances.

In many persons pork, however small the quantity used, produces a tendency to suppuration. This tendency shows itself by the appearance of collections of pus ranging in magnitude anywhere from a very little pustule to a large abscess. Pustules, sties, felons, boils, carbuncles and abscesses are familiar and are due to pork. Those who abstain absolutely from all products of the swine do not have anything of the kind. When a wound suppurates more or less and is a long time healing under conditions otherwise favorable, that will be due to pork. These processes of suppuration may occur in any part of the body, and *may* do irreparable damage. Ears have been destroyed, kidneys have been damaged, eyes have been injured and pretty faces have been disfigured by this process of suppura-

tion. I suggest that anybody who has pustules, sties, felons, boils, carbuncles, abscesses or suppurating sore eyes, will be able to refer their appearance to their use of pork several times within the two or three weeks preceding; and that, when one finds that in her case pork produces this tendency to suppuration, it will be wise for her to abstain absolutely.

That baby to which we are supposed to be giving our present attention is now anywhere from seven to twelve months of age. It is restless, ill-tempered from cause, and refuses its usual food about one-third of the times that the same is offered. The parents are worried, doctor is consulted, questions are asked, details are heard, age is considered, and the verdict is that the baby is weaning itself; it is tapering off on milk and, of course, needs and therefore wants other foods. What shall we give it? ask the parents. That is a question that would only be asked by a parent that is learned or at least influenced by the learning of others. The illiterate woman would not even think on this matter; she knows intuitively what to give the baby; and the dumb-animal mother would think still less on the subject, yet she has the same experience as the human mother. The animal mother in a state of Nature needs no light on the subject; the primitive human mother needed no help of a physician,

nor of a baby-food factory. The primitive woman, simple, poor and illiterate, is not yet extinct. She has preserved her kind and may still be found in great numbers in localities and among peoples not yet reached by the good influence of science and art and the evil influence of book learning that is not science.

Now at the weaning time in the case of any mother, human or otherwise, excepting the one that is artificialized and under the dominant spell of unscientific learning, the baby will gradually, readily, easily and eagerly adopt the diet of its mother, and at the same decreasing rate of consumption will it taper off on milk, of which the natural supply will also decrease at the same rate. It is not merely a rule without exception, it is a law of Nature that the baby adopts the diet of its mother when it stops milk. Simple as this is, universally and intuitively executed as this law is by the illiterate mothers, the educated woman wants to be informed definitely what specific foods she may give the baby.

Limiting her selections to within the range of such materials as are human foods naturally, fresh or in a good state of preservation, the mother may give the baby anything and everything it wants and all it wants. To find out what a baby wants, we would naturally begin

with the most "repeatable" foods, those that enter oftenest into the diet of any race, especially in climates like ours. Accordingly we try beef, rice and potatoes to begin with. To ask a baby if it wants a particular food, put the food to its lips; if it wants food at all, it will first taste what is offered; if the baby does *not* want the food, it will turn its head away; if it *does* want the food, it will grab it and may take much more then and there. It is extremely unlikely that the baby will refuse scraped beef, or rice or potato. Further tests are very likely to prove that the baby is an omnivorous animal.

The subconscious mind is sometimes alluded to as nature, "nature of the animal." We believe this little nature of the animal is a part and product of great Nature and that the small nature is consistent *with* great Nature, and that whatever the nature of the animal accepts from the Nature of Mother Earth will be strictly proper in all respects of quantity and quality, if only the food be in the same simple state in which great Nature produced it and not artificially tampered with more than to cook it and reduce it to an eatable condition. The baby has an inerrant subconscious mind; it recognizes the complex food products of Nature, but it is not competent to take cognizance of complex *artificial* mixtures and conglomerations. We will add

salt to its foods just as we do to ours, that is natural. We may give lean and fat meats mixed, nature supplies them so, and we may mix fats in small quantities with starches in large quantities. The gastric intelligence demands these simple combinations, and experience proves that such demand is rightly interpreted. We may also mix sugar with some foods to that indefinite extent which is most easily defined by saying *to suit the taste*—the taste that is not involved in any bad habits.

When it is found that the baby so heartily and eagerly eats potatoes, rice and pastes or gruels made from other cereals, as to convey the impression that it considers them very good, there can be no motive for trying to make them taste better or to make the baby like them better, and therefore no motive for adding sugar. We all *need* sugar and we get it in many foods, and the baby will get as much as the primitive baby got before sugar was presented to us in the artificial condition of isolated purity. We get sugar in so many foods naturally, and in such large quantities in some of them—dates, figs, raisins, prunes and all sweet fruits—that the artificially separated sugar does not seem to be necessary. While I cannot and do not wish to say anything against the moderate use of isolated sugar, I do not believe that it is at all necessary,

and I can certainly point to examples showing that much harm has resulted to some people from the habitual, indiscriminate and too oft-repeated use of sugar.

We will not mix milk or cream with the baby's food, now that it is in the process of abstaining from milk; and we will not mix butter with its food, because that is an impure fat containing from one to two per cent of decomposing curd which makes the butter a stale fat. The gastric intelligence has a repugnance to stale things generally and can take cognizance of a degree of staleness so slight as to escape the scrutiny of the conscious mind as represented by the sense of taste.

When weaning begins, water is to be the baby's drink, warm water in cool weather and cool water in warm weather; between these two it will not be hard to find which the baby prefers; that which it chooses will be best for it. If the baby does not want milk we soon find that out and it is quite certain then that it does not need milk; for, if it needed milk, it certainly would want it and would take it. The baby will do its own choosing of foods from the various items that may be presented to it for selection. Even if we could influence it and pursuade it to eat and drink according to *our* selection, the baby's stomach would not always agree

on the choice of the mind of another. The stomach is governed entirely by the baby's own subconscious mind, and that is an intelligence that insists on minding its own business and is uncompromising in matters of food selection.

The baby may have yet no conscious mind, may not be a knowing and reasoning creature, but it is possessed of an inerrant nature that is alive, awake and on duty and will make no mistakes so long as it has only to deal with what is natural and not artificial. It will be useless to discuss the ideal character of milk as a food, if the baby does not want it, turns from it and refuses it when offered. The baby may by the alternative penalty of hunger and thirst be forced into taking milk, but the stomach cannot be forced into digesting it, nor even to supply the gastric juice to sterilize it and save it from putrefaction. Some wise infant stomachs will send the milk right up again, others retain it to spoil into sickening, irritating, poisonous and purgative decomposition products, that are as different from milk as a very bad egg is from a fresh one.

To continue the enforced use of milk means to continue suffering from the illness caused by its decomposition in a stomach that *can*, of course, but *will* not digest it nor even sterilize it. That a child's stomach which has all along

digested milk, now refuses it, but will digest beef, potatoes, rice and a dozen other foods, is proof of the presence of intelligence in the stomach's operations, and we have other evidence of the existence of this consistent intelligence which is simply a part of great Nature which it is not only useless but fatal to antagonize persistently.

There die in California 160 children per month, under five years of age, from preventable diseases. In New York City just prior to 1896, when the population was very nearly the same as it was in California in 1900, there occurred an average of 258 deaths per month, of children under five years of age, or an average of 3,104 per year for ten years, from diarrheal diseases alone. In New York City on January 17, 1907, William Mills said to the Woman's Municipal League: "While you are sitting here many mothers in this city are watching anxiously over babies who will die before tomorrow's dawn, for the infantile death rate in this city is 72 a day, or over 26,000 a year. To every 1,000 children born in this city in the past year there were 233 deaths of infants." The Premier of England is reported to have said, December 29, 1906, that they could "hardly look the world in the face after recognizing that 120,000 babies died last year in England and Wales." In this the

Premier sees deterioration of the race, even the unfitting of the fittest.

Of this child mortality the California State Board of Health estimated (1904) that 80 per cent is due to preventable diseases. It will, no doubt, be correct to assume that 80 per cent of the extraordinary child mortality that we read of elsewhere will also be due to preventable diseases. When diseases generally, or rather their causes, come to be understood, a still larger share of them will be found to belong to the preventable division, and it will then be seen that it is far too low an estimate that reckons only 80 per cent of this child mortality as being due to preventable diseases.

These preventable diseases prove to be not diseases at all, but merely *disorders* of digestion. The patient would generally recover in twenty-four to forty-eight hours if the one or two errors of diet were corrected. Not all the victims of these digestive disorders die. To make a conservative guess, I should say that the number of new cases of illness each month is at least three times the number of deaths. The former in California would be 480. We may say there are 500 new cases every month of children under five years of age who get sick from these functional disorders; 160 die, some recover; a very large percentage do not recover, but continue to have

trouble with stomach or bowel, with resulting defects of development of body and mind in many cases. Many men and women will admit having had trouble of this kind ever since they can remember. So prevalent are these disorders that the well man or woman seems to be the exception, and we are often reminded that we are a nation of dyspeptics.

They are not much better off in any other enlightened country where child life is influenced by the false light of unscientific and erroneous medical learning to the disparagement of experience and the natural, inherited, inerrant, maternal knowledge of mothers. At the bottom of the trouble is the artificial element in the feeding of the baby. If we were deprived only of what we like, we would still enjoy good health, but to be deprived of what we need, is not compatible with health, growth, development and usefulness. If a baby does not get what it needs, as called for by its wants, we cannot expect it to remain well and happy, and grow.

The cause of these preventable ills of infants at the weaning time is that they are forced to *continue* what they no longer need nor want and are *not* given what they *do* need and want. The transition from milk to solid diet is too long deferred; it is one of those inconveniences that women are inclined to put off till tomorrow.

And then, having imbibed a few artificial ideas on the subject, mothers are afraid to make the transition, fearing that some evils and dangers are associated with this change of life in the baby's case. But, while this partial starvation for a month or two would not kill the baby, it prepares the way for ills that may kill it, or prepares the occasion for calling the doctor, in which event the conduct of the patient is generally still farther removed from the safe and natural to the dangerous and artificial way of doing things in such cases.

In the current folk-lore of almost any community there are conspicuous examples of children and adults who were dangerously ill, but who got well by getting what they wanted. To allow the baby freedom of selection means also freedom of rejection; it must therefore be allowed to stop milk absolutely if it wants to; which means that milk and cream must not be conglomerated with any other foods that the baby chooses. The stomach will not agree on the milk, no matter how small the quantity, even if it is fresh, or sterilized, and will either send it up or let it rot, and the spoiling mess will serve as cause of illness. Let us remember that the baby is natural, its needs and wants are natural and are therefore to be supplied by natural objects, not artificial. Nature makes complicated mix-

tures for us, but they are good because Nature made them and we find that we have no gastric troubles on their account. But, if by the help of our own learned minds we make complicated mixtures and conglomerations for our stomachs, they will be artificial. *Experience* teaches that many people have much trouble with artificial conglomerations.

