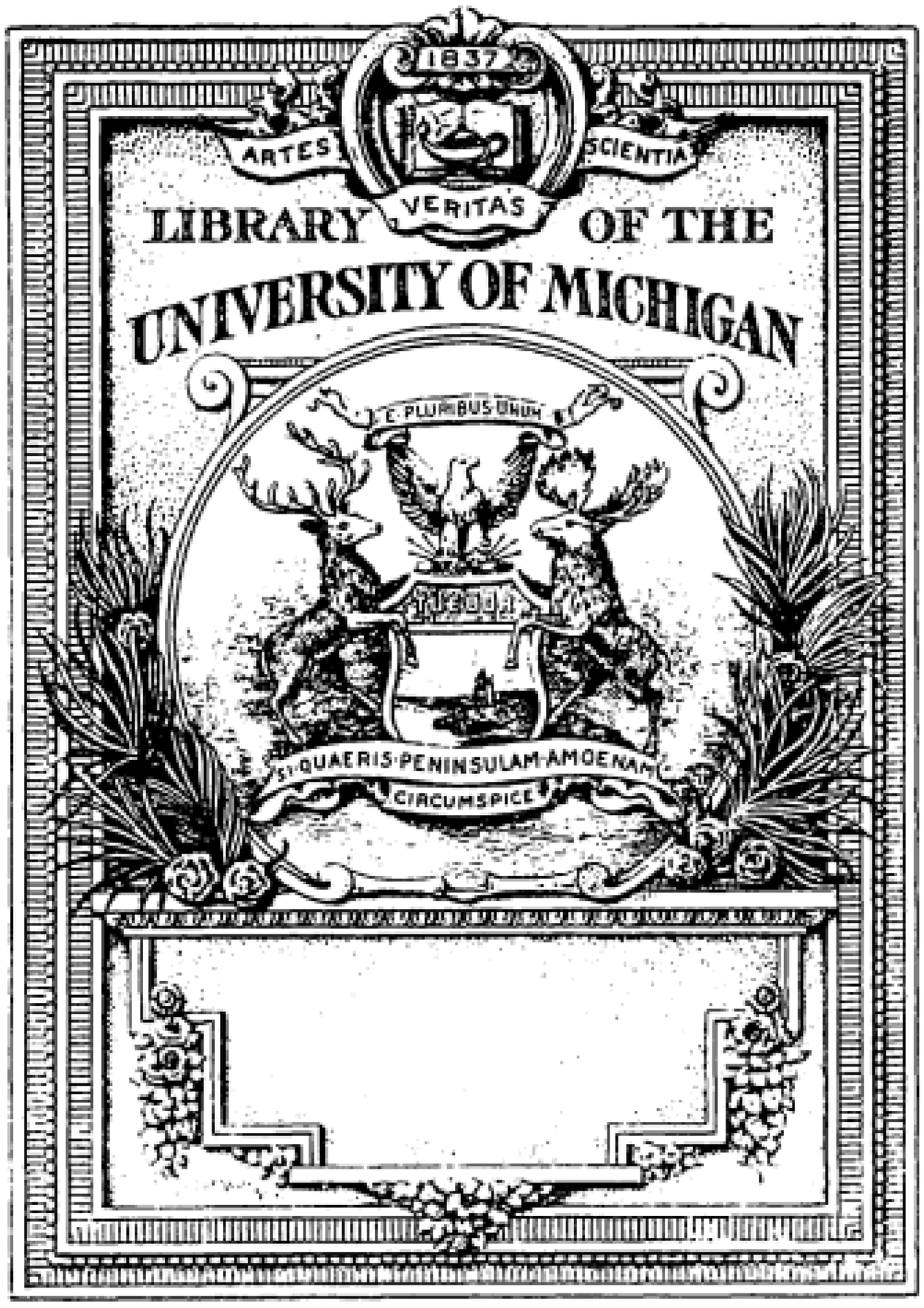
A 574631

H 610.2
R 71h

Digitized by
UNIVERSITY OF MICHIGAN

Original from
UNIVERSITY OF MICHIGAN

50




Digitized by
UNIVERSITY OF MICHIGAN

Original from
UNIVERSITY OF MICHIGAN

N610.2
R91h

Prewer Smith

Teaching Pt. Pleasant

dec. 1870

Digitized by
UNIVERSITY OF MICHIGAN

Original from
UNIVERSITY OF MICHIGAN

Digitized by
UNIVERSITY OF MICHIGAN

Original from
UNIVERSITY OF MICHIGAN

THE

# HOMŒOPATHIC VADE MECUM

OF MODERN

# MEDICINE AND SURGERY.

Digitized by
UNIVERSITY OF MICHIGAN

Original from
UNIVERSITY OF MICHIGAN

## FROM REVIEWS OF THE "VADE MECUM."

"Homœopathy is now acknowledged in quarters where it was once ignored, and many who, like the author of this compendium, graduated under allopathic auspices, have since recognised the superiority of this philosophic school of medicine. We must confess to having studied this 'Vade Mecum' with deep interest. It is written in a scholarly and lucid style, and great pains have evidently been bestowed upon its preparation. From preface to index it wears the aspect of a text-book suited alike to the professional student, the clergyman of a parish, and the head of a family. Encouraged by the success which has attended previous efforts in the same field, Dr. Ruddock now essays the bolder enterprize of endeavouring to furnish a consecutive, and, we may add, complete view of modern medicine and surgery. The several functions of the body are familiarly explained, and 'the ills that flesh is heir to' are carefully enumerated. Diagnosis is, however, wisely supplemented by medical instruction how to proceed in the absence of a duly qualified practitioner, or in cases of emergency. Indeed, one could scarcely desire a more convenient book of reference for the library table or travelling chest. For missionaries we should think it will be found especially useful, since they are ofttimes left entirely without the resources so available in our dear native land. The work is printed in clear type, on good paper, and affords unusual facilities for reference."—*Church Standard.*

"It is exceedingly comprehensive. The descriptions of diseases seem to be drawn with much care, and are the result of a large amount of experience and observation; such careful descriptions of the manifestations of various diseases as will enable the reader, professional or otherwise, to identify with certainty those which come under his own observation. We commend the book as a most valuable and useful one."—*The Halifax Courier.*

"The student and the visitor of the sick will find in the work before us a vast fund of useful information—information conveyed in a clear and practical style, by one entitled to speak with authority on the subject. We commend the work to all homœopathists, and to others interested in the subjects of which it treats."—*Morning Advertiser.*

"That there are among the popular guides to homœopathic practice some which are as perfect as, under the condition of non-technicality, they can be, is acknowledged; and it is no slight recommendation to Dr. Ruddock's *Vade Mecum*, to say that, in its order, arrangement, and details, it is equal to the best."—*The Homœopathic Review*, July, 1864.

"The present volume is, throughout, a thoroughly practical work. 'The chapters on the nature and treatment of diseases are the result of many years' close observation and practical application in the two largest hospitals of London—St. Bartholomew's and Guy's—in dispensary practice with other homœopathic medical men, in the consulting room, and at the bedside.' The gentleman who can use such language as this with truth, is not to be shoved aside as an empiric. The work is very comprehensive; in all respects answering to its title. It is calculated to do much good."—*British Standard.*

"The volume is carefully compiled, and evidences the experience which the author has had in the London hospitals."—*The Reader.*

Digitized by
UNIVERSITY OF MICHIGAN
Original from
UNIVERSITY OF MICHIGAN

# THE

# HOMŒOPATHIC VADE MECUM

97211

OF MODERN

# MEDICINE AND SURGERY.

FOR THE USE OF

## JUNIOR PRACTITIONERS, STUDENTS, CLERGYMEN, MISSIONARIES, HEADS OF FAMILIES, ETC.

BY


## E. HARRIS RUDDOCK, M.D.

LICENTIATE OF THE ROYAL COLLEGE OF PHYSICIANS; MEMBER OF THE ROYAL COLLEGE OF SURGEONS; LICENTIATE IN MIDWIFERY, LONDON AND EDINBURGH, ETC. PHYSICIAN TO THE READING AND BERKSHIRE HOMŒOPATHIC DISPENSARY.

*Author of "The Stepping-Stone to Homœopathy and Health," "The Lady's Manual of Homœopathic Treatment," etc. Editor of "The Homœopathic World."*


SECOND EDITION, MUCH IMPROVED AND ENLARGED.


LONDON:

JARROLD AND SONS, 12, PATERNOSTER ROW.

*And all Homœopathic Chemists and Booksellers.*

1867.


Digitized by UNIVERSITY OF MICHIGAN

Original from UNIVERSITY OF MICHIGAN

*Printed by Jarrold and Sons, London Street, Norwich.*

Digitized by
UNIVERSITY OF MICHIGAN

Original from
UNIVERSITY OF MICHIGAN

# PREFACE.

The publication of five editions of "The Stepping-Stone to Homœopathy and Health," comprising forty thousand copies, has materially facilitated the preparation of "The Vade Mecum;"* while an extensive correspondence with many of the readers of the former work has led to a more intimate acquaintance with the requirements of persons consulting a domestic book.