The one great mistake that will account for these infantile digestive disorders that kill so many thousands of babies annually in the so-called civilized countries only, is the persistence of milk in the diet of children long after the subconscious mind has resolved to quit it. Not only is milk used daily, but several times daily; not only as the child's drink, but as a constituent of every mess of food that is conglomerated for it. That many children keep well and subsist partly on milk, simply proves that milk is proper for *them,* or that they are keeping well in spite of milk. But we are considering the multitude of cases in which it is not right, in which we do not succeed with the oft-repeated use of milk after their mother's natural supply for them has ceased and should be interpreted as meaning that the baby should then stop milk also.

Instead of stopping the use of milk, as the subconscious mind wishes to, as great Nature designed and arranged it should, we resort to the

artificial contrivance known as the dairy. We talk of milk being an ideally perfect food, but that is true only within the limits of the nursing period. Milk ceases to be a perfect food when the baby refuses it and its stomach refuses to digest it. The very idea of killing a calf to get its mother's milk is repugnant to us, and this repugnance is proof enough that the unnatural procedure is wrong however we engage our reason to reconcile us to the practice. I have absolute confidence in the subconscious intelligence of the small boy who felt such a repugnance to milk that he could not be induced to take any after his mother had on her doctor's advice taken him to the country for the sake of getting fresh milk for him. He saw the source of it, and naturally, spontaneously and uncompromisingly decided against milk as an article of diet for him.

But supposing we consent to the dairy so long as its repugnant features are beyond our immediate view, the unnatural contrivance embraces the still further unnatural detail of getting milk from an animal in one part of the country and delivering it to another animal in another part of the country. The distance varies from a few yards to hundreds of miles; the time varies from a few minutes to twelve or more hours. How unnatural this is may be more easily seen or imagined than explained. Milk is a very un-

stable combination, an exceedingly perishable stuff, and after the long time in transit, the exposure to air as it is trundled hastily along on wagon, on train and again on wagon, the ever and abundantly present microbian life of the barnyard and the city, and along the line between, is thoroughly rubbed, beaten and churned into the milk. In the natural way of taking it, milk is not exposed to air or to microbian life at all.

There is in a city no such thing as fresh milk from a dairy. It may seem good to the taste, may pass the health-office test, but it is a stale article, and the fine gastric intelligence of your bright little Jack McCormicks is not going to be fooled by it many times. We are informed that the milk can be got to destination in a perfectly good state of preservation, that the chemist has supplied the means; but it is not so. Time and transit have changed the milk; the reasoning mind may not see it, but again it will not fool the stomach of your highly sensitive baby who in these times is likely to be all the worse for having descended through several highly artificialized generations. Let us suppose that the milk during transportation does remain in *statu quo* under the influence of a substance that is paralyzing to microbian life. That substance is not a food, but it is not an inert substance either,

else it would be ineffective against the microbe. The amount of it that one gets in his daily allowance of milk is harmlessly small, we are told. We may actually take this stuff in these small quantities, try it and demonstrate the harmless character of it. And yet, the alleged demonstrated harmless character of any stuff of this class put to such use is not a fact. I do not doubt that interested parties *mean* well, and it may be admitted that this stuff in these small quantities is harmless in ninety-nine cases in a hundred; but if it is bad for one in a hundred it is bad for the community, and the aggregate evil to the State must be great. These preservative stuffs may by actual single test prove to be harmless to a thousand people and yet not bear repeated use several times daily without cumulative harm, resulting in illness which is easily named, but for which no cause is intelligibly assigned.

The stony seeds of cherries and of plums never hurt anybody when swallowed. A small boy swallowed a silver quarter; his mother rushed him to the doctor, related the fact and asked the doctor if it would pass. The doctor replied that if it was good it would pass. While stomachs, especially those of small boys, too easily accept large seeds and small coins, some people cannot force themselves to swallow a pill.

So it appears that even the gullet possesses some discriminating intelligence. There are other examples to that effect, and we should think it would and should possess such discriminating intelligence, for, if the stomach objects to a thing, it would seem proper to stop it at the point where it begins to start on its way there.

I suppose it is generally known what happens to many of us when a fly gets into our stomachs. We are aware of a strong feeling of repugnance to flies. That a dead, inert and harmless fly gets into the stomach is purely accidental and against such precautions as to make the event entirely unsuspected, and, when the circumstances a minute or so later compel us to suspect such a thing, it is hard to believe that it could have happened. But it has happened and just often enough to furnish proof and confirmation of proof that the stomach can, and that some stomachs always, have a very strong repugnance to flies, and that, although the person does not know a fly has got into his stomach, the stomach does know it, takes cognizance of its presence, stops its normal procedures, calls to its aid all the many muscles employed in emesis and sends up everything in the stomach just to get the fly up. This is not a pleasant detail of our study, but it is of great utilitarian interest. Along with similar experiences involving other objects, it proves

the existence of a gastric intelligence that has dislikes as well as likes, that can refuse as well as choose, that can order a strike and refuse to handle the usual material when an objectionable item, however small and harmless in itself, is present.

You can fool the erring conscious mind but you cannot fool the unerring subconscious mind of which the gastric intelligence is the faculty that attends to selection and digestion of foods. You can fool the palate with materials that are not natural foods, but you cannot fool the stomach, and, if in addition to the dyspeptic reader's own experience further proof were needed, enough other examples to that effect could be supplied. Nor do we fool the subconscious intelligence with drugs for keeping milk sweet and for preserving fruits, vegetables, meats, beverages and for coloring butter. The stomach may not take cognizance, so far as one may know, of the first few times that such unnatural things enter it, but many stomachs will not endure repetition of the trick.

As an example of artificially modified food that is capable of disabling an army more than the powder and lead of the enemy, we may consider beef from which an extract has been taken. An advertisement actually tells us that the extract is pleasant to the taste. No doubt about

that, but the meat is deprived of *its* pleasant taste and anybody can easily detect the fraud. Soldiers and other mastered men will obediently eat it in response to orders, but their stomachs do not recognize and do not submit to the superior authority of the commissary department, which does not yet know that, whereas each one has mind of his own and must mind his own business, the mind of one, the superior, cannot govern the bodily functions of another, the inferior. If the meat of an army be for weeks limited exclusively to such as will have no other fault than that it is robbed of such constituents as the extracted juice will carry away, then the army will meet as bad a fate as its worst enemy could wish. Such meat is not "repeatable"; the men do not want it, do not like it, and their stomachs do not agree on its selection and will not digest it.

Under the influence of learning, that is not science, there is and has been a general disregard of the authority of the subconscious mind in matters of its own concern. Patients have been and are given medicines that they do not want and are denied foods that they do want. That is the way patients are killed. Nearly all of the prostrated dysentery patients of the Spanish-American war in the Philippines were killed that way. Faults of the rations made them sick and the treatment killed them. The merit of the

so-called Christian Science method of treating the sick consists in allowing the subconscious mind to have its own way in its own affairs. Medicines and spoon victuals not wanted are not taken; the food, the rest and the quiet consolation that *are* wanted are received. The source of harm is eliminated, power is supplied by the foods or the fat of the patient, and with it the subconscious mind of the patient, and *nothing* else performs the miracle of restoration. The name is new but not the method, which is the same as has always prevailed among the illiterate poor who look upon a doctor as a luxury only for the rich.

Unsound *brain* in unsound body is the way an ancient saying might read. Conscious mind is incapacitated by illness which involves the brain with the body in general. Even a sick doctor calls in a physician; just as well, since conscious mind has no business with the physical disorder. But the subconscious mind is *not* affected by the illness, and is just as competent as ever, and it is *its* function to direct the disordered affairs of the body and accomplish the restoration.

Neither the mother nor the doctor can choose for and dictate what the child is to eat. The child is a perfectly equipped organism with perfected mind of its own, even if it be subconscious, so constituted that it can and must mind

its own business of its own bodily functions of selection, rejection, etc. It is therefore extremely foolish and fatally wrong to thousands and ruinous to tens of thousands of babies annually to interfere with their own function of rejecting milk and accepting other foods when they want to do so. To partially starve the baby, by refusing it what it wants, is the lesser evil. The one great and fatal error is to insist on continuing milk as a drink and as an adjunct to nearly everything it eats, when the indications clearly show that the baby does not want milk in any way whatever. Many children are found to be taking milk, as such and as a constituent of mixtures, as a matter of obedience,—the parents imposing the same because they *ought to,* according to the consensus of opinion that is most learned and therefore most entitled to respect. The children thus acquire the habit of taking what is given, not calling for what they want, having found that useless.

The child's stomach in many such cases not only refuses to digest the milk or the mixture, but even refuses to supply the gastric juice to sterilize it and save it from spoiling. Thus we have digestive disorder, illness of many, deaths of some. And if death does not occur till nearly five years of age, it is nevertheless due to the disorder that will almost certainly be

found to have had its inception at the weaning time.

We are not concerned with the whole population; we are interested in the health of the babies who object to the arbitrary forcing of milk upon them. These make up a very large sum in the aggregate, and those that suffer and die are of much concern to all the rest of the community. The great number of deaths, the still greater number of chronically dyspeptic survivors, mean danger to young children, and no one knows where the selections of the grim Reaper will fall next. That the harvest of disease and death is preventable, or even reducible, makes the matter worth while as an object of study and action and is our motive for doing so and our apology for agitation.

It is a law of all mammal nature that at the weaning time the use of milk ceases. The enlightened human mother arbitrarily makes an exception and violates that law with the result that many die and a much larger number are poisoned into a state of ill health, ill nature and incompetence, the evil of all which radiates to and affects society about them.

The Health Authorities blame not the dairy itself, but the unclean and fraudulent methods of it, for all the ills and deaths associated with the consumption of milk. Those authorities want

the legislative bodies to prescribe more law for the regulation of dairies. The Rockefeller Institute of Medical Research believes these ills and deaths are due to a microbe and is looking for it; but now, 1908, in the sixth year of its search, has not yet found the right one.

In the home and presence of the patient will be seen the erroneous feeding that I have written of, the plainly evident repugnance to milk which the patient is nevertheless forced to take. However fresh, clean and pure the milk may be, the repugnance is there just the same. The item of filth being eliminated, the illness still persists. *It will also be seen in the home that the child will recover if milk is eliminated absolutely from its diet, proving that milk is the cause.* The stomach does not digest what it does not want. These same facts must, of course, exclude the microbe as the cause of the illness. If such a fatal microbe were colonized in the digestive apparatus of the child, it would be absurd to suppose that it could be extinguished by simply eliminating milk.

The rather artificial health authorities are not able to transmute their legislative ideas into action; so much the better for the still somewhat natural common people; and the Rockefeller Institute of Medical Research is not making any progress in this line either, so far as the

public is aware. What *we* offer in this important matter of Jack McCormick's Disease, is by this time understood, and we want it understood that our method of prevention and cure is a great success and consists only in eliminating what is artificial and restoring what is natural in baby feeding.