The work, however, is designed, not for domestic use alone, but for junior practitioners also. The author may therefore be permitted to remark, that the chapters on the nature and treatment of disease are the result of many years' close observation and practical application in the two largest hospitals of London *(St. Bartholomew's and Guy's)*, in dispensary practice, in the consulting-room, at the bedside, and in conference with other homœopathic physicians. He therefore presents the work to such, and to all who desire to find the most certain and speedy means of relieving suffering, and of prolonging life, with confidence; and predicts the happiest results whenever the directions of the Manual are faithfully carried out.

Objections have been made to domestic medical works, both on the ground of their danger, and as likely to inter-

* From *Vade*, go, and *mecum*, with me, a Latin phrase applied to a book which a person carries with him for its constant usefulness.

Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN

fere with the legitimate pursuits of the profession. Neither objection is of any force. It is well known that in nearly every family domestic drugs *are* employed—*castor oil*, *Epsom salts*, *rhubarb*, *sulphur*, *magnesia*, *antibilious pills*, and even preparations of *mercury* and *opium*. We are not responsible, therefore, as *originators* of domestic treatment; but finding drugs everywhere in use, we have sought to *reform* the practice by substituting remedies and suggesting measures, whose virtue is that they are not only more *harmless*, but very much more efficacious than those too frequently adopted. Departures from health, at first simple and uncomplicated, frequently occur, the nature of which then is so plain, and the treatment so obvious, that with the guidance of a work like the present, a safe course may be taken. Hence it is that we have made most prominent diseases of common occurrence—cold, fever, dyspepsia, etc., at the early stages of which appropriately selected remedies may be administered with good hope of success, but which, neglected, might lay the foundation of most intractable and fatal maladies.

At the same time, it is proper to add, that in all serious cases, or when the treatment suggested is insufficient quickly to bring about the necessary improvement, professional advice, if possible, should be procured. The vast resources which a professional homœopath has at command, of which the present volume represents but an inconsiderable fraction, should encourage hope in most difficult and complex cases.

The learning of the medical schools is as essential for the general homœopathic practitioner as for the allopathic, and

Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN

cases are of frequent occurrence in which it is impossible to act judiciously without an acquaintance with anatomy, physiology, pathology, surgery, etc. A most obvious advantage, rendering professional treatment when accessible, always preferable, is the one just referred to, namely, the amplitude of the resources at the command of a medical man, including hundreds of remedies, in various forms and attenuations. Successful treatment depends not alone on the choice of the right remedy, but also on its adaptation in form and strength to the age, sex, habits, temperament, or idiosyncrasies of the patient. In this respect, the writer is neither an exclusively high or low dilutionist, ranging his remedies from high attenuations to the strong tincture or trituration, but more frequently preferring the lower forms, as often better adapted to impress the affected tissues, and with little of that risk of aggravating existing symptoms which have been held forth with such exaggerated prominence.

The writer has freely quoted from the works of many of the highest authorities, both in the new and old school of medicine; such quotations are duly acknowledged, although he may have used the illustrations and arguments of writers or lecturers which he has unintentionally omitted to note, and which, as the materials for the work have been in course of preparation for many years, he cannot now supply.

The diseases peculiar to the female sex are not specially considered in this work, for several reasons. 1. The author has already issued a manual on the subject, which has reached a second edition, and been extensively circulated. 2. The subject is one of such amplitude and importance as

Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN

to demand a separate treatise. 3. It is, further, most undesirable to enter into many details, which are necessary to be intelligent and useful, in a work intended for general readers. This consideration alone seems to justify its isolation in a separate form. At the same time, the subject is by no means overlooked in the present work. Much valuable information may be gathered from the "Materia Medica," where, grouped under appropriate sections, it will be readily available.

In conclusion, the author trusts that the contribution he here makes to the knowledge of the laws of *health*, that element in life which is so essential to its happiness and usefulness, may serve as a faithful guide to its *preservation* to the expiration of the "threescore years and ten, or four-score years" span of human life; not merely by avoiding those multiform causes which often *immediately* destroy it, but by raising that health to such a high state of perfection in which, with the blood coursing cheerily through its vessels, firm muscles, well-strung nerves, exuberant spirits, and a mind clear as the light, existence is truly enjoyable, and the duties of life are performed with such vigour and zest, as to invest with a charm what would be, with less exalted health, irksome and disagreeable,—the point of view from which he anticipates the greatest amount of good from his publication.

E. HARRIS RUDDOCK.

12, *Victoria Square, Reading,*
*December*, 1866.

Digitized by UNIVERSITY OF MICHIGAN
Original from UNIVERSITY OF MICHIGAN

# PREFACE TO THE SECOND EDITION.

In this edition every page has been carefully revised, many entirely new sections have been introduced, while extensive additions have been made throughout the work, all of which have a practical bearing.

There are yet, however, many points which we have not been able to include in this edition, the chief of which are the following:—

1. A short description of various remedies found valuable in practice, and occasionally prescribed in the body of the work, but not included in the list, pages 46–7.

2. A chapter on Toxicology.

3. A clinical index.

4. A longer list of medical and surgical diseases.

As time and opportunity permit we shall arrange the materials for these additions, so as to be prepared to publish them when occasion demands.

Digitized by
UNIVERSITY OF MICHIGAN
Original from
UNIVERSITY OF MICHIGAN

# HINTS TO THE READER.

The author earnestly requests attention to the following points:—

I. Persons desirous of being able to exercise the best measures for preventing and removing suffering, should *read this manual through, from the first page to the last*, as many important practical points are scattered through the various sections, but which, to economise space, are not repeated, and so may be lost to those who only read detached portions. Even after reading it through, an occasional half-hour spent in studying the manual will facilitate its consultation in cases of urgency. The *novice* in Homœopathy should first read "The Stepping-Stone to Homœopathy and Health," especially the introductory chapters.

II. When the work is consulted for the treatment of any particular affection, the *whole* section devoted to it should be studied—the symptoms, causes, medicines, and accessory means—before deciding on any course of treatment. One portion of a section often throws light upon another, and hesitation in the choice between two or more remedies may often be removed by considering the causes or symptoms of the disease under treatment. As a rule, as far as practicable,

Digitized by UNIVERSITY OF MICHIGAN
Original from UNIVERSITY OF MICHIGAN

the medicines are prescribed in the order in which they are most likely to be required, or in the order of their importance; this, however, must never be taken for granted, but the remedy or remedies administered strictly according to the present symptoms of the patient.

III. Occasionally, remedies are prescribed without describing the symptoms, or but very imperfectly, by which their use is indicated. Under such circumstances, and whenever in doubt in choosing the remedy, the reader is referred to the MATERIA MEDICA, which forms a very important chapter in the volume. An attentive study of this portion of the work will give a broad and tolerably exact knowledge of many valuable remedial agents, and a measure of skill in using them.

IV. The utility of the work may be greatly increased by having it *interleaved** for recording the results of cases treated, and general observations. Whoever faithfully carries out this hint will accumulate a valuable store of information, the retrospect of which will be interesting and encouraging in the highest degree.

V. Facility of reference may be secured by acquaintance with the arrangements of the Manual; it is divided into parts, chapters, and sections, and the headings on the top of the pages indicate the general and particular disease under consideration. Medical terms are occasionally used, but they are either explained in the text, or in the list of Hard Words which follow the Materia Medica. The index at the

* Interleaved copies may be procured from the publishers.

Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN

end of the volume is very copious, and every point of importance may be found by it.

VI. Lastly, the author desires to make this a thoroughly useful Manual; he will therefore be glad to receive suggestions and notes of the experiences of persons using it. Any points likely to be of value, in preparing another edition, of a directly practical character, sent to the author, will be thankfully received, and will aid in making it what he desires it to be, a reliable guide to good health.

Digitized by UNIVERSITY OF MICHIGAN
Original from UNIVERSITY OF MICHIGAN

# CONTENTS.

## PART I.

### INTRODUCTORY.

### CHAPTER I.

PAGE

OBSERVATIONS PERTAINING TO HEALTH *(Hygiene)* . . . 9

Diet — Brown Bread — Cooking — Water — Air — Light — Exercise — Clothing—Bathing—The Wet Pack—Influence of Professions and Occupations on Health.

### CHAPTER II.

SIGNS AND SYMPTOMS OF DISEASE . . . . . 38

The Pulse—The Tongue—Breathing—Pain—The Skin—The Urine.

### CHAPTER III.

THE MEDICINES, ETC. . . . . 45

Tinctures—Pilules—Globules—Triturations—List of Principal Medicines—Matrix Tinctures, for External Use—Directions for Taking the Medicines—The Dose—Alternation of Medicines—Drugs, etc.

## PART II.

### MEDICAL AND SURGICAL DISEASES, AND THEIR HOMŒOPATHIC TREATMENT.

### CHAPTER I.

FEVERS . . . . . 52

Simple Fever—Inflammatory Fever—Typhoid Fever—Typhus Fever—Intermittent Fever, Ague—Hectic Fever—Hay Fever, Hay Asthma.

Digitized by UNIVERSITY OF MICHIGAN

Original from UNIVERSITY OF MICHIGAN

## CHAPTER II.

PAGE
THE ERUPTIVE FEVERS . . . . . 96

Measles — Scarlet Fever, Scarlatina — Small-pox — Vaccination — Chicken-pox—Erysipelas.

## CHAPTER III.

DISEASES OF THE ORGANS OF BREATHING . . . . 122

Cold in the Head—Influenza—Hoarseness, Loss of Voice—Clergyman's Sore Throat—Cough—Hooping-cough—Bronchitis—Chronic Bronchitis—Asthma—Asthma of Children—Inflammation of the Pleura—False Pleurisy—Inflammation of the Lungs—Croup—Diphtheria—Consumption—Domestic Accessories in various Inflammatory, Debilitating Diseases.

## CHAPTER IV.

DISEASES OF THE ORGANS OF DIGESTION . . . . 193

Digestion, Why we Eat—Indigestion—Loss of Appetite—Voracious or Depraved Appetite—Biliousness—Spasms or Pain in the Stomach—Heartburn—Waterbrash—Nightmare—Vomiting—Sea Sickness—Flatulence—Constipation, Confined Bowels—Colic—Painters' Colic, Lead Colic—Diarrhœa, Looseness of the Bowels, Purging—Dysentery, Bloody-Flux—Asiatic Cholera—Worms.

## CHAPTER V.

AFFECTIONS OF THE LIVER . . . . . 253

Inflammation of the Liver—Chronic Inflammation of the Liver, Liver Complaint—Jaundice, The Yellows.

## CHAPTER VI.

DISEASES OF THE ANUS . . . . . 260

Piles—Protrusion of the Lower Bowel—Fistula in Ano—Itching of the Anus.

## CHAPTER VII.

DISEASES OF THE URINARY ORGANS . . . . . 272

Inflammation of the Kidneys—Inflammation of the Bladder—Difficulty in passing Urine—Incontinence of Urine—Wetting the Bed—Retention and Suppression of Urine—Inflammation of the Urethra.

Digitized by UNIVERSITY OF MICHIGAN
Original from UNIVERSITY OF MICHIGAN

# PART I.

## INTRODUCTORY.

### CHAPTER I.

#### Observations Pertaining to Health (*Hygiene*).

#### 1.—Diet.

Homœopathy is not a mere system of dietetics. Extended observation proves that the curative action of medicines, chosen according to the homœopathic law, is but little affected by ordinary food or beverages; hence beyond the prohibition of certain articles which stimulate the system too much, clog it in its operations, or impose on weak or diseased organs a task to which they are unequal, homœopathic physicians interfere but little with their patients' diet.

The food of the invalid, however, must be regulated according to the nature, stage, and progress of the malady; therefore, the diet appropriate in acute and chronic diseases will be found prescribed in the following pages.

Respecting the diet of healthy persons, the following suggestions, with occasional modifications, will, in general, be found suitable. The plan is chiefly from Dr. Williams' "Principles of Medicine."

*Breakfast* at eight, a.m., of bread or dry toast, with a moderate quantity of fresh butter. A new-laid egg, boiled three minutes; or a little mutton, beef, home-fed boiled bacon, cold chicken, or game, may be added for those who make much bodily exertion. A breakfast-cupful of cocoa, deprived of its excess of oil, such as is sold by most



Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN

homœopathic chemists, or black tea, with milk, may be substituted; but the latter is less nutritious.

*Dinner* at one, p.m. Wholesome fresh meat and vegetables, carefully proportioned, plainly cooked, served hot, and properly masticated. These should be varied from day to day, with occasional additions, in moderate quantities, of fruit or farinaceous puddings; and fish occasionally substituted for animal food. Highly-seasoned dishes, pickles, salt and dried meats, rich and heavy pastry, and cheese, should be excluded from tables aiming at wholesomeness. Persons who are accustomed to take much exercise, and are weakly, may take a small quantity of malt liquor, never exceeding half a pint: bitter ale is the lightest, and porter or stout is, perhaps, the more sustaining. But, in by far the majority of cases, fermented liquors had better be avoided altogether for dinner, and a few sips of filtered water substituted. Too much cold water lowers the temperature of the stomach, and so interrupts digestion. The habit of taking wine after dinner is one of luxury, not of health; and all that can be said of it, from a hygienic point of view, is *the less the better*. An occasional slight dessert of wholesome fruit is not objectionable.

*Tea* or *supper* may be taken at six, p.m., and include one or two cups of black tea, bread or dry toast with butter, fruit, or marmalade, as may be found most digestible or agreeable. If it is the last meal in the day, and the person is not plethoric, and takes a great amount of physical exercise, the meal may include a little light meat, chicken, or white fish.

A different arrangement is necessary for those who dine late—say at five or six, p.m.—as then a *luncheon* should be taken at about one, p.m., which may consist of a small basin of good shin-of-beef soup, with vermicelli, rice, or toasted bread in it. But if meat have been taken at breakfast, a

Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN

biscuit, or bread and butter, or a small sandwich may suffice; wine and malt liquors are better avoided at this time. At five or six, dinner may be taken, and include the dishes already mentioned. The custom of taking tea, or a simple warm liquid meal three or four hours after dinner, is a very salutary one, as the warm liquid assists the separation and absorption of the chyle from the chyme, which is effected at this period. But the introduction of solid food, especially large quantities of buttered-toast or rich cake, would seriously interfere with this process. Two moderate cups of black tea, with a little milk and sugar, form a useful and agreeable beverage, and serve to remove all acrid materials left undissolved by digestion, and which, if not carried off, might disturb that rest for which the appropriate hour now approaches.

When convenient, the dinner hour may be advantageously deferred until five or six, p.m., so that sufficient time may be devoted to it, and that rest taken after it which the principal meal requires, but which it is often impossible to give to it in the middle of the day. The chapter on "Indigestion" contains almost everything necessary further to be remarked on the subject of diet, and to that the reader is referred.

## 2.—Brown Bread.

The importance of bread, aptly termed the "staff of life," the common food of all classes, and its abundance being properly regarded as one of our greatest national blessings, seem to justify a brief inquiry into the kind most conducive to health. Wheat contains the following principles, which slightly vary in different samples:—

| | | | |
|---|---|---|---|
| Water . . . | 11 per cent | Gum . . . | 4 per cent. |
| Gluten . . | 13 „ | Oil . . . | 2 „ |
| Starch . . . . | 60 „ | Bran (the thin external husk) . | 2 „ |
| Sugar . . | 8 „ | | |

Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN

It is important to remark that these elements are not *uniformly* distributed throughout a kernel of wheat. Immediately beneath the thin external covering is a layer of darkish coloured matter, most rich in gluten, and in which the chief of the oil in the wheat exists in minute drops enclosed in its cells. In the ordinary course of grinding and dressing, a large portion of this is removed from the superfine flour, as it is not so readily reduced to a fine powder, and hence is rejected with the middlings and bran. Beneath this dark layer is the heart of the kernel, which is very white and chiefly composed of starch, and from it the best looking and finest flour is made. This portion is not absolutely destitute of gluten, nor is the dark portion free from starch; but they exist in excess in the parts indicated.

The mineral ingredients of a kernel of wheat are also unequally distributed. They are chiefly, phosphoric acid, potash, soda, magnesia, oxide of iron, sulphuric acid, salt, and silica; and in superfine flour they exist in the proportion of a little over 1 per cent.; in the next quality between 3 and 4 per cent.; still coarser flour, about 5 per cent.; and bran 7 per cent. Thus it will be seen that fine flour contains but a small portion of those mineral ingredients which are found in wheat before grinding, a large portion being cast off with the bran.

But the mineral constituents of the vegetables we consume are as indispensable to the human organization as any other; experiments upon the inferior animals prove that their withdrawal from vegetable food is prejudicial, and that animals so fed perish from starvation. Mineral ingredients form the nourishment for important parts of the animal economy, and, dissolved in the blood, are taken up at points where they are necessary to sustain local parts. Thus phosphates of lime are required by the bones, phosphates of magnesia and potash by the muscles, soda by the

Digitized by UNIVERSITY OF MICHIGAN
Original from UNIVERSITY OF MICHIGAN

cartilages, phosphorus by the brain; silica by the hairs and nails; and iron by the red globules of the blood, and black colouring matter within the eye.

The dark portion which chiefly contains the gluten, the most nutritious constituent of the wheat kernel, is almost entirely separated in the process of dressing; while the central is almost wholly starch, and of much less value to the body. In thus rejecting the dark portion which immediately underlies the bran, and is almost entirely removed with it, and used for the food of our cattle, we lose the most nutritious as well as the sweetest portion of the grain.

In the preparation of wheat for the purpose of food, it should be borne in mind that its value depends not upon the quantity of starch it contains, but upon the amount of gluten, and any process which diminishes this element is most objectionable.

The mere bran, without its underlying strata, may be partially removed without much detriment, for though useful in obstinate constipation, it is irritating to the mucous membrane of the alimentary canal of some persons. In such cases the coarse portions of bran may be removed, but not to the extent of divesting it entirely of the bran and the darker portion referred to, and thus to sacrifice its nourishing properties for mere fineness or whiteness of bread.