In China and Japan the baby gets no milk after weaning. In these countries there is no extraordinary infant mortality. In China, milk from a dairy is popularly believed to be poisonous, and it is not considered safe to use it. When the Chinese venture to use it at all, it is only during cold weather. Of course, I agree that their belief is thoroughly well founded. How much more experience do we need to teach us the same lesson? Japanese children, as seen out-of-doors in Japan, appear physically and morally better and happier than the children of any otherwise civilized country in the world. When the Japanese baby is weaned it eats what its parents eat, so far as such things can be reduced to an eatable condition for a baby. The Chinese and Japanese have no regular dairies and therefore no regular delivery of milk. But they are likely to follow bad examples and try the dairy. Already in Japan an occasional family has its cow, and imported condensed milk can be bought in the more important towns. In their innocence

and with faith in the white man, they employ milk, when obtainable, as an article of diet in cases of sickness. Of course, many patients both here and there recover in spite of milk, but milk also kills many an adult as well as tens of thousands of children. In comparison with the dairy, the brewery and the distillery are very innocent institutions. The Japanese are teaching us by example how to feed armies. They also prove by example that I am right in placing milk out of season and mortality out of season in the relation of cause and effect.

I am supposed to have been writing about the preventable ills of the weaning period. The group of ills consists primarily of a simple digestive disorder with various ills of various names that depend on, or result from, the initial digestive disorder. The most utilitarian view of the group is to regard it as a unit, for the reason that its cause is a unit; namely, the refusal of the digestive apparatus to digest what the subconscious mind does not agree on choosing: milk after weaning, all the worse after having been transported a few hundred miles. Of these ills themselves I have said nothing and mean to say nothing more. Beyond the cause, the study of this polynonimous group of ills, with its impossible classification, has never been and never can be of any utility. The enormous death rates,

in our country in general and in our cities in particular, of children under five years of age, from confessedly preventable diseases, prove the ignorance of the learned ones and the failure of the prevailing methods of treatment and the learning upon which they are based. These death rates also prove the dangerous character of the authoritative literature that instructs physicians to insist on over-confident mothers giving their children milk against their children's will five times daily into the third year of their age and to continue the use of milk still far beyond that age. The luck of the illiterate proves the wisdom and the superiority of the subconscious mind in the affair of food selection in particular and in maternal affairs in general.

The ills that I am writing of and saying so little about are at least well known if not understood. The ills themselves do not need to be understood for any utilitarian reason. They do not need to be treated; they are results and there is no utility in the treatment of results so long as causes are allowed to remain in constant operation. For neglecting these results, which everywhere else receives so much useless attention and fallacious treatment, the reason is that they are self-limited and self-curable disorders; in other words, the subconscious mind of the patient performs the cure, if only the conscious mind of

the doctor, the parent or guardian, will cease to maintain the cause. The cause is the only thing that need concern us and is our sole object of attention. The cure is to be left to the patient's subconscious mind — the nature of the animal — which is part of, and consistent with, great Nature and just as much to be trusted. The only important question concerning these ills is that of their cause. I have supplied the answer and shaped it into the form of instruction with enough varied repetition to produce, as I believe, an impression.

The baby is unsophisticated and is persistently true to Nature, and is not easily diverted to the artificial ways of existence and subsistence that are so fatal to the health and life of the Nation. When it becomes plainly apparent that the baby refuses milk, let us refrain from trying modifications of milk, or other sources or brands; let it be understood that the baby does not want any milk whatever. It must have water to drink, and milk and cream must now be excluded *absolutely* from all its foods. The baby will then need and therefore want and like such natural foods, fresh or in a good state of preservation, as its parents eat, in a simple and unconglomerated state, just as in the case of any other young mammal. Selection of foods for a baby ceases to be a problem, or source of trouble or anxiety,

when the baby is allowed to attend to it himself. Let the mother offer the baby at meal times and at other times such as there is. The baby, if it wants anything, will taste everything and will turn back or away from what it does not want, and will eagerly grab what it does want. The baby's subconscious mind can be absolutely trusted to make no mistake as to quality or quantity so long as what is offered is not affected artificially by conglomeration, or any other unnatural modification except cooking. The subconscious mind, however, cannot be relied on to judge artificial conglomerations and modifications of foods. The baby may accept them and trouble may and often does arise from their ingestion; if not from a first, second or third taking, trouble is extremely likely to arise after a more or less prolonged repetition of the more or less artificially modified food.

The cure of these preventable ills, that begin at or soon after the weaning period, must have already become plainly apparent; but repetition is an essential element of instruction and constitutes the one difference between telling a thing and teaching it. I am not to be understood as encouraging the domestic treatment of real disease, nor the domestic employment of drugs; but these preventable ills are not real diseases, they are only digestive disorders in which the

only danger to life arises from faults in care and treatment, and much more so under professional direction than under the intuitive supervision of the natural, unsophisticated mother. No drugs are involved, and the case and management of the child, even though sick from such disorder, remain properly and naturally within the mother's natural province, and should remain there so long as the medical profession, with its prevailing unnatural and fallacious methods, continues to make such a bad record of fatal results of treatment.

Here in my neighborhood was an example of spontaneous recovery of a baby with only the ministrations of its mother after two physicians had abandoned it as having no hope of recovery. Both the doctors and the mother expected it to die. The emergency developed the heroine; the mother courageously let the baby alone to die in peace, attending only to the simple, natural details of care for the baby's comfort. The baby quickly grew better. The mother relying now only on her inerrant maternal wisdom — the maternal subconscious mind — did only what that wisdom, that intelligence, suggested; all which may be called "nothing," but it was just the perfectly natural and simple way of caring for a sick baby with only digestive disorder and no real disease. The baby was let alone and other-

wise given what it seemed to want and need, and though it would have died under the "most advanced" method of treatment, it got well, just as many an educated white mother's baby in our Southern States has got well under the perfectly natural ministrations of a genuine, unsophisticated, black "mammy."

Interested parties find on inquiry that what a mother has done, in such a case of recovery, consisted of letting the child alone and doing nothing. In the conduct of such a case the illiterate mother succeeds better than the learned mother; but the illiterate mother knows nothing of the sciences involved in the case of her sick baby. Knowing nothing, how could she make any reasonably intelligent and consistent procedure? The study of the human animal and its liabilities is practically infinite, and the little we know of the subject adds little good and, by misunderstanding and misappropriation, much danger to our qualification for conducting the case of a patient. The illiterate mother well knows the one great fundamental fact under the circumstances of the bedside of the patient; that is the fact that she knows nothing and can therefore only and consistently do nothing. But a great restoration takes place and we call it a spontaneous recovery. The recovery is, however, not spontaneous; a real, living and knowing agency conducts the

restoration of order out of disorder and employs power and material for the purpose. That knowing agency is the subconscious mind of the patient, even if it *is* a baby. The material was got, while it was not eating, from its own tissues; the power was got from its own stored fuel. The child diminished in weight while the restoration took place; the loss of weight represented the fuel material that was decomposed to supply the power necessary for the restoration.

There must be a little intelligence in the little caterpillar that performs the wonderful change of organization into that of the butterfly without the aid of any external intelligence. Why should we, then, have any trouble in believing that the subconscious mind can perform the restoration of order out of disorder? And why should we not trust it to do so without interference? It is only the people that are affected with learning, and with a disposition to misappropriate it, that do not so trust in this little detail of Nature to mind its own business. It may not be correct to say it is intelligence that conducts these changes, but the principle is just the same whatever we call it. We may just as well call it a form of energy, correlated with all other forms of energy. I believe that would be correct; it is easier to see that a form of energy could transform an egg into a bird, than it is to see that an

egg has intelligence to conduct the organization. Then, also, energy would be the fitter word to apply to the case of the organization of a bud or a flower. In the case of the subconscious mind, however, I would adhere to the word and the idea of intelligence, admitting that intelligence may be really a form of energy, and that education simply improves the instrumentalities through which this energy operates.

No educated conscious mind of a patient himself, or of a physician, is in any sense a competitor of the subconscious mind of the patient in the matter of his restoration to that physical integrity called health. Therefore we should let the patient alone to be governed by his feelings. That is the patient's wish, unless he is unduly influenced by learning of his own. He has subconscious mind of his own which will insist on attending to all those affairs of the body that are beyond his ken and to the restoration of order within him. Physical disorder is utterly beyond the comprehension of the most learned conscious mind, whether of the patient or the physician. We are to do nothing but supply what the subconscious mind calls for, we attend only to the environment. The illiterate woman is so great a success as a mother that she and her ways might well constitute one of the most utilitarian and vitally important nature studies for the family

physician whose duty it must often be to turn learned women from the artificial to the natural point of view and action in maternal affairs. And I suggest that the most natural and therefore the best objects of such study would be found among the thrifty poor outside of the United States of America, and I think nowhere could better examples be found than in Japan.

We are not looking for trouble in the case of the child who is happy. If it is not happy we are very willing and anxious to remove the cause of its unhappiness and, if practicable, should do so at once, for it is bad policy, from the character development point of view, to allow an unhappy state of mind to persist any longer than we can cut it short by supplying natural demands in regard to food, drink, comfort and toys or other means of occupation.

If the child's trouble amounts to more than a mere unhappiness, if it amounts to real distress and if its tongue is much coated and the color of the tongue is very different from the normal pale red, then we know the child is not well. The fact of its distress prompts us to look for causes. We first investigate as to the condition of the bowel. If the abdomen is tense, tight as a drum, unloading of the rectum has been neglected and needs to be attended to at once. This can gen-

erally be done successfully in two minutes by injecting into the rectum a very little common salt solution, brine. Whether the brine is a little stronger or weaker, warm or cold, makes little difference; whether the quantity is a teaspoonful or a quarter-teaspoonful makes little difference. A little brine put just inside of the rectum is almost certain to cause an unloading and the expulsion of much gas inside of two minutes. In a recently neglected case where the material is unduly hard, this injection may have to be repeated at intervals of half an hour, more or less. The injection should be made with an eighth-ounce hard rubber syringe with straight tip, and the tip should be lubricated for use.

Instead of brine, glycerin will do even better; a half-teaspoonful will be plenty and a quarter-teaspoonful will be enough and just as effective as if a whole teaspoonful were used. For a baby five drops will be plenty. The instrument only holds a teaspoonful. In using glycerin the instrument need not be lubricated by other material. One slight difficulty with glycerin is that the caliber of the nozzle of the instrument is too small to admit of the easy flow of glycerin, which is of a syrupy consistence, especially when fresh and cold. Such injections are very successful; the blockade is, with rare exceptions, only in the rectum, and purgative medicines acting all

along the digestive tract are unnecessary as well as unnatural and possibly harmful.

The constipation, the hard condition of the material in the bowel, is a result, and, after all, this aiding of the bowel by local lubrication and stimulation is merely treating a result and caring for an emergency. At the age of twelve months and for a year or two later, a child ought to have the rectum unloaded twice daily. If that does not occur naturally, it will be easy to make it occur by the aid of a little brine or glycerin as explained. A very convenient thing to know in this connection is, that young children can easily and always be made to unload the rectum early in the forenoon when it is proposed to take them out for the day, on a journey or picnic or visit, and they will then cause their mother no anxiety on this matter during the day away from home.