## 3.—Cooking.

Much depends, as to the digestibility and nourishing properties of animal food, on the mode in which it is prepared for the table. The following passage from Professor Johnstone's work contains at once the whole theory of the art of cooking meat, and we give it entire, as such knowledge cannot be too widely diffused:—

"In cooking animal food, plain boiling, roasting, and

Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN

baking, are in most general favour in our islands. During these operations, fresh beef and mutton, when moderately fat, lose on an average about—

| | In boiling. | In baking. | In roasting. |
|---|---|---|---|
| 4 lbs. of beef lose ... | 1 lb. | 1 lb. 3 oz. | 1 lb. 5 oz. |
| 4 lbs. of mutton lose | 14 oz. | 1 lb. 4 oz. | 1 lb. 6 oz. |

The greater loss in baking and roasting arises chiefly from the greater quantity of water which is evaporated, and of fat which is melted out during these two methods of cooking. Two circumstances, however, to which it has not hitherto been necessary to advert, have much influence upon the successful result of these and some other modes of cooking.

"If we put moist flesh-meat into a press and squeeze it, a red liquid will flow out. This is water coloured by blood, and holding various saline and other substances in solution. Or if, after being cut very thin, or chopped very fine, the flesh be put into a limited quantity of clean water, the juices of the meat will be gradually extracted, and by subsequent pressure will be more completely removed from it than when pressure is applied to it in the natural state, and without any such mincing and steeping. The removal of these juices leaves the beef or mutton nearly tasteless. When the juice of the meat, extracted in either way, is heated nearly to boiling, it thickens or becomes muddy, and flakes of whitish matter separate, which resemble boiled white of egg. They are, in fact, white of egg or albumen; and they show that the juice of flesh contains a certain quantity of this substance, in the same liquid and soluble state in which it exists in the unboiled egg. Now, the presence of this albumen in the juice of butchers' meat is of much importance in connection with the skilful preparation of it for the table.

"The first effect of the application of a quick heat to a piece of fresh meat is to cause the fibres to contract, to squeeze out a little of the juice, and, to a certain extent, to

Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN

close up the pores so as to prevent the escape of the remainder. The second is to coagulate the albumen, and thus effectually and completely to plug up the pores, and to retain within the meat the whole of the juice. Thereafter, the cooking goes on through the agency of the natural moisture of the flesh. Converted into vapour by the heat, a kind of steaming takes place, so that whether in the oven, on the spit, or in the midst of boiling water, the meat is in reality, cooked by its own steam.

"A well-cooked piece of meat should be full of its own juice or natural gravy. In roasting, therefore, it should be exposed to a quick fire, that the external surface may be made to contract at once, and the albumen to coagulate, before the juice has had time to escape from within. And so in boiling. When a piece of beef or mutton is plunged into boiling water, the outer part contracts, the albumen which is near the surface coagulates, and the internal juice is prevented either from escaping into the water by which it is surrounded, or from being diluted and weakened by the admission of water among it. When cut up, therefore, the meat yields much gravy, and is rich in flavour. Hence a beaf-steak or mutton-chop is done quickly, and over a quick fire, that the natural juices may be retained.

"On the other hand, if the meat be exposed to a slow fire, its pores remain open, the juice continues to flow from within as it is dried from the surface, and the flesh pines and becomes dry, hard, and unsavoury. Or if it be put into cold or tepid water, which is afterwards gradually brought to a boil, much of the albumen is abstracted before it coagulates, the natural juices for the most part flow out, and the meat is served in a nearly tasteless state. Hence to prepare good boiled meat, it should be put at once into water already brought to a boil. But to make beef-tea, mutton-broth, or other meat soups, the flesh should be put into cold water,

Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN

and this afterwards very slowly warmed, and finally boiled. The advantage derived from *simmering*, a term not unfrequent in cookery books, depends very much upon the effects of slow boiling as above explained."

It is a cause of regret to find how very extensively the principles expressed in the above quotation are disregarded. Even in well-informed circles, there exists lamentable ignorance or extreme carelessness as to the proper method of cooking animal food so as to utilize its most valuable constituents.

## 4.—Water.

There is no drink in the world so wholesome, or, to the unperverted taste, so agreeable, as pure water. It is the natural drink of man, is highly favourable to digestion, and may always be taken in moderation when thirst is present. It enters into the composition of the tissues of the body, forms a necessary part of its structure, and performs such important purposes in the animal economy as to be absolutely indispensable for life and health. Water enters largely into combination with our food, and articles that we take as food can only afford nourishment by being dissolved in it. It also acts as a vehicle to convey the more dense and less fluid substances from the stomach to their destination in the body. It gives fluidity to the blood, holding in suspension, or solution, the red globules, fibrine, albumen, and all the various substances which enter into the different structures; for the whole body is formed from the blood. Not only the soft parts of the body, but even the very bones, or the materials of which they are composed, have at one time flowed in the current of the blood, suspended or held in solution in water. To prove how essential water is for the development and maintenance of the animal body, we may here state that a calculation has been made which shows that a human body,

Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN

weighing 154 lbs., contains 111 lbs of water. Such a fact suggests the necessity of obtaining water pure, and of taking it unpolluted by animal and mineral ingredients. When practicable, water for domestic purposes should be filtered.

Water may be obtained tolerably pure in rain or snow collected in suitable vessels in the open country, away from crowded dwellings and manufactories, where processes are constantly going on which tend to deteriorate the water. Spring, river, sea, surface, well, and mineral water, all contain various substances dissolved in them, which render them, without distillation or filtration, unsuitable for drinking, or even to be used in the preparation of articles of diet. The purest water is obtained from deep wells, bored through the earth and clay down to the chalk *(Artesian Wells)*. Even for cooking purposes and bathing, the purest water that can be obtained is the best.

It is a fallacy to suppose that surface well-water is purer than that obtained from deep wells because it is more sparkling and often cooler and clearer. The sparkling of these waters is due to the presence of carbonic acid gas, that acid being derived from the decomposition of animal and vegetable substances.

"The situation of these wells, especially in London, explains the origin of these impure matters. The water that supplies the surface-wells of London is derived from the rain which falls upon the surface of the land, and which percolates through the gravel, and accumulates upon the clay. Now this gravel contains all the soakage of London filth; through it run all the drains and sewers of London, and its whole surface is riddled with innumerable cesspools. Here is the source of the organic matter of surface well-waters, and also the cause of their coolness, their sparkling, and their popularity. In most small towns there is a public pump, and,

Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN

when this is near the churchyard, it is said to be always popular. The character of the water is no doubt owing to the same causes as that of London surface wells, the remains of humanity in the churchyard supply the nitrates and carbonic acid of the water.

From this kind of impurity the water of deep wells in London, and of wells cut into rocks which bring their water from a distance from towns, are entirely free. They frequently contain inorganic salts in abundance, but they do not contain organic matters; hence, for drinking purposes, they are very preferable to the waters of surface-wells. A great number of these wells exist in London. There is one attached to almost every brewery in London; and other manufacturers, who need pure water for their operations, sink these wells."—*Lancaster.*

Not one of the least important objects contemplated in the publication of this work is the removal of a foolish prejudice, which unhappily exists in the minds of many, to pure water, an element which God has provided for His creatures with the most lavish abundance; and of promoting, both for internal and external purposes, in health and sickness, a more regular use of this invaluable boon and blessing. Pure water has justly been regarded as an emblem of innocence, truth, and beauty. In a community in which this element shall be used as the chief beverage, and more abundantly for purposes of purification, we may hope to find in the morals of the people reflections of virtue of which water is so vivid a type. And, in a sense which more immediately bears on the subject of this manual, suffering will be more easily controlled by our remedies, and the development of those latent tendencies to disease most effectually prevented, which the habits and fashions of the present age seem to favour.

Digitized by UNIVERSITY OF MICHIGAN
Original from UNIVERSITY OF MICHIGAN

## 5.—Air.

A proper supply of pure, fresh air is essential for the preservation of life and health. Although life may not be destroyed suddenly by breathing an impure atmosphere, still the vital energies are slowly but surely impaired thereby; and this is especially the case with growing children, and persons suffering from disease.

AIR SPOILED BY BREATHING.—It will be sufficient for our present purpose briefly to state, that in the process of breathing the air loses its oxygen, the life-giving principle, and receives in exchange carbonic acid gas, a gas not only incapable of supporting life, but actually destructive of it. Such is the change effected by a solitary act of breathing; and if this process goes on in an ill-ventilated room where several human beings are gathered together, the carbonic acid gas accumulates, usurps the place of the oxygen consumed, and so renders the air less and less fit for the purposes of the renewal of life. Carbonic acid gas cannot support combustion; hence a lighted candle partially or completely surrounded by it, burns slowly or goes out; so is it with human beings, when more or less completely enveloped in an atmosphere charged with this gas; all the functions of the body are tardily and imperfectly performed; the muscular tissues are enfeebled, the breathing becomes oppressed, the head aches, and in extreme cases, life is extinguished amidst sufferings of the most distressing nature.

AIRY SLEEPING ROOMS.—The fact that carbonic acid gas is inimical to health and life, shows the importance of making provision for its uninterrupted removal from our houses and places of assembly, and above all, from our sitting rooms and *sleeping rooms*, in which we pass so large a portion of our lives. *Airy, well-ventilated sleeping apartments should be ranked with the most important re-*

Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN

*quirements of life, both in health and disease.* Bed-rooms, in which about one-third of human existence is passed, are generally too small, crowded, and badly ventilated. Often the doors, windows, and even chimneys are closed, and every aperture carefully guarded so as to exclude fresh air. The consequence is, that, long before morning dawns, the atmosphere of the whole apartment becomes highly noxious from the consumption of its oxygen, the formation of carbonic acid, and the exhalations from the lungs and the relaxed skin. Under such circumstances, the sleep is heavy and unrefreshing, partaking more of the character of insensibility. Were there due provision for the uninterrupted admission of fresh air, and the free escape of impure air, the sleep would be lighter, shorter, and more invigorating. In nearly every instance, the door of the bed-room may be left open, and the upper part of the window let down a few inches—a greater or less extent according to the state of the weather—with perfect safety. A current of air may be prevented from playing on the face of the occupant, by placing the bed in a proper situation, or by suspending a single curtain from the ceiling. We may be permitted to add, we always sleep with a portion of the top sash of the window down, except in very wet, windy, or foggy weather; even then the door of communication with the adjoining room or landing remains open. During foggy weather, the apertures directly communicating with the external air may be closed.

The importance of the subject is very correctly and strikingly put by a medical writer of the last century. "If any person," he remarks, "will take the trouble to stand in the sun, and look at his own shadow on a white plastered wall, he will easily perceive that his whole body is a smoking mass of corruption, with a vapour exhaling from every part of it. This vapour is subtle, acrid, and offensive to the

Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN

smell; if retained in the body it becomes morbid; but if re-absorbed, highly deleterious. If a number of persons, therefore, are long confined in any close place not properly ventilated, so as to inspire and swallow with their spittle the vapours of each other, they must soon feel its bad effects." Unpleasant as it is to dwell on such a subject, it is yet true that the exhalations from the human lungs and skin, if retained and undiluted with a continuous supply of oxygen, are the most repulsive with which we can come in contact. We shun the approach of the dirty and the diseased; we hide from view matters which are offensive to the sight and the smell; we carefully eschew impurities in our food and drink, and even refuse the glass that has been raised to the lips of a friend. At the same time, "we resort to places of assembly, and draw into our mouths air loaded with effluvia from the lungs and skin and clothing of every individual in the promiscuous crowd: exhalations, offensive to a certain extent, from the most healthy individuals, but which, rising from a living mass of skin and lung in a state of disease, and prevented by the walls and ceiling from escaping, are, when thus concentrated, in the highest degree deleterious and loathsome" *(Bernan)*.

CAUTIONS AS TO BADLY VENTILATED CHURCHES, ETC.—The great practical inference is, that the only means of preventing people from poisoning themselves and others is to ensure their being constantly surrounded by fresh air; otherwise, low fevers may result, and such acute diseases as scarlatina, measles, small-pox, etc., may be excited in epidemic forms, marked by a class of symptoms described in medical terms as "typhoid" or malignant. The air of an apartment containing several human beings, if unchanged, not only becomes charged with carbonic acid gas, but also, as before stated, impregnated with animal particles which fly off from the skin and lungs, so minute as scarcely to be

Digitized by UNIVERSITY OF MICHIGAN
Original from UNIVERSITY OF MICHIGAN

detected by the microscope, but capable of decomposition; and, taken by the breath into the lungs, may be absorbed and develop the worst forms of scrofula and consumption. But if these particles are given off from bodies affected with, or recovering from, small-pox, scarlet fever, hooping-cough, typhus, etc., they will exert a most injurious influence upon the health, and probably generate in other bodies diseases like those from which they emanated. It is most important to bear in mind that the assembly in an ill-ventilated church, court of law, school-room, theatre, ball-room, or evening party, may include in its number some as yet unsafe convalescents from these or kindred diseases. The only security we can suggest is, as far as possible to avoid all places of public resort or private gatherings in which the most ample provision is not made for the admission of fresh air, and for the uninterrupted escape of air spoiled by carbonic acid gas or animal exhalations.*

## 6.—Light.

The importance of sunlight for physical development and preservation is not, it is believed, duly appreciated. Women and children, as well as men, in order to be healthy and well developed, should spend a portion of each day where the solar rays can reach them directly. Just as sprouts of potatoes in dark cellars seek the light and are colourless till they come under its influence, and as vegetation goes on but imperfectly in places where sunlight does not freely enter, so the cheeks of children and adults who live almost entirely in dark kitchens, dingy alleys, and badly-lighted workshops, are pale, and their bodies feeble. Houses are only fit to be occupied at night that have been purified and dried by the solar rays during the day.

*See "Ventilation in Cold Weather," in "The Homœopathic World," January, 1866.

Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN

It has been pointed out by Dr. Ellis that women and children in the huts and even log cabins of America, which contain only one or two rooms, remain healthy and strong; but that, after the settler has built a house, and *furnished it with blinds and curtains*, the women and children become pale-faced, bloodless, nervous, and sickly; the daughters begin to die from consumption, and the wives from the same or some disease peculiar to women. At the same time, the adult males, who live chiefly out of doors, continue healthy.

The value of sunlight, with its accompanying influences, for animal development, may be illustrated by such facts as the following:—In decaying organic solutions, animalcules do not appear if light is excluded, but are readily organized when it is admitted. The tadpole, kept in the dark, does not pass on to development as a frog, but lives and dies a tadpole, and is incapable of propagating his species. In the deep and narrow valleys among the Alps, where the direct rays of the sun are but little felt, cretinism, or a state of idiocy, more or less complete, commonly accompanied by an enormous goitre, prevails, and is often hereditary. Rickets, or deformities, crookedness, and enlargement of the bones, are very common among children who are kept in dark alleys, cellars, factories, and mines.

During the prevalence of certain epidemic diseases, the inhabitants who occupy houses on the side of the street upon which the sun shines directly, are less subject to the prevailing disease than those who live on the shaded side. In all cities visited by the cholera, the greatest number of deaths took place in narrow streets, and on the sides of those having a northern exposure, where the salutary beams of the sun were excluded. It is said that the number of patients cured in the hospitals of St. Petersburg was four times greater in apartments well lighted than in confined,

Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN

and dark rooms. This discovery led to a complete reform in lighting the hospitals of Russia, and with the best results.

Except in severe inflammatory diseases of the eyes or brain, the very common practice of *darkening the sick room* is a highly prejudicial one. The restorative influence of daylight is thus excluded, and also the grateful and natural succession of light and darkness, the two always making up the same period of twenty-four hours, which favours sleep at the appropriate time, and divests the period of sickness of the monotony and weariness of perpetual night.

## 7.—Exercise.

Exercise strengthens and invigorates every function of the body, and is essential to health and long life. No one in health should neglect to walk a moderate distance every day in the open air, if possible in the country, where the invigorating and balmy air of nature can be freely inhaled. *Walking* is the healthiest as well as the most natural mode of exercise. Other things being equal, this will ensure the proper action of every important function. The walk for health should be diversified, and if possible include ascents and descents, and varying scenery; and be alternated, when circumstances admit of it, with riding on horseback, active gardening, or similar pursuits, and with gymnastics and games of various kinds. Athletic sports and manly exercises should form a part of the education of youth, nor should they be neglected in after life, especially by persons of sedentary pursuits. Many aches and pains would rapidly vanish if the circulation were quickened by a judicious and regular use of the muscles. These modes of exercise, practised moderately and regularly, and varied from day to day, are much more advantageous than the exciting, immoderate, and irregular exertions which characterize the ball-room, the hunting-field, and even the cricket-ground or the rowing

Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN

match. These exercises are sometimes pursued so violently as to be followed by severe and permanent injury to the constitution. In the case of very feeble and infirm people, carriage exercise, if it may be so called, and frictions, by means of towels and bath gloves, over the surface of the body and extremities, are the best substitutes for active exertion.

The best periods for exercise are, when the system is not depressed by fasting or fatigue, or oppressed by the process of digestion. The robust may take exercise before breakfast; but delicate persons, who often become faint from exercise at this time, and languid during the early part of the day, had better defer it till from one to three hours after breakfast. An evening walk in fine weather is also advantageous. Exercise prevents disease by giving vigour and energy to the body and its various organs and members, and thus enables them to ward off or overcome the influence of the causes which tend to impair their integrity. It cures many diseases by equalising the circulation and the distribution of nervous energy, thus invigorating and strengthening weak organs, and removing local torpor and congestion.

## 8.—Clothing.

The adoption of artificial clothing by man may be stated to serve three purposes, the regulation of temperature; protection from friction, insects, and dirt; and ornament.

In this climate clothing is chiefly employed for warmth, which purpose is secured by moderating or restraining the escape of caloric from the body. Articles of clothing have no power in themselves of generating heat, and are designated as warm or cool just in proportion as they restrain or favour the escape of caloric. Thus a lady's muff and a marble floor are ordinarily of the same temperature; but the sensation produced by each is widely different, because



Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN

the animal heat is retained by the muff, and rapidly carried off by the marble. Hence for clothing we select those substances which conduct heat least, such as the wool of sheep, and the silk produced by silk worms, which are superior, as non-conductors, to cotton or linen. In this country we have recourse chiefly to the former in winter, and to the latter in summer, cotton and linen garments being coolest, the linen being cooler than the cotton.