To cure constipation when it seems to be the chief trouble the child has, let its milk be stopped absolutely; let milk, cream and butter be eliminated from the child's diet. It has passed the weaning stage and does not need milk. Even if it likes milk, the liking is acquired from the habitual use of milk, its selection proceeds from the conscious mind; the want of it is based on the like of it and not on the felt need of it. The gastric intelligence does not call for milk

and does not agree on its selection by the conscious mind. The stomach refuses to digest it and we have then a real digestive disorder with constipation and some slight mental and physical distress as the results. When the bowel acts again unaided and this abstinence has been maintained some weeks, butter may be restored to the child's diet, never to be used oftener than twice daily, because that is the limit of the "repeatability" of butter as established by generations of experience now and long ago formulated into the European family custom of having butter on the table only twice daily. If constipation again follows when butter is resumed, then butter must be stopped, and it will not be worth while to try butter again for months. Any other commonly used fat may be substituted for butter if necessary or desirable. *Pure* olive oil is better and cleaner than butter and, so far as I can learn, people invariably like it on bread. Children are prejudiced by the appearance of the olive oil bottle, but they easily follow example when older members of the family use it first and express signs of being pleased with it.

Milk and cream should not, alone nor mixed with other foods, be given such child again unless it wants them, and not even then unless it can use them without constipation as a result. When milk and cream are to be excluded, it is

generally necessary to explain and repeat that not a drop of these materials is to be allowed in the diet of the patient. By concealing milk, cream or anything the stomach does not want, we may fool the conscious mind as represented by sight, smell and taste, but we do not fool the subconscious mind as represented by the gastric intelligence.

Here in my neighborhood, for example, was a baby, six months and twenty days old, that had been and still was very sick, and under treatment was getting no better. An operation was considered, decided on and appointments for that purpose were about to be made. A trifling event served as cause of change in the conduct of the case. The baby was now let alone. It accepted warm water in plenty and frequently. It refused all offers of milk and other foods until forty-five hours had elapsed; but during this time grew rapidly better, rested and slept better, and the appearance of distress gradually vanished from its face and gave place to an appearance of comfort and well-being. At the end of forty-five hours, from the moment that it was let alone, it tasted and accepted food, a teaspoonful, and a half-teaspoonful more at intervals of about two hours during the day and at longer intervals during the night. At the end of six and a half days from the beginning of this method of treat-

ment, this baby began to eat very heartily, and, though not yet seven months old, ate a somewhat surprising quantity of stewed tomatoes one evening and on the following morning again ate heartily of plain stewed tomatoes.

This baby was now well, just seven days after it very narrowly escaped an operation. It proved to be a success as an omnivorous animal, for it ate of nearly all the foods that its parents ate, so far as these were fresh or in a good state of preservation and could be reduced to a pulp. Beef, potatoes and cereals were, of course, an important share of its diet. It had a decided preference for paste made of the Hawaiian taro root, but it does not follow that all babies must prefer taro,—in fact a neighboring baby did not fancy taro at all. All this time the aforesaid baby was refusing milk, but although it was getting along perfectly, its mother had not yet become reconciled to the necessity, propriety or justice of the baby being deprived, or depriving itself, of milk. Still hoping the baby could some way be induced to take it, she mixed milk with its taro paste one day after the baby had been thriving about two weeks.

We cannot suppose this baby to have had any conscious knowledge of a starchy paste, whether taro or cereal, nor of milk or any other foodstuff. It could, however, by virtue of its con-

scious mind as represented by its sense of taste, select or reject either mush or milk, or both. Both mush and milk being natural foods, provided by Nature, would be consistent with the requirements of the nature of the animal. But the conscious mind, as represented by the sense of taste of this or any other baby of like age, was not competent to take cognizance of the artificial mixture by which this mother attempted to smuggle milk into the stomach of this baby. The baby swallowed the mixture; its sense of taste, the "outside guard" of the stomach, was fooled. But even in such a young baby there is a gastric intelligence, a part or faculty of the fully developed subconscious mind. This gastric intelligence was not and would not be fooled. The baby's stomach sent the mixture right up again. This baby had by force of circumstances been weaned early, and early adopted the diet of its parents; then in about three months still farther followed the example of the rest of the family in particular and of the community in general by using milk regularly and, I am told, successfully.

As the subconscious mind is practically inerrant, does not make mistakes, it can afford to be stubborn and uncompromising. What it determines on seems to be final. When a baby's stomach refuses to digest milk, or any mixture of which

it is a part, we may as well yield; not even to save its life will it digest milk or a mixture thereof. In spite of the spoiling mess that many a milk-fed baby after the weaning time is forced to carry daily, it may live a wretched life and make other lives wretched, or it may die as a result of the irritating and poisonous character of the constantly present products of putrefaction that result from the constantly present milk in its diet which it *will not* digest, nor even sterilize.

Stewed tomatoes were not specified in the instructions given to the mother in the case mentioned, but they were included and were none the less safe for having been got from cans. The instructions were, to offer the baby any and all such ordinary foods as are in common use, fresh or in a good state of preservation, in their simplest, unmixed and unconglomerated states, reduced by cooking and otherwise to conditions requiring no mastication. Many foodstuffs are offered and a few are chosen and these are enough. The mother simply offers, that is her business; the baby selects, that is its exclusive business, and it is perfectly well qualified to attend to it unaided. If the baby is hungry it will taste what is offered, and turn away if it does not want it, or it vigorously grabs the little spoonful if it wants it. In its selection it will

make no mistake so long as only the common "repeatable" foods are offered.

This is common practice based on the common sense that is inherited and constitutional. Both are common among primitive and illiterate mothers and naturally experienced nurses, but they are rare among learned mothers and artificially trained nurses and do not seem to have been considered worthy of space in the books upon which physicians depend for their learning on the subject. A learned woman wondered why common sense is so called when it is in fact so rare. In a state of nature all young mammals adopt the foods of their mothers as gradually as their desire for milk and the milk supply decrease. Selection is the young animal's own business, and it is not influenced in this matter by anything more than the mother's example, and even that does not appear to be necessary. Under domestication, young animals kept apart from their mothers, as calves in separate enclosures, make no mistakes in selection. Our babies, when we give them the opportunities, will display the same inerrant faculty for selection as any other young mammal.

The subconscious mind does not, we have good reasons for believing, share in the illness of the patient, so that even in illness its selections and rejections are just as correct as in health and just

as much to be trusted. A want of an animal in a state of nature, and such the unsophisticated baby or child is, is a perfectly *natural* phenomenon, and is therefore never to be interpreted as calling for anything that is *unnatural,* made so by artificial modification. There is no natural provision of milk for a baby after weaning and the cessation of its mother's supply. The dairy is an artificial contrivance, a repugnant institution, an object of endless complaint and a source of more evil than the distillery and the brewery combined.

To dispense with the dairy absolutely would eliminate almost entirely the ills peculiar to the weaning period and so far reduce infant mortality as to make the periods of infancy and childhood no more dangerous to life than any other time of life. If there is any doubt about this, we have only to point to the Japanese mother in general and to the generally excellent health, vigor and cheerful good temper of the Japanese children, who get no milk beyond the weaning time and who are in no greater danger of disease and death during infancy than at any other time of life.

To kill a mature animal for its meat and other products of utility is perfectly right, natural, necessary and not cruel; but to kill a young calf for the sake of getting its mother's milk, is

an unnatural and unnecessary act of cruelty to the cow. The milk of the distressed cow goes to feed babies. The subtle fault of this milk is known to physicians and mothers, but the milk inspector cannot detect it.

An item of evidence against young calf killing is the fact that, whereas everybody can eat beef more and oftener than any other meat, a great many people cannot succeed in eating veal. The conscious mind may choose veal, or consent to eating it when placed before the person, but in many cases the stomach does not agree on the choice. It would be absurd to say that veal is more difficult of digestion than beef. The subconscious mind, the gastric intelligence, shares in the conscious mind's repugnance to the idea of killing the innocent and immature animal which should rather be raised to maturity and more economically serve more useful purposes. The stomach can, of course, but refuses to digest veal in these cases and the person is made to suffer a penalty for patronizing the unnatural institution of calf killing.

Chapter VI

Sweet Fruits Versus Confections

The Merits of the Natural and the Evils of the Artificial

BEFORE children are more than a very few years old, they will feel an important special need which will move them to express an urgent want that should, in the light of what has been said, be easily understood and provided for. That this want is generally *misunderstood* and *not* rightly provided for, is my reason for this further explanation. This demand of the subconscious mind is now generally misinterpreted and a counterfeit is given to the child instead of the real, natural object that the nature of the animal calls for. The mistake, early begun, encouraged by tradespeople and consented to by parents, is continued through life, and therefore at all times of life we find people liberally patronizing the candy shops trying to satisfy their natural demand for sugar by artificial conglomerations called candies. In regard to this object, sugar, the subconscious mind's call is urgent and persistent, and sugar is one of the most pressing needs of the body. I will show that serious ills are due to lack of

sugar in the patient's diet and that such ills promptly subside when sugar is supplied. I will also show that the gastric intelligence in some cases refuses sugar from the bowl, or at any rate objects to it in such a way that the patient suffers for taking it, and the cases are more numerous in which the patient suffers for eating candies.

The fault in the first place lies in the misinterpretation of the demand. The primitive family had no sugar in a bowl nor any candies. Our longings differ from those of the primitive man, if at all, only in degree but not in kind. He found foods with varying amounts of sugar, some of them as rich in sugar and as sweet as candy itself. He had recourse to these just as we can have. The gastric intelligence agrees on the choice of sweet fruits to the extent that we need them and we actually find that those who suffer for eating sugar, or candies, or sweet pastries, do not suffer when they eat sweet fruits to the extent of their needs. It is a proper cause of complaint against parents generally, that they fail to supply children with sweet fruits and that they erroneously supply the artificial sweets instead, or permit children to supply themselves. We actually find that children who get what sweet fruits they need will not care for candy; the candy-shop has but slight temptation for them. In the child who gets not enough sweet

fruits and is denied sugar and candies, we can demonstrate defects of digestion and of physical maintenance and growth, and we can show by his conduct and his work that the child is mentally and morally defective.

It *never* happens that we acquire digestive disorders from ingesting what we *need,* if the thing be fresh or in a good state of preservation. Whatever we *need* we will also *want* and *like*. The *natural* and only safe basis of the *want* is the *need*. But we want candy because we like it, and on this improper motive we erroneously select candy as the object of our need of sugar as Nature has supplied it in sweet fruits. Quite a list of things erroneously go into the mouth on the mere basis of liking them, and the liking is acquired and is a matter of unnatural habit. Some such things are: artificial conglomerations of real foods, as, for examples, excessively complex soups, stews, gravies, puddings and cakes; that impure, stale and artificially derived fat called butter; milk after the weaning period; also things that are not foods at all, as spices, tea, coffee, alcoholic beverages and tobacco. So far as the ingested materials are concerned as causes of digestive disorders, we can never blame a thing that we wanted because we needed it, but we will always be able to fasten the blame on things that we wanted simply because we liked

them. Most people can without much harm make moderate use of most of the things that go unnaturally into the mouth or stomach; they can at least endure them, keep well in spite of them, or even enjoy them and their effects and thus count them as among the blessings bestowed upon us.