There are several practical errors on the subject of clothing, committed perhaps by a majority of persons, to which we may briefly direct attention. "The first and most obvious of these," says Dr. Baikie, "is wearing too much clothing indoors or in bed, thereby both exhausting the natural powers of the skin and exposing its action to a sudden check on going out into the cold air. This forms one of the principal objections to the almost universal use of flannel, *worn next the skin*, and kept on even during the night, as is the practice with many people. The skin is thus unnaturally excited, and in course of time loses its natural action; or, on the other hand, becomes so sensitive, as to have its action checked on the slightest exposure. I venture to propose my own plan of clothing as suitable to elderly people and those of delicate constitutions in general.

"1. In summer as well as winter, I wear a cotton garment next the skin, thin in summer, stouter in winter; over this a very light silk shirt for summer, and a thicker one in winter. I also wear a narrow strip of flannel, lined with cotton, round the abdomen in summer, replacing it by a thicker one, made so as to double over the front of the belly in winter; my ordinary shirt is always of cotton.

"2. In the beginning of autumn I add a light-coloured flannel shirt *over* my ordinary one, leaving the front open, or wrapping it across according to circumstances. When the winter fairly sets in, I replace this by a stout flannel shirt;

Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN

but in both cases, I take this off on dressing for dinner, so as to have the full benefit of it while exposed to cold in the *open air;* this I think of great importance; and I never use anything else than a light cotton shirt *to sleep in*, and strongly object to the common practice of sleeping in flannel."

The *colour* of clothing is not unimportant, light being preferable for the following and other reasons:—(1.) White reflects the rays of heat which the black absorbs; at the same time it impedes the transmission of heat from the body. Light-coloured clothes are therefore best both for winter and summer, retaining the heat in the former, and keeping it off in the latter. (2.) Particles which emanate from diseased bodies, unhealthy accumulations, or miasmatic districts are much more readily absorbed by dark than by light clothing. Therefore those who are exposed to contagious influences, or the sick room, or in unhealthy neighbourhoods, should wear light clothing. Dark clothes favour the transmission of contagious disease, from house to house, much more readily than light ones.

Another point deserving attention is, that of *frequent changing and cleansing of clothes.* The practice of adopting dark-coloured instead of light-coloured garments has frequently its origin in economy, dark clothes tolerating an amount of dirt inadmissible in light ones. It should be recollected that dark garments contract dirt after being worn a little time as much as light, and if not changed and cleansed may favour the production or spread of disease.

Another evil of far greater moment, is the adoption by ladies of *extended skirts*, a fashion, not merely inconvenient, but one of risk, exposing them to the danger of the most horrible of deaths. The returns of the Registrar-General reveal the appalling fact, that eight persons are burned to death every day in England and Wales, a large proportion

Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN

resulting from the uncontrollable dimensions of the extended skirt. In addition to the lives thus immediately sacrificed, a far greater number survive, after enduring sufferings of the most acute description, and often crippled for life. Is it not, therefore, a question deserving serious consideration, whether the fashion of wearing extended dresses is not one unsuited to a country where fires, gas, and candles are in general requisition?

In connection with this subject it may be well to advert to the inconvenience of heavy thick clothing, the tissues of which are close and firm. Materials for clothing should be chosen the textures of which are loose and porous, and contain air in their interstices, air being a bad conductor.

"The advantage of having numerous light instead of fewer heavy coverings to the skin are these—the stratum of air interposed between each layer of covering being a non-conductor, they are relatively much warmer than a much greater thickness in fewer pieces; 2ndly, they can be more easily laid aside to suit changing temperature; 3rdly, being lighter, they are less apt to overheat the wearer, and thus lesson the chance of a consequent chill."*

Other points may be briefly referred to. Summer clothes should not be put on too soon, or winter ones too late. Thin-soled boots and shoes are destructive to health. So are *stays*. The body is strong enough to support itself; while stays often bring on diseases of the lungs and other important organs. The muscles of the body were intended to sustain it erect, but when stays are applied, they soon become indispensable, by superseding the action of the muscles; and, in accordance with a well-known law of the

* In China, one of the most changeable climates in the world, the variation in one day being frequently 35 or 40 degrees, this is the mode adopted by the natives to protect themselves: a working man will often appear in the morning with 15 or 20 light jackets on, one over the other, which he gradually strips off, as the day gets warm, resuming them again towards night.

Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN

muscular system, when they cease to be used they cease to grow, and become insufficient for the discharge of their natural functions. Not only so, stays are directly injurious; and it is a well ascertained fact, that cases of organic disease have arisen from, or at least were aggravated by, their use.

Finally, it may be stated that the clothing of children, whose feeble frames are less able to resist or endure cold than those of adults, is generally insufficient. When a baby is divested of its long clothes, it is in danger of being insufficiently clad, the danger increasing when it can run alone, and is more exposed to atmospheric influences. It cannot be too strongly impressed upon those who have the charge of children that the practice of leaving those parts exposed, which when grown up we find it necessary to clothe warmly, especially the lower limbs and abdomen, is a frequent cause of retarded growth, inflammation, mesenteric disease, consumption, etc.

## 9.—Bathing.

The cold bath, often recommended in this work, when practised in a reasonable manner, is a most valuable aid to health. As a general rule, once a day, certainly not less frequently than every second morning, every person in health should bathe or sponge the whole body with cold water, immediately following it by friction and exercise, to promote the reaction. This tends to health, just as opening the window lets fresh air into a room. Merely washing the hands, face, and neck, is by no means sufficient; the entire surface of the body requires the application of water, not only for the purpose of cleanliness, but as a means of invigorating the capillary circulation, and so fortifying the system as to enable it to resist atmospheric vicissitudes. The secret of attaining these ends consists in employing the cold in such

Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN

a manner and degree, and in the body being in such a state before and after the application, as that the reaction or glow shall be most perfect. The cold sponge-bath may be adopted with safety by almost any one, the shock not being too great, and good friction rapidly causing agreeable warmth. The best time for a cold bath is on rising from bed, before the body has become chilled. Cold bathing should not, therefore, be practised when the body is cold or cooling, or when it is exhausted by exertion or fatigue, or is naturally too weak, or when the skin feels chilly, until this feeling has been removed by friction or exercise. A bath should not be taken too soon after a meal, for then the circulation should be undisturbed, as the stomach requires all its power to digest the food; nor should the time spent in the bath be too long; that may vary, according to circumstances, from about one to four minutes.

Temperature.—The water of the bath should not be colder than 59°, ranging from this to 64°, according to the season, and according to the temperature of the room. The temperature of the bath-room should be 64° or 65°; if lower than this the water should be a little warmer, and if the room is *cold*, then the water should be 68°, and the bathing process performed as quickly as possible. The temperature of the bath-room is a point of considerable importance, and it can only be accurately measured by a thermometer; one of these useful instruments should therefore be kept in every bath-room.

Sponge.—A large sponge, of good quality, is a very useful adjunct to a bath-room, as by its use a much larger quantity of oxygen can be introduced into the skin than can be effected by any other means, and thus one of the prime conditions of bathing is secured.

If the important conditions stated above are disregarded, the immediate depressing effects of the bath will be con-

Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN

tinued; there will be no glow of reaction, and subsequent chilliness and dulness will ensue. An occasional addition of sea-salt to the water, as recommended in the next paragraph, communicates a stimulating property favourable to reaction. A similar effect is likely to result from the force or shock with which the water is applied, and probably a shower-bath is the most efficient, as it most excites those forcible and deep inspirations which are the most efficient cause of the reaction which follows. The reaction is further promoted by vigorous friction over the entire surface with coarse large towels, which operate both by stimulating the cutaneous vessels, and also by muscular exertion, which promotes the more energetic action of the heart. A brisk walk after the bath also tends to promote reaction.

ADDITION OF SEA-SALT TO THE BATH.—"If the back or hips are weak, and also occasionally in good health, the addition of a solution of sea-salt to the water in the bath will add greatly to its tonic properties. Sea-salt is the residuum of evaporated sea-water; and if it be added in such quantity to a bath that the mineral ingredient is equal to that contained in salt water, it will be far more efficacious than a simple fresh-water bath, as it combines the advantages of temperature with the stimulating action of the water upon the skin, imparted by the saline matter which it holds in solution. Sea-salt can now be very generally obtained, and at a cheap rate; and thus persons residing at a distance from the coast may enjoy, to a certain extent, the advantage and luxury of a sea-bath. In the absence of sea-salt, a handful of bay-salt, or of common salt, may be added to the water." *

Such a bath, taken regularly in the morning, is conducive to health in two ways:—It inures the body to a degree of cold greater than it is likely to be exposed to during the rest

* The Lady's Manual of Homœopathic Treatment.

Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN

of the day, and so proves most serviceable in protecting it from atmospheric influences; and it tends to remove irregularities in the circulation, and, by exciting the healthy action of the skin, may aid that organ in removing disease.