By misinterpretation of our natural want of sugar as it is naturally available, we erroneously choose to take the unnaturally isolated sugar instead of the natural sweet fruits and find that our needs are very well served by the "just as good" and more convenient and cheaper article. The error is only a slight one so far as it concerns people disposed to moderation. Others, however, wanting sugar first because they need it, want it next because they like it and fall into the habit of taking more than enough and oftener than necessary and land in trouble as a result of the excess. A need want is satisfied by that much which fulfils the need, but a like want knows no such limit, because, however much is taken, the like persists, the want continues and the limit of the amount taken is the capacity to take or to endure, where the stomach is leniently submissive to cramming, otherwise the objection of the stomach marks the limit.

It is hard to tell from the need's point of view when one has enough of sugar, but in the case of

the sweet fruits, when the amount taken has fulfilled the need, the want ceases and the feeling of enough is such that it would be difficult to eat more. The mere like of it gets children into the habit of using sugar on all possible occasions and in all possible ways and the maximum possible or permissible amounts. The like bad practice would be impossible with sweet fruits. Sugar is likely to be used twenty-one times a week; sweet fruits are not likely to be used more than seven times a week, and generally people get all the sugar they need by eating sweet fruits three or four times a week. Of sweet fruits people will eat only so much as their need want calls for, and they are not going to have any like wants in regard to them. Sugar in the unnatural condition of isolated purity, we charge with having an alluring quality which induces us to like it to such an extent that we use it far too often and a great deal too much from no other motive than that we like it. Many are the cases, therefore, in which the gastric intelligence has been offended by too much of a good thing and will tolerate no more of it, unless it be after a more or less prolonged interval of abstinence from it.

I will cite some individual cases and some classes of cases from which my views of this matter have been derived.

First.—A boy about ten years of age was so

regularly naughty, disobedient and defiant, as to be a source of much trouble to his mother and the other children of the family, all for no apparent reason. There was nothing suggestive of physical ailment about the boy, and from a knowledge of his parents it was concluded that his meanness was not hereditary, so we determined to suspect some fault among the things that entered his stomach, and began a search in that line. Not at first, but in its turn, sugar from the bowl was eliminated, and thereafter Jack was a good boy. He was allowed then to have and to eat sweet fruits without stint. Naming the insanity of this boy with reference to its cause, what else can we call it but a digestive disorder? His gastric intelligence did not agree on the choice of sugar in the unnatural form of isolated purity, but it does agree on the sweet fruits. His insanity was a result of an erroneous interpretation of his want and the consequent selection of the wrong object,—the thing he *liked* and wanted instead of the thing he *needed* and wanted.

Second.—A boy of ten years, whose bladder had always automatically let go its content during sleep in spite of threats, penalties, doctoring and drugging, was allowed free and unrestrained access to a big box of dates, and astonished all the family by the quantities he ate, which only

showed how urgent was his need of them. But he also astonished his parents by ceasing at once and for good his bad habit of wetting the bed every night. Here was a problem for the physician; the stomach was looked to but there was no digestive disorder apparent, so there was nothing to be eliminated. The question then arising was, is there anything in the food line that the boy needs, wants and is not getting? A ravenous eagerness for sweets was found and at once supplied by a box of dates with free access thereto and with the result mentioned. Had the boy been allowed what was called for by his *wants,* based upon his *needs;* had the wants been interpreted as calling for *natural* objects, a whole lot of trouble and much cruelty would have been averted. This boy's trouble was a result of what we must call a digestive disorder. We could not have found the fault which served as cause, except in the digestive department. He suffered from a need unsupplied while others suffer from a supply not needed.

Third.—A gentleman told me that when he drank coffee at all, it was at noon; that he wanted it and liked it, but only occasionally took a cup and that it was not worth while taking it at all, because it made him "nervous, irritable and savage" and involved him in danger of offending others about the office. He was reminded

that his cup of coffee also contained sugar and that, after all, the circumstantial evidence was as much against the sugar as the coffee. Now he takes coffee without sugar and is convinced that it never was the coffee but always the sugar that did the harm. Supposing this man had been taking his coffee with his usual sugar every day and that he had been daily "nervous, irritable and savage," I should have called him a chronic dyspeptic, even if there were no objective signs of digestive disorder present. And such a chronic dyspeptic, it is plainly evident, can be cured in thirty-six hours. But he would have looked with suspicion on any one who held out such hope, or made such a promise; he would not have employed such a person. Sugar in the artificial state of isolation is habitually kept in reach, is habitually misappropriated to supply a need want and simultaneously used to supply a like want, and for the latter purpose is used far too often, so that as a result the gastric intelligence becomes tired of it, just as the conscious mind becomes tired of and disgusted with things that are repeated too often to the ear, however inoffensive the same things may have been at first, as, for example, whistling, that eternal, infernal, diurnal and nocturnal nuisance and disturbance of the peace. Just what happens in these cases in which defect of digestion is not clearly made out, I cannot

say, but abnormal irritability is a result. To this result, and back of it to sugar, I have no doubt, may be traced domestic discords, incompatibilities, disruptions, divorces, suicides and other tragedies,—a very little unrecognized digestive disorder in the party at fault being at the bottom and beginning of his troubles. The art of food conglomeration has been much advanced, the simple life has been far departed from and the number of restrained insane patients has enormously increased in proportion to population during the second half of the nineteenth century.

Fourth.—A man, aged fifty-three years, had by "constant pain and diarrhea" been reduced in four and a half months from two hundred and ten pounds to one hundred and fifty pounds and seemed destined to die before many days longer. Sugar was eliminated from his diet and he rapidly recovered and lived with good health to the age of seventy-one.

Fifth.—The commonest result of sugar, when the stomach does not agree on its ingestion, is the inflation of the stomach with a tasteless and odorless gas which proceeds from fermenting material in the stomach and causes some distress by its bulk but does not make the patient quite ill.

Sixth.—There occur still other cases in which sugar causes actual painful illness, the description

of which would hardly be successful, as it should be felt or at least seen to be appreciated.

Here, then, are four very different effects of sugar when the stomach does not agree on its ingestion. The physician, who says there are many kinds of dyspepsia, can make out four kinds right here, if he still insists on classifying according to phenomena as seen by the doctor and as felt by the patient; but it is much more convenient, as soon as we find the cause in the case, to classify with reference to the cause, and designate the ills mentioned as only one kind of dyspepsia for the reason that the causes were identical in all.

After citing the foregoing very simple examples of digestive disorder, I would not like to pass on without stating that the whole great subject of digestive disorders, with its curious train of resulting ills, is as simple as the examples cited. We may then dispense with all the great mass of attention—study, work, drugs, big books, apparatus and operations, all which have proved much worse than useless,—and look for causes, all of which are as easy to find and to remove as in the sugar cases cited. Remove such causes and the subconscious mind does all the rest so well, so completely and so promptly as to astonish the observer and suggest talk of the miraculous. To devote any effort to the *treatment* of digestive disorders is just like treating the

results of leaks in the roof. No amount of treatment will *cure* the results in either case, but if the leaks be mended the results will cease to appear.

Candies, being less regularly used than sugar, would seem to be doing less harm in the aggregate, but comparing candy and sugar results in individual cases, the candy would seem to be the worse of the two. Candies, especially fancy candies, are very much artificial, and in proportion to the artificial character of a thing put into the stomach is its capacity for harm.

Results of candy eating are as various and as curious as those of sugar. In two healthy small children of the same family, the same supply of French-mixed candy during the same period of time produced in one a skin disease called "psoriasis"; in the other the result was irritability, ill temper, and defiant disobedience. The evils alluded to do not generally appear as results of using sugar or candy now and then, but in cases of continued and somewhat prolonged repetition they are very likely to occur. Often there is much and prolonged suffering before the cause is found out.

The like want of the unnatural, combined with the need want of the natural, is so dominant as to compel the patient to continue the use of the mistaken objects until he becomes

aware of his misinterpretation of his own nature's demand, and corrects it by abstaining from the unnatural and resorting to the natural—the sweet fruits for the sugar that the need want calls for; or the penalty of suffering is so great as to force him to quit the unnatural and do without the natural object of his need because he does not think of it; in which case he must remain far from well. A very interesting series of cases could be cited showing very troublesome and distressing ills of body and mind in persons who were not getting their needed sugar, all which subsided when they were by instruction and direction induced to resort to sweet fruits.

It is easy enough to see and understand that sugars, as well as starches and fats, are provided by Nature, not in isolated states of purity, but in combination or association with other details, and it is as great Nature presents them that the small nature of the animal needs and wants them. "I thoroughly agree," said Professor E. W. Hilgard of the University of California, "that the appetite for sweets should, whenever possible, be satisfied, not with candy, but with fruits like prunes and raisins."

Sugars, starches and fats are fuel foods; they are ordinarily the sources of all the forms of energy or power that we display, whether it be in work of muscle or brain. But sugar is still

more than a mere item of fuel; there is a most important additional necessity for its constant even if not daily use. The liver needs sugar; the liver makes the bile; the intestine needs the bile for digestion of fats and for disinfection of the bowel's content. When the liver does not get sufficient sugar, there will not be enough bile, which fact can be ascertained by a glance at the material from the bowel, which will be light brown or yellow, whereas that color in all but infants should be brown or dark brown. Without sugar enough there will not be bile enough and the fats will not be economically used up and putrefaction will proceed too far and an excess of gas with an unusually bad odor will be present in the bowel. Constipation also generally accompanies this state of affairs, which again in turn serves as cause for still other ills. This is a condition actually existing in thousands of men, women and children. Many of these cases are especially distinguished by irregularly periodical headaches.

A great many sufferers with their sick headaches, their constipations and their variety of morbid nervous phenomena, are not satisfying their longings in accordance with their own interpretation of them; for they have learned by painful experience that the stomach does not agree on their selections. The very things which

they believe they so much long for make them sick. The stomach *can* digest them now as well as formerly and as well as other stomachs can, but it refuses uncompromisingly to do so. The nature of the animal will be found to be always consistent; it is not true that candies and such like are demanded by it, else the stomach would not refuse them; the conscious mind in these cases misinterprets the demand. Instead of the artificial conglomerates that claim the attention of the sufferer, put before him sweet fruits and it will soon be acknowledged that these are just what was needed. So promptly does a good and happy result follow that it may be said that these fruits constitute the specific remedy in the case, and so they do.

There are many who have been suffering the indescribable agonies of sick headaches since childhood, as long as forty years. The medical profession does not cure them. Here is the one specific remedy, the enduring cure: keep sweet fruits in sight and in reach; guided by feeling only, let the patient eat of them all he wants and as often as he wants them; later on let him be careful not to eat of them unless he wants them. He will not want them every day, but he will need and want them every week in the year.

Give children all the sweet fruits they want and it will alarm many a parent to see the quan-

tities they will at first consume; but this only shows how urgently these children have been needing such fruits. They will eat much smaller quantities each succeeding day, and in two weeks they will need and want sweet fruits not more than a few times a week; but by all means let them have all they want each day. Of course, we all desire to achieve the best possible physical and mental development for our children; we wish to encourage good work and good conduct. Satisfy their actual needs and children will as a rule be well and surprisingly good. Sweet fruits can make great changes for the better in the matter of the health and happiness of a great many homes. Sugar in the form of sweet fruits is simply indispensable; the universal clamoring for candy and its enormous and eager consumption prove this. Any one can readily satisfy himself on this point by giving children all the sweet fruits they want and noting the improvement in them physically, mentally and morally. Let sufficient sweet fruit be supplied and there is an end to the temptation to eat the artificially conglomerated sweets.