It is not everyone, however, who can with safety practise bathing in the manner just now pointed out. Cold bathing would be very hazardous, not only to patients who are extremely weak, or who have any organic disease, especially of the heart or lungs, but there may be some idiosyncrasy or condition of the constitution peculiar to the individual which would render such a course the very reverse of beneficial. Patients who have any ground for doubt on the subject should consult their medical attendant. Caution is more particularly necessary in infancy and old age. The adaptation of the cold bath to individual cases may often be determined by the following criterion :—If, after a bath, the patient remains chilly, languid, and dejected, or suffers headache, it had better be discontinued; but if the sense of cold rapidly passes off, and a glow of warmth and animation of spirits succeed and continue for some time, the cold bath is almost sure to be productive of good.

The *warm bath*, to the feeble and exhausted frame, is often very beneficial, and a great luxury. The temperature may be varied according to the sensations of the patient, but as a rule should be that of the temperature of the blood—96° to 98°; if higher than 98°, the bath may be followed by a profuse perspiration, which weakens the system. Warm bathing, however, including the hot air or Turkish bath, except as a remedial agent, and prescribed by a medical man, is generally prejudicial.

For suggestions on various forms of baths, and their admissibility to persons in disease, consult subsequent portions of this volume; especially under "Consumption," and "Cold in the Head."

Digitized by UNIVERSITY OF MICHIGAN
Original from UNIVERSITY OF MICHIGAN

## 10.—The Wet Pack.

As we have often prescribed the wet pack in the following pages, we here offer a brief description of the process. A little practice will enable any one to carry out the directions with ease. Whenever indicated, we can assure our readers, from extensive practice, they need not hesitate to adopt it, as the wet pack is both salutary and comforting. Spread a macintosh sheet or stout blanket or quilt on a mattress, and over it, leaving a margin at the head, spread a thick linen sheet, *wrung* out of *cold* water. The wringing is best effected by two persons, one taking hold of either end, the sheet being doubled, and twisting as long as any water can be got out. In fevers, the colder the water is the better; for very delicate persons with feeble reaction, water at 68° may be used. The patient is to be extended on his back naked on the wet sheet, so that the upper edge covers the back of the neck, but the lower one is to project beyond the feet; holding up the arms, one side of the sheet is to be thrown over the body and tucked in; the arms are now placed by the sides, and the other part of the wet sheet is thrown over all, and tucked rather tightly in, turning in the projecting ends under the feet. The macintosh or blanket is then to be brought over all the sheet, and well tucked in round the neck, at the sides, and over the feet, so as completely to exclude the air. A stout quilt or extra blanket is to be put over all. In a short time the patient will become warm; the sensation is most agreeable, especially in fevers. He may remain in the pack three quarters of an hour to an hour, then be put into a shallow bath of water at 64°, well washed, dried, and put to bed. It may be repeated once, twice, or thrice a day, according to circumstances and the violence of the attack. Perspiration may be encouraged by giving sips of cold water. If the head becomes con-

Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN

gested, or the face flushed while in the pack, a cold compress should be applied over the forehead. The wet pack is invaluable in the *early* stages of all fevers; and in *scarlatina*, *measles*, and *small-pox*, it assists in bringing out the eruption.

## 11.—The Influence of Professions and Occupations on Health.

Whatever may be the particular employment of an individual, it can rarely be divested of certain effects, more or less prejudicial to his general health. Occupations which permit of the free use of pure air and moderate muscular exercise, with exemption from want or anxiety, are those most conducive to a healthy, long life. Statistical tables afford evidence of the greater longevity of some pursuits as compared with others. The following table from Tarbell's "Sources of Health," published at Berlin in 1834, is on too limited a scale for general application, but is undoubtedly a close approximation to the truth.

| | | | | |
|---|---|---|---|---|
| Of 100 | Clergymen | 42 | attained the age of | 70 years and upwards. |
| ,, | Farmers | 40 | ,, | ,, |
| ,, | Commercial Men | 35 | ,, | ,, |
| ,, | Military Men | 33 | ,, | ,, |
| ,, | Lawyers | 29 | ,, | ,, |
| ,, | Artists | 28 | ,, | ,, |
| ,, | Teachers | 27 | ,, | ,, |
| ,, | Physicians | 24 | ,, | ,, |

The first half in the above list, with the exception of the clergymen, are necessarily much exposed to the air, and take physical exercise; but the other half, with the exception of the physicians, are chiefly confined in-doors, engaged in sedentary occupations. The difference between the longevity of the clergyman and the physician may no doubt be accounted for by the fact, that the literary pursuits of the

Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN

former are not of so multifarious and unremitting a character as to prevent sufficient out-door exercise being taken; the nature of his studies may be regarded as favourable to a long life, by inspiring influences conducive to cheerfulness, hope, and serenity. The physician, on the other hand, is exposed to influences most adverse to health; he has frequently to encounter the poison of infectious disease, and is often unable to observe those rules and precautions which it is his duty to enforce in the practice of others; his responsibility often involves extreme mental anxiety; and his almost incessant occupation of both mind and body, no doubt account for his comparatively short life. There are, however, instances of medical men attaining an advanced age. Harvey reached the age of 81; Hoffmann, 83; Hahnemann, 88; Heberden, 93; and Hippocrates, 109. The last individual was much engaged in travelling, and passed much more of his time in the country than in crowded cities.

Why Employments are Unhealthy.—The circumstances which operate in rendering occupations unhealthy, are chiefly the following: deficiency of daylight and pure air; a bad position of the body during employment; and the inhalation of mechanical or poisonous substances.

Abundance of sunlight is of great importance in workshops and offices, particularly where young people are employed. As already pointed out, patients make better and more rapid recoveries in well-lighted hospitals; and very serious cases are generally placed in the sunny side of such buildings. If, therefore, persons are more likely to regain health in such apartments, we may fairly conclude that the health of a person will be better preserved, if employed in a large well-lighted workshop or office. Windows should be frequently cleaned, and the walls and ceilings whitewashed at least twice a year.

The sedentary occupations, such as are followed by book-

Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN

keepers, milliners, tailors, shoemakers, and many others, are often most unfavourable to health, as the sitting posture is generally combined with an inclination to lean forwards, so as to compress the chest and stomach. To a limited extent, the hurtful consequences of such postures may be avoided by occasionally changing to a standing position when at work, and by taking out-door exercise during the hours of relaxation. Plenty of healthful recreation in the open air is the best corrective of the injurious consequences of sedentary employments.

Occupations, however, are only injurious accidentally, a certain amount of work being advantageous for man, both in regard to his body and his mind. Industry alone can preserve anything like a healthful contentment of the spirits, or dispel melancholy from the mind; or remove those dissatisfied and restless cravings which prey upon the unemployed. Industry, moreover, is ordinarily followed by rewards such as are esteemed most desirable even by the mere worldling; and when wealth accumulates or honour flows in upon a man, through God's blessing on his honest industry, it is immeasurably more precious to him than if ancestors had bequeathed it. True, there are districts of the earth where but little demand is made on the labours of the husbandman, the mountains and the valleys yielding almost spontaneously their rich produce. But the people of districts whose soil possesses the greatest fertility—Italy and Spain—are often sunk to the lowest condition in those mental, social, and moral qualities, which constitute the chief glory of a nation. Released from the necessity of industry, the body becomes enfeebled, the mind weak and vacillating, the sensuous passions preponderate over the intellectual powers; and man, in such circumstances, presents the humiliating spectacle of a mere stagnant humanity, excited into action only by the lowest instincts of his nature.

Digitized by UNIVERSITY OF MICHIGAN
Original from UNIVERSITY OF MICHIGAN

Having regard to the material frame of man, the point that comes especially within our province, we commend industrious employment, which, when followed under the conditions already indicated, are conducive to health and long life. The body was formed for active duties, and the performance of these is indispensable alike for perfect physical development, for health, and happiness. The muscles, the tendons, the ligaments, and even the bones, require exercise, and become deteriorated in structure, and feeble from indolence. Hence the vertebræ (backbone) of a carpenter, or of any one who has followed a similar occupation, are larger and also much heavier in proportion to size, than those of a shoemaker or tailor. It is stated of a person who, in consequence of a trifling lameness, took up the occupation of begging, and sat almost wholly during the rest of his life, using the limb as little as possible, that the thigh-bone of this limb was found to be considerably less in circumference, and shorter than the other. From more than one point of view, then, it appears that the real good of life does not consist in being exempt from the necessity of daily toil, and that happiness is more equally distributed than would seem on a cursory glance on the surface of society. Providence, who has made industrious employment the heritage of man, confers at least daily bread, contentment, and physical well-being, as the reward of industry; while He would seem to have ordained that the carriage, the luxurious dwelling, and the rich and varied edibles, shall tend in a measure to deteriorate the health and blight the happiness of those possessing them. The man who has nothing to do is ever restless, and craving for a good not yet enjoyed; his pleasures lose their character as such by becoming the business of his life, and satiety produces disgust. In brief, the industrious man, if his labours are not too exhausting, or carried on in an unhealthy atmosphere, but relieved by daily out-door exer-

Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN

cise and relaxation, will pass a happier life, and live longer than the indolent man; and though some occupations or professions may not be directly promotive of health, industry is man's best estate.