In thousands of children, youths and adults, apparently able-bodied, going about their business, we can find in the tongue, skin, stomach and bowel, evidences of ill health, of defective maintenance, and, worst of all, mental ineffi-

ciency bears witness to the fact that their brains share in the general disorder. Faults of complexion, paleness of lips, blackheads, hangnails, early decay of teeth, arrest of development, epilepsy and so on, in learned and well-to-do families, certainly lead to the suspicion that there is much ill feeding, if not under feeding.

The supply of dried sweet fruits in variety for the family at the minimum rate of fifty pounds per year per individual would not involve an extra expense. A small outlay is simply made for the right and natural materials instead of a greater outlay for the wrong and unnatural ones, not to mention further and sometimes enormously greater outlays incidental to the evil results of using the wrong materials. Let those who are looking for a tonic try sweet fruits for the restoration of vigor and cheerful temper. When there is occasion to suspect the liver, sweet fruits may well be resorted to; the liver will then get the sugar it needs. I have met very sensible people who finished complicated meals with the feeling that there was yet something they wanted, a feeling that they could distinguish in themselves any time of day during a period of years. The health in such cases is not right; there are many people in that condition. They want, because they need, sweet fruits; it is news to them to be so informed. They should

keep sweet fruits in reach and eat what and when they want of them. They will find themselves better satisfied thenceforth with meals much less complicated, and they will feel better, happier, and will work more efficiently.

To eat nothing and starve to death is a simple matter, but to be deprived of some one essential and suffer partial starvation, with an inevitable string of ills and a fairly good prospect of a very slow death, is not so simple. Any discussion of the subject would simply result in the conclusion that we must, for the sake of health of body and mind, have everything we really need and want to eat and all we need and want of it and as often as we need and want it. Nothing in Nature is more plainly indicated than the fact that we all want sugar in natural combination as supplied by the sweet fruits.

There are four kinds of sweet fruits conspicuously present and available for selection and still others not so sweet are available. They are not fresh and it is not practicable to have them so, especially in cities, but they are in a perfectly good and natural state of preservation and are thus available and adapted for use to supply our persistent needs the year round.

These four are dates, figs, raisins and prunes. The best of these for the individual is that one which his feeling moves him to prefer, and to

prefer most frequently during the greatest length of time. Briefly, that which is most "repeatable" is the best. One's best is not always another's best; so each one must mind his own business in this matter of selection of sweet fruits, because it is not always practicable to follow the example of another. The individual differences of choice are exceptional, but are numerous enough and important enough to command respect and to serve as cause of trouble when disregarded. It still remains true, however, that there is in general a best sweet fruit.

Dates, two varieties, are by far the most "repeatable" of all the sweet fruits. Generally people easily and soon get tired of figs, prunes and raisins, but the date bears repetition longest and it is a rare exception that one gets tired of it. Dates are "repeatable" more times daily and a greater number of consecutive days than any other sweet fruit that comes in our way. Of course, dates can be dispensed with by us in America, but not without some hardship regardless of any comparison as to costs. We could get along with figs, raisins and prunes, and California might produce the greater part of the four billions of pounds which would be only the actual minimum annual need of the United States. In private practice and in public, so far as this writing may go, we must adhere to our

preference for dates; because they are the best sweet fruit, because they are a great deal cheaper than figs and raisins, and, while no dearer than prunes generally, the date is very much superior and therefore so much the cheaper even at the same price.

The retail prices for dates are generally eight and one-third and twelve and one-half cents per pound, for the two varieties respectively. Of raisins, the producer complains of receiving too little to pay the costs of production, and the retail price for good raisins right here in California—twenty to twenty-five cents per pound—is so high that the great masses of consumers resort to raisins only as a luxury and as rarely as the occurrence of Christmas. We shall be producing dates after a while in the natural and artificial oases of our own deserts, and fig, raisin and prune production will become so adjusted that the producer can produce and the consumer can consume on terms satisfactory to both. The State of California has the qualifications and can develop the capacity to supply the four billions of pounds of dry, assorted sweet fruits annually that the people of the United States so urgently need, instead of the overdone sugar in its artificial state of isolation and the still more artificial and adulterated conglomerations known as confections.

Figs, however good, are generally the least "repeatable" of the sweet fruits; a few pounds at a time for the family at intervals of some weeks are enough. They are not used so much as that, for the reason that the imported figs cost more than twice as much as dates, and the California product, judging it by the share that is left for home consumption, is not uniformly good, or not uniformly well preserved. There is too often a questionable package, or a questionable fig in a package, that is likely to give rise to a dislike and a suspicion of figs in general. There is room for improvement, and it will doubtless take place.

Generally the retail price of prunes is hardly to be complained of, except that the producer has been getting a ruinously small share of it, and we assume that good raisins will soon become available at a fair price in comparison with dates. The supply of dates is not sufficient for American needs; a greater demand for dates would raise the price, while a greater demand for raisins and prunes would stimulate and increase production to an extent that would make them cheaper than at present. Raisins, prunes and figs are destined to be called for in vastly greater quantities from year to year in the immediate future. They serve the sweet-fruit purposes and *can* be produced in this State to such

an extent and at such cost to the consumer as to determine upon their selection to supply the greater share of the demand.

A false alarm about seeds is an excuse some people have for not eating raisins. The alarm is false indeed. It has grown out of suspicion that has no foundation in experience. The grinding of seeds is good exercise for the teeth and jaws; children do not object to seeds; they will have better and more enduring teeth for having used them more severely. It is also good and natural to have coarse materials moving along through the bowel. It is reasonable to suppose that excessive grinding and cooking, and exclusion of the rough constituents of our food materials, have left too little for our digestive apparatus to do, and have thus contributed to their degeneration. When even a very young child swallows a prune stone, there will be no cause for alarm; the stone that will slip into the stomach so easily will pass out of the bowel quite as easily. The seeds and stones are indigestible, of course, but it is *never* the indigestible material that does any harm. It is the materials that spoil, the products of fermentative and putrefactive changes, that do the harm. The seeds and stones will not behave that way.

To cook prunes, rinse them off with cold water; leave them in a saucepan to soak a night

or half-day just barely covered with water, then let them come slowly up to the boiling heat and they are done. Cook only what you can use the same day; no regular consumer wants prunes two days in succession; prunes are not "repeatable" to that extent. Never add sugar nor any flavoring matters to prunes. Prunes are a Nature's combination which no cook can improve upon. Attempts to improve them will only result in a mixture that the stomach may not agree to and which at any rate is not so "repeatable" as prunes pure and simple.

Chapter VII

Some Failures at School

Why They Occur and How
They May be Avoided

THE functions of human power and the endurance of human instrumentalities concern the mother again in relation to school work of her children, and it is undoubtedly our duty to use this present opportunity to discuss this matter, which in respect of vital importance is quite equal to any subject that we have gone over.

From the *Journal of the American Medical Association,* 1906, is quoted as follows: "As the end of the school year approached, the newspapers brought the usual crop of sad stories with regard to children on whose developing mental faculties the pressure of school work had made serious havoc. At the end of May there began to be occasional reports of children disappearing from their homes, running away from school, and otherwise making themselves subjects for newspaper comment more than at any season of the year. During June the stories of children, especially girls, who were noted for acting queerly as the result of overwork at school, be-

came more frequent. Toward the end of the month there were a few reported suicides. In most of the cases a direct connection between worry over school work, competition for prizes and preparation for examinations could be traced."

This quoted statement defines premises with which we have been familiar without understanding, of which we have knowledge but not sufficient for transmutation to action; yet there is, perhaps, no lesson of vital importance, derived from the experience of others before us and around us, that we so much need to learn as that which is available from the statement quoted. The writer quoted makes liberal allowance for sensational exaggeration of such accounts by the newspapers; but no such allowance need be made; exaggerated accounts of the few cases do not begin to compensate for the vastly greater number of unmentioned instances of slight damage to children from the same causes, but which are not sensational enough for publication. The trouble as a whole could hardly be exaggerated. For one such case published, I have no doubt there are fifty others that would appear of no consequence to the general public. The case of the little harm, however, differs only in degree from the case of irreparable ruin, and to give a mere passing glance at the few cases that attain

to public notoriety, is not giving heed to the signs of a really prevalent and wide-spread danger.

"It seems to be the effort from primary grade to university to crowd the child's brain to the utmost, and each year we see wrecks, mental and physical, leaving our schools." I would not agree, however, that "medical inspectors should be a part of our school organizations." Medical men are not qualified to avert the evils that we are considering, and, when the damage appears, the case naturally falls to the care of a physician of the family's own choosing. The cases do not need to be discovered, they merge into view spontaneously. The first signs are observable to parents and teachers. I would agree on instruction of teachers, normal-school classes, and on open discussions in school-board meetings and in the public press. The political contingent of the medical profession is more than willing to encroach upon the private affairs of the home to an extent that would leave us very little to say on matters that can never be anything else than our own exclusive business.

We may admit that some of the victims of the strain and stress of competitive school work are not in robust health, that they are survivors of the ills of the weaning period and of the infant-feeding period, still so much the worse for

having been sick during those periods and destined to constitute a large share of the mentally and bodily invalid population and also a large share of that one-third of the population that is of no account; but I do not believe that these, of defective health in the first place, form more than a small share of those whose failure at school is attended by mental disaster. Of course, at the time of the breakdown, the victim's appearance is suggestive of ill health, but not suggestive of the robust health that we know most of such children to have enjoyed at the beginning of the stress and strain—so far as individual observation and inquiry can determine.

A little tot is well, bright and happy, and is doing well the little work that is allotted to the child of average ability at her age at school. The mother's pride in her child then tempts her to induce the child to do still more, still better and to be busier. If the mother talks much and speedily, and continually engages the child in talk and thought, so much the worse. Talk and thought involve mental effort, use and wear and strain of instrumentalities and appropriation of power; all of which can be easily carried on to excess, especially in the case of the lone child that is mostly denied the more natural, better and easier occupation of association and play with other children of its own natural selection.

And this child is still a mere tot when music is imposed on it. Some young music-teacher would like to have her for a pupil, thinks she is old enough, has others younger than she, and, besides, the younger she begins the better the chances for future excellence in the art. The mother believes, allows and encourages both teacher and child, and now some half-hours of each week are appropriated to instruction and practice. An experienced music-teacher tells me that she does not take little tots as pupils; they do no good, she says. But whether they make progress or not, so long as they try, it costs just as much power and wear of instrumentalities to fail as it does to succeed, and disappointment and failure militate against health and happiness much more than success, and more so in children than in adults. Compulsory study of music, in advance of qualification for it, is most likely to disgust the child with the undertaking and insure its failure in that line, even though it might at a later age under proper circumstances have done very well with music.

Supposing, however, that a child *does* for a while succeed with music and *does* work at it somewhat willingly, then its school work will fail to show good results and it will lose interest and pleasure in the same. Even if for some months the child succeeds fairly well with both

the proper school work and the improperly extra work of music, it must then certainly follow that the child's health will fail. So long as the child is cheerful and its mental undertakings are progressing fairly well, its digestion must be considered fairly good; for when digestion is defective, conduct and work become defective as results of suffering and diminution of power derived from foods. Digestion being good and overtime work continuing, maintenance must become defective. Overtime work is that which is in excess of the capacity of the working instrumentalities to endure, or in excess of the power present and available for work. If the work is in excess of the capacity of the working instrument, then so much the worse for the instrument — the brain in these cases. If the work is in excess of the power available for that purpose, then power for work may still be had by diverting it from some other uses. Extraordinary demand for power often causes diversion of that power which serves the purposes of digestion. Digestion then fails more or less completely, and overtime work is the cause of digestive disorder in such cases. In other cases, like the one we are considering, digestion remaining normal, the overdraught of power is derived from the child's power-storage battery, its fat. The child must therefore grow

thinner and display signs of defective maintenance.

The child is supposed to be growing, and growth is a process of building and can never under any circumstances proceed except at the expense of power and plenty of it. But overtime work can and does easily divert that power which is present and available for growth, and appropriate it, but only to the detriment of necessary growth. That is why so often the overworked child does not grow as it is expected to. The arrest of growth and development, by diversion of the power for that purpose to overtime work, may be temporary and may be compensated for by unusually rapid growth at another time. Overtime work, by its overdraught on the common stock of power, is responsible for the failure of another very important function already alluded to, the general function of maintenance of that normal physical integrity called health. In this condition the child *appears* well and *is* well, with every organ of body and mind in normal condition of working efficiency, which is not the case when maintenance is defective; for then, although the child may eat well, digest well and do all the allotted work well, it does not *appear* well, and some special defects may be observed to have occured in the condition of its teeth, nails and skin and often in its conduct.

A growing girl under stress and strain of school work, plus extras, is very likely to be difficult to get along with at home. "We can hardly live in the same house with her," is the remark that came from a very good mother in such a case.

A commonly prevalent way of insuring failure in music, or other like extra, is to begin the systematic study and persistent practice of it at the early age of incompetence. If the child does nevertheless succeed with the extra, it must fail in some other respect. The danger from mental strain and stress is greatest in cases of children who are the brightest and most willing workers; these are the ones that are most likely to be applauded and stimulated to do still better. A girl is full grown at sixteen, seventeen or eighteen, and will then have the qualification to understand and appreciate, and the power to try for, achievement in music, and will succeed all the better for having previously made no effort in this line excepting that which has been required of her in the little rudimentary study of music in the public school which has introduced and interested her in the subject. The time to begin music is when the learner wants to begin and continue its study and practice. With many the time never comes, and these would do no good with the opportunity anyway.

The public school dispenses a little instruction

in music. Even though a child has *time* for more and extra music, it has not the *power* for more, and its mental instrumentalities, its brain, will not endure the additional wear and strain of more study and practice. In its allotment of work, the public school reckons on the pupil of average ability, of average strength of instrumentalities and of average power to operate these instrumentalities. This allotment should always be open to criticism, should be passed on by disinterested judges rather than by those who have something to teach and want to be employed in teaching it. When the allotment of school work is about right, it will be easy for the strong, hard for the weak, and for the average pupil it will be such that he or she does the work reasonably well without arrest of development or incurring any defect of health or conduct.

According to the public school scheme in California, there are eight years to be spent in the primary and grammar schools, four years in the high school and four years in the university. From the age of fourteen to twenty-two—from the entrance to the high school to the exit from the university—the girl does all the mental work that the boy does, and it may be admitted that she does it just as well. The girl, however, in comparison with the boy at this time of

life, is a smaller and weaker instrument of labor, and must therefore work harder, must endure greater strain and stress to keep even with the boy. The girl has a smaller digestive apparatus, eats less and develops less power and has less for working purposes than the boy. In the case of the boy after his growth is complete, there are no extraordinary functions requiring any share of his power, and no other occupation, or affinity, or inclination, to divert either power or attention from his work. He is not missing nor neglecting nor sacrificing anything, and he gets through college just as big, strong and as well as he would have emerged from eight years' service in any other occupation.

A girl during these eight years has an extra function to be maintained and special organs to be developed at the expense of much of her power. She has a love of home, and, unless she makes up her mind to abandon it and with it to abandon her natural and only ultimately happy sphere, she must cultivate that love of home and develop it into a familiarity with all the details of its maintenance and love of all its contents, associations and environments. The prime requisite is character, to be really a gentleman and really a lady. In the case of the lady it is demanded, and she uses much diligence to comply with the demand, that she appear her

best and dress her best, consistently with good judgment which she must possess. She is under an eternal obligation to be charming. The eight years of strain, stress and anxiety of mental work on time and under orders, in the case of the average well-prepared girl at this formative time of life, may not be at all in excess of what her brain as an instrument of labor can endure; but the amount of *power* which the schedule of work under domination involves, which *must* be expended for the achievement, is more than is naturally appropriated for this extremely artificial purpose. The work is done and well done, but at what cost? Power for this *artificial* purpose is *diverted* from *natural* purposes, which therefore fail more or less completely. Among the results there is disorder of the girl's peculiar function; there is constipation, for even the bowel requires power for its operation; there is defective digestion, and defective maintenance which can be perceived at a glance and tells what a sacrifice this higher coeducation costs the young woman.

She has little time and less power to develop her natural love of home into any intimacy with the details of its maintenance, into any attachment for its contents, its associations, its environments or memories. For eight years the young lady *hurries* to and from school, the grace of

carriage fails to be acquired, yields to the hurry habit; her hair might be done up more neatly; there is room for dressing more becomingly and in better taste, but there is not time, or, being "dead tired," there is no power. The taste for personal appearance is so long neglected that it is lost never to be regained; or, if there still remains the desire to appear her best, she has neglected to acquire the art of materializing that laudable desire. Her voice has the capacity for development to an extent which alone would make her charming; but that also must yield to the pursuit of the prescribed work that the men do. Finally, she interests but she does not inspire; she commands respect but not admiration. Her speech is hurried and her delivery lacks grace, elegance and ease, and her neglected voice is hopelessly and forever out of tune. We are much interested in what she knows and can do, but we are not interested in what she is.

The eight years of almost complete diversion of time, attention and effort *from* home, and a few more years in some professional or official pursuit, spoil a woman for woman's place in the home. Of such a woman it may be foretold that she will not be a success as a housekeeper, wife or mother; the home of her married life is the abode of the ills that I have attempted to explain. The misery brought by these ills will

more than balance what happiness prevails within the walls of such a home. It was, for example, in such a home, abounding in wealth, learning and piety, that a son and daughter died in infancy and the surviving child was raised and educated to the highest possible conventional degree of excellence and ill health, and then committed suicide. And this is just one real example of many tragedies that are all of a kind, differing only in detail and degree.

The young woman who ventures alongside of the young man in the higher coeducational institution of learning, does all the work *he* does, settles in *his* sphere, fails in it and in her own also, and is in the end unnatural, unwell, more or less helpless and unhappy. The American learned wife and mother who continues her pursuit of learning incompatibly with her duties at home, is a shining bad example, a fallacious ideal, for the younger women of doubtful ambition to look to.

The education of women for their natural sphere is just as necessary as the education of men for their sphere, but the one differs very much from the other even if there is much in common. Judged by the outcome, a woman in a school adapted for men is just as absurd and impracticable as a man would be in a school adapted for women. The tree is judged by its

fruits, the workman by his work, and we may judge schools by the people who have emerged from them.

Professor Dr. Emil Reich seems to have studied the relations of husband and wife, in regard to the affairs of each, in at least several European countries. He considers the Englishwoman the most beautiful and clever woman in the world. Other observers generally agree with him. So much for the home, the school and the environment in which she grew and was cultivated. "Yet with all her charms," says the Professor, "she has less influence over men than any other whom I know. With beauty to attract and with brains to enliven she is only a figurehead in the social scheme of British life."

The Englishwoman is a modest, quiet, shining light, emitting powerfully effective rays of influence that the utilitarian Professor did not take account of and the silent effects of which he must have failed to observe. The Englishwoman attends diligently and personally to her home and children, the *effect* of which is the influence that tends to make her daughters like herself and her sons lovers of home and founders of homes like home. Only a figurehead? A woman's functions are, *to be* and *to do*. She may not have opportunities for doing much, but there is no excuse for a physically beautiful woman

being anything less than simply great, and it is by virtue of this that she is what the Professor concedes, and she certainly emits an influence proportional to what she *is,* not proportional to what she does.

"And worst of all," continues the Professor, "she does not demand to share her husband's work." The Englishwoman has quite enough to do in the sphere of her home, first with her mother, then in the home of her own. Even if she has time to share her husband's work, she has not the proper instrumentalities and has not the power. She has not the qualifications for men's work; she had not the capacity for acquiring such qualifications; she is not built for or adapted to men's work. Had such qualification been attempted, it would have been at the sacrifice of all that makes her charming and with the certainty of failure in both the husband's sphere and in her own. The Englishwoman minds her own business,—that alone is an item in her list of charms. In her own business she does wonderfully well, she would only lose by trying to do more.

A great many commercially inclined people agree with the Professor that "a woman's duty does not begin and end in being a good housewife and a faithful mother." A great many people will also agree that, when she gets into the

position of wife and mother, her duties certainly *do* end in that sphere—the only natural, the fittest, the happiest, the most fruitful, the most efficiently influential to the widest extent and greatest length of time.

In the English home, the English Church and in the English young ladies' school, by processes of cultivation as well as education, by the natural, agreeable and alluring method of example more than by the artificial method of precept, without strain or stress or hurry or any danger of sacrifice of health, the Englishwoman acquires that excellence of manners, voice, diction; that exquisite grace of carriage, movement and speech; that simple artistic taste in dress and adornment, and that little learning, that constitute her "the most beautiful and clever woman in the world." But the Professor, who sees this intrinsic merit and is evidently inspired by it and is so far influenced as to publish this statement to the world, fails to see that such women *must* inspire their husbands, their children, the community and the nation and the world, for the Englishwoman is the wonder of the world of women.

And yet the English girl, considered as raw material, is not pretty at all; the marvelous effect is all achieved by a well-adapted system of education and cultivation compatible with the

nature of woman, her health and her sphere. The Englishwoman, after all, is not our chief concern; I only mean to suggest inspection of the means by which she achieves her excellence and retains her health.

The published obituary does not generally state that a premature death was due to strain and stress of mental effort, nor does the death certificate mention such primary cause; but one can see from such accounts that the mental effort of the child's occupation was unnatural and excessive and must have reduced it to a condition in which it became an easy non-resisting prey to disease. A boy fourteen years of age dies, and is referred to as having been "an unusually bright boy." But it must have cost the boy a tremendous amount of premature effort to become so bright.

In the obituary of a girl eleven years of age, I read as follows: "Although young in years, the little girl was one of the brightest pupils in her class in school. She was an accomplished musician and displayed unusual oratorical ability. Her ability as a musician gained her a host of admiring friends, both in Berkeley and in Oakland, where she had given numerous recitals." Accomplished musician, unusual oratorical ability, had given numerous recitals, eleven years of age and doing the regular allotment of school

work to the highest degree of efficiency, therein lay the primary cause of death, and it matters little what may have been the last straw or the immediate cause. The human brain at eleven years of age cannot endure so much work, and the human digestive apparatus at eleven years of age does not develop power enough to do the work involved in so much achievement of such excellence.

It was announced that the children of a kindergarten would give an exhibition of their work and how it was performed, that the entertainment would include several instrumental and vocal selections, and would begin at half past seven in the evening, and that following the exercises light refreshments would be served,—evidently a long program, to end at a late hour for children so young. How much the showing and explaining of the work and of the instrumental and vocal selections the little children of five and six years of age were to do, I do not know, but to be called on for anything of the kind in this formal public manner at a time of day when they should naturally and necessarily be going to bed, is subjecting their delicate mental instruments very prematurely to unnatural tension and strain and at the time of day when children are tired. And if the children were to remain to the end of the show, including the light

refreshments, they must have been kept up to a very late hour, considering their ages, and they must have taken their light refreshments at a time when they were most exhausted and could hardly be expected to have power to digest said refreshments, which would then lie in their stomachs, spoil more or less and serve as cause for a restless night.

These little children and their achievements and their newest clothes were on exhibition. They performed and did their best, with *all* their might, under the disadvantage of the lime-light situation. At the fag-end of the day they were tired by the day's ordinary doings; they were then made overtired by the preparations for the evening; then at a point worse than the fag-end of the day, in the night, with power exhausted, the reserve of the storage battery already drawn upon under the spurs of the lime-light stimulation, they now, late at night, stimulated by insistence and the extraordinary character of the refreshments, take into their stomachs a conglomerate mess, more or less artificial, for the digestion of which there is now no power remaining and now no stimulus to make the storage battery of fat yield power to digest this unnatural and untimely mess. Not even the sterilizing gastric juice is supplied; even that little detail cannot be performed without power.

So the mess lies unsterilized in the stomach, free to ferment; and whatever microbian life may have lodged on these refreshments, from the second-hand air of the crowd, is free not only to multiply itself by two every twenty minutes, but is also free to pass on into the intestine, still increasing, and from there invade and colonize many parts and almost any part of the body.

The stomach is a comparatively safe place into which to receive microbian life regardless of the variety, so long as there is a normal supply of gastric juice to make its destruction sure. But gastric juice is not produced by perpetual motion; it requires real power to produce it, and therefore *all* one's might should not be appropriated for other purposes *all* the time, else there is no power for gastric juice nor for digestion. The power of resistance to disease must often mean the power to supply gastric juice. For this unnatural and perilous usage of children both teacher and parents are to blame, but the child suffers the penalty. There are days enough and long enough for all such public exhibitions and juvenile tryouts, and the resort to night times is not necessary. Parents, of course, mean well, are consciously guilty of no greater sin, perhaps, than pride in their children's progress and achievements, which is no sin at all until it is allowed to materialize so far as to endanger the

child's health. When death ensues, some disease is mentioned as having been the cause, but no mention is made of the cause which so far wrecked the child, brain and body, as to leave it an easy prey to the illness which served as the immediate cause of death.

"Little eight-year-old Gladys Bennett, who was called the child prima donna, and who was an infant prodigy from the days of her babyhood, will no more thrill applausive audiences with her renderings of music by the world's greatest composers, with voice and violin." "While other children less nervous, less sensitive, than frail little Gladys Bennett, were playing in the fresh air and invigorating sunshine, she, cloistered within doors, was striving to draw from the strings of her violin strains of music which would have taxed the strength of an experienced and hardened virtuoso." These two paragraphs I have copied from the San Francisco *Examiner,* September 8, 1905. The original consisted of more than a column, large display headings and a picture. Each generation of mothers has about the same lessons to learn. Here was an opportunity to learn a very useful lesson from the very sad example and experience of another. One such example, one such lesson in display type and a picture, is certainly enough to serve the purpose of instruction. But instruc-

tion without repetition of instruction generally fails to make an impression. So even if their mothers do remember the case of Gladys Bennett, the coming infant musical and otherwise favored prodigies will still continue to be in danger of the unnatural, extraordinary and prolonged mental strains that their mothers are yet likely to urge upon them while yet in their tenderest years.

The newspaper accounts of the disastrous mistakes of some people serve the extremely useful purpose of warning to other people who are in danger of making like mistakes; that is, if the real moral of the example is perceived, or the true conclusion of the account is understood. Unfortunately, the real merit of the example and the account is concealed more or less completely by the alleged immediate cause of death. The immediate cause is required in the certificate of death, and this is what the public takes cognizance of. The public will generally overlook the real primary cause of death; it will generally fail to see that the overtime work, the excessive strain of over-stimulated effort at an unnatural occupation, at an untimely season of life, at an immature and incompetent age, so nearly killed the subject that she falls an easy prey to the illness which served as the last straw. Such last straw is not always necessary; overtime work

alone has killed and half-killed, paralyzed, many adults that I know of even in my small field of observation. In the examples mentioned, our evil subject assumed gigantic proportions and did its extremely cruel worst. For one such extreme case of premature, prolonged and fast driving of children, there are fifty others in which the harm done appears so slight that the real evil is hardly recognized at all; it is almost always occluded by a digestive or "nervous" disorder that appears as a first result of the evil we are considering. Treatment is erroneously and fruitlessly directed to this result, this digestive disorder, constipation, irritability, epilepsy and so on. Bright, speedy and ambitious children with ambitious parents are most in peril.

The dull, slow, stubborn child is safe; the subconscious mind in his case insists on minding its own business. Feeling governs in his case, and the child is simply loyal to his own inerrant nature. So persistently true to himself is he that he will not yield to any attempt to make him work at a speed which exceeds his adaptation, or to an extent which exceeds his available power, or which exceeds the capacity of his instrumentalities to endure. Nature in him will attend to the child *first,* its digestion, its maintenance, its growth and development; after these are provided for, the child will do what is required to

the extent of power present and available. Such a boy or girl may not be regarded as a "promising" one, but, given only the conditions for good health, he or she is most likely to be a most useful member of the community when the working time of life has come.

While the pursuit of learning at school has grown to be comparatively easy, nevertheless the amount of work allotted and adapted to the average learner of average ability is such as to require, if well done, about all the strain that his brain can safely endure and about all the power that he can appropriate to such purpose. Any additional work, therefore, of mind or muscle, is overwork or overtime work. There are many inconspicuous but commonly observed cases of failure at school under favorable conditions of good health and care. In such cases it will be found that the child's power is diverted to, and its brain is being used for, other purposes in addition to its school work. A boy fails to hold his place with his class, and it is found that in accordance with his parents' will, and somewhat against his own, he is taking violin lessons and spending much time and power in practice while other boys are out playing or doing nothing but just resting from school work, and growing.

Another boy is found to be prematurely sharing the white man's burden of disseminating

intelligence by distributing newspapers: a good scheme for an old enough boy in the case of an evening paper; but in the case of a morning paper, the boy's very necessary sleep is reduced an hour or two, which in a year amounts to a sufficient shortage to account for some arrest of development. He must entertain some nightly anxiety in regard to the certainty of early rising, and is therefore already nursing the anxiety habit. He hurries off to the base of supplies at twice the speed and four times the power of his normal rate of movement. He is expected to hurry until the last of his customers has been served, and he is thus early initiated into the hurry habit. If he had breakfast before starting, it was too early for an appetite, and after eating, when much power was required for digestion, he drew upon his power to the maximum possible extent in making his hurried rounds. If he did not eat before starting, he now hurries home, arriving rather late for finding the family breakfast at its best, and by nine o'clock he takes his seat in school a little tired and sleepy and is not going to do his work as well and as cheerfully as if that work were his exclusive business. Now he is by the circumstances of the case forced into the bad habit of being content with work that is short of being well done.

The school work is already so much that if

well done, there remains scant enough power for growth and the minimum recreation necessary to growth and the happy disposition he has and will need through life. To get along poorly at school takes the pleasure out of the boy's school-going occupation and serves as the first step toward quitting school in favor of some wage-earning occupation. This is no misfortune, for in connection with an occupation, or simultaneously with the pursuit of it, he can acquire learning and experience that will constitute a good education. With health, integrity, ability and industry, a boy will prosper beyond all reasonable expectation, whether he go through college or not. The boy who goes through school and college overworked and underfed and with all possible self-denial generally, will be physically and mentally tired in the end, and will at best only drift into a position of mediocrity with small chances for promotion.

Girls are less capable of enduring extra mental work than boys. Nature has imposed upon girls a function which is so exhaustive of power as to leave them not enough to compete with boys during the high-school age. If the girl insists on doing the allotted work of the high school and of the college for boys, she can do it, but it seems that the performance is likely to determine her future sterility. The reason seems to be that

the power which was naturally provided, was present and available for development of the reproductive organs, was diverted during the eight years of this educational undertaking to the strenuous mental work thereof. This undertaking by the average girl requires so nearly *all* her might, so nearly *all* her power, as to leave too little power for the completion of her development. She is likely to fail in her function of reproduction, because her organs of reproduction are defective in development and therefore incompetent.

Study must be rated as purely original mental work, and, as already explained, an hour of such work costs as much power as two and a half hours of hard manual labor. Three hours a day, five days a week, actually applied to study, would tax the public high-school pupil quite enough, and four hours a day for state-college study, seems to me, would be the average safe maximum limit. Study in excess is overtime work. All night work in addition to day work is overtime work. The day is long enough, night work is unnatural. Those who work at night are less efficient in the day and are as a rule poor sleepers, oversensitive, irritable and dyspeptic; the net results show that it does not pay in the case of man, woman or child. Everybody knows it does not pay in the case of the domestic animal.

If a girl is to be qualified for success in the maintenance of a happy home of her own, she must devote time, interest, effort and power, by the side of her mother, to the affairs of home. If she is to have a natural woman's regard for her own personal appearance, she must devote time, interest, effort and power to the arts involved in the making of her clothes, the care of her hair, the cultivation of her voice and her manners generally. When a girl gives a minimum of working attention to this much, the present excessive public-school requirement will be even more than she can well attend to besides. Music in addition cannot be taken seriously without failure in school work, or failure of health or of growth, and physical, mental and moral development. The work in the public high school is, I am sure, too much for the average girl. When we shall have separate high schools for girls, the governing boards may see the wisdom of requiring much less work of girls and perhaps of a somewhat different and less strenuous character, and allowing some time for music and for those home and personal details which make the less learned Englishwoman much more charming than the more learned American woman. Precept is artificial, ineffective and not impressive. Example is natural, impressive and effective in the training of girls

in those matters that are to develop them into fine women. Teachers of girls, therefore, ought to be good, healthy examples of all that a girl aspires to in the way of personal improvement.