---

# CHAPTER II.

## Signs and Symptoms of Disease.

To recognise fully the various evidences of an unhealthy action of the system, a long course of study, including both healthy and morbid anatomy, is necessary. If the several points referred to in this chapter are carefully examined, with the different cases which come under our notice, they will aid us in arriving at a tolerably accurate idea of the nature and severity of the disease we have to treat. The following are several of the more common and well-known diagnostic signs.

### 1.—The Pulse.

The pulse is produced by the blood forced into the *aorta*, and thence into the various arteries of the body, by each contraction of the left ventricle of the heart; its character will consequently be modified by the condition of the heart, the blood-vessels, and of the blood itself.

In feeling the pulse, great gentleness should be observed, and it should be done as easily as possible, so as not to excite the action of the heart, which would defeat the object in view. The pulse may be examined in any part where an artery is so close to the surface that its throb can be plainly felt; but in general the most convenient locality is at the wrist. While examining the pulse, there must be no pressure exerted upon the artery in any part of its course by tight sleeves, ligatures, etc. The examiner should place

Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN

three fingers just above the root of the thumb and the joint of the wrist, with his thumb on the opposite side, so as to be able to regulate the pressure at will. Its frequency may thus be measured by the seconds' hand of a watch; but its peculiar characteristics, as indicative of various phases of disease, can only be appreciated by the educated hand of the medical man. By this method we can detect its rythm, its fulness, or softness; whether by compression it may be rendered almost imperceptible; whether it is strong and bounding, forcing the fingers almost from the arm; or hard, or small and wiry, like the vibrations of a string; or intermittent, striking a few beats, and then apparently stopping for one or two beats; or whether the pulsations flow into each other, small and almost imperceptible.

HEALTHY PULSE.—The healthy pulse may be described as uniform, equal, moderately full, and swelling slowly under the fingers; it is smaller and quicker in women and children. In old age, the pulse becomes hard, owing to the increased firmness or structural change in the arterial coats. The average number of beats of the healthy pulse in the minute, at different ages, is as follows:—At birth, 140; during infancy, 120 to 130; in childhood, 100; in youth, 90; in adult age, 75; in old age, 65 to 70; decrepitude, 75 to 80.

The healthy pulse is influenced, however, by the following and other conditions, which should be considered in estimating the character of the pulse as a diagnostic sign. It is faster in the female than in the male, the former exceeding the latter by from six to fourteen beats; but this difference only occurs after about the eighth year. It is quickened by exertion or excitement; it is more frequent in the morning. and after taking food; it beats faster standing than sitting, and sitting than lying; but it is diminished by cold, sleep, fatigue, want of food, and by certain drugs, especially *Digitalis*.

Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN

Pulse in Disease.—In estimating the differences of the pulse as signs of disease, allowances must be made for those sudden irregularities which are often observable under transient excitement or temporary depression.

*The rapid pulse*, especially if strong, full, and hard, indicates inflammation or fever; if small and very rapid, it points to a state of great debility, such as is often present in the last stage of typhoid fever.

*The jerking pulse* is marked by a quick and rather forcible beat, followed by a sudden, abrupt cessation, as if the direction of the wave of blood had been reversed, and is indicative of structural disease of the valves of the heart.

*The intermittent pulse* is that in which a pulsation is occasionally omitted, and is frequently owing to some obstruction in the circulation in the heart or lungs, or inflammation or softening of the brain, apoplexy, etc. In minor degrees, indigestion with flatulence may produce it.

*The full pulse* occurs in general plethora, or in the early stages of acute disease; while the *weak pulse* denotes impoverished blood, and an enfeebled condition of the system.

When the pulse resists compression, it is said to be *hard*, *firm*, or *resistant;* if it is small as well as hard, it is said to be *wiry*.

## 2.—The Tongue.

This organ affords important indications:—*Dryness* points to diminished secretion, and is common in acute and febrile diseases; *moisture* is generally a favourable sign, particularly when it succeeds a dry or furred condition. A *red tongue*, that is, preternaturally red, is common in the course of the eruptive fevers; but in gastric and bilious fevers, and in bad cases of indigestion, the redness is often limited to the edges and tip. When the tongue is *livid* or *purple*, there is defective oxygenation of the blood. The *furred tongue*,

Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN

is the most marked, and is common in inflammation and irritation of the mucous membranes, in diseases of the brain, in all varieties of fever, and in almost all acute and dangerous maladies. It should be added, some persons have usually a coated tongue on rising, without any other symptom of disease. A uniformly white-coated tongue is not very unfavourable; a yellow coat is indicative of disordered action of the liver; a brown or black, of a low state of the vital powers, and contamination of the blood. The gradual cleaning of the tongue, first from the tip and edges, shows a tendency to health; when the fur separates in patches, leaving a red glossy surface it is less favourable; when the crust is rapidly removed, leaving a raw or dark-coloured appearance, the prognosis must be unfavourable.

## 3.—Breathing.

Healthy inspiration is performed with great ease, by a nearly equal elevation of the ribs and enlargement of the chest; expiration is the natural return of the chest to its proportions during rest.

*Dyspnœa*, or difficult breathing, may result from spasm of the air passages, as in asthma; the presence of tumours, or false membranes, as in diphtheria and croup; or great swelling of the tonsils, or inflammation of the glottis; all of which obstruct the entrance of air to the lungs, and so occasion dyspnœa. Disease of the nerves which preside over the respiratory movements, or in that part of the nervous centres from which they proceed, may also produce serious difficulty of breathing. In pleurisy, fracture of the ribs, apoplexy, and cases of great exhaustion, when an insufficient supply of blood is sent to the great nervous centre, the brain, the respiratory movements are deranged, and otherwise greatly or even fatally obstructed.

The *odour* of the breath is also characteristic, and may be



Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN

most disagreeable, as the result of want of attention to cleanliness of the mouth and teeth, indigestion, putrid sore throat, etc. During the eruptive fevers, and in typhoid and pestilential fevers, it is both offensive and infectious.

## 4.—Pain.

This is often a most important indication of the nature and seat of disease, pointing to an interruption of the harmony of the bodily organs; the severity and persistency of the pain being in proportion to the disorganizing violence of this interruption. When attended with a throbbing sensation, consequent upon the heart's action, it is called *pulsating pain;* when with a feeling of tightness, *tensive;* when with heat, *burning.* Inflammatory pain is continuous, grows gradually worse, and is aggravated by touch or pressure. *Nervous* pain may be recognised by its disposition to follow a certain course, without being rigidly limited to one particular part; by its being subject to perfect intermissions; and by the suddenness with which it comes and goes. *Spasmodic* pain is mitigated by pressure, by frictions, and by applications of heat; it comes on suddenly with greater or less severity, terminating abruptly. Sometimes pain occurs, not in the part diseased, but in a distant one. Inflammation of the liver generally first shows itself by pain in the right shoulder; inflammation of the hip-joint, by pain in the knee; stone in the bladder, by pain at the end of the penis; disease of the heart, by pain down the left arm, etc.

## 5.—The Skin.

In health the skin imparts to the touch the sensation of an agreeable temperature, with just sufficient moisture to preserve its softness; it is also elastic, smooth, and neither too tense nor loose. A *harsh, dry, burning heat* of the skin is indicative of fever, and must ever be regarded as unfa-

Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN

vourable, especially in inflammatory conditions of internal organs. If this condition be followed by *perspiration*, and at the same time by an improvement in the general symptoms of the patient, it is a favourable indication. Great relief is usually experienced on the supervention of the sweating stage in ague, rheumatism, and inflammatory fevers. On the other hand, complications may be feared if perspiration ensue without any amelioration of other symptoms.

Partial or local perspirations indicate a deranged condition of the nervous system, or an affection of the organs contained beneath the perspiring surface. If perspirations occur after trifling exertion, they point to excessive weakness. Night sweats, of frequent occurrence, not only show debility, but when preceded by chills and fever, indicate a hectic and consumptive state of the constitution.

The *colour* of the skin is also diagnostic. A bluish tint of the skin indicates structural disease of the heart. A yellow colour points to biliary affections. A rich blush of the cheeks, especially if it be circumscribed, and the surrounding parts pale, indicates an irritable condition of the nervous system, or a tuberculous cachexia.

## 6.—The Urine.

The urinary organs are the kidneys and bladder, with their appendages. The kidneys secrete the urine from the blood, and by this process the blood is relieved of many impurities, which if retained would give rise to disease in the whole system. The secretion of the kidneys reaches the bladder through little channels *(ureters)*, and when the bladder is filled, the urine is discharged, through the urinary canal *(urethra)*.

*Healthy urine* is of a brightish yellow or straw colour, a tint darker in the morning than in the afternoon, yielding a

Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN

slight ammoniacal smell, devoid of unpleasant odour, and precipitating no deposit on standing, or only the merest trace of mucus, or of urates from a low temperature. In advanced age the urine becomes darker and slightly offensive; it is darker in persons who lead a very active life; different varieties of food also produce a marked effect both on the colour and odour of urine. The stream of urine should be round and large, and it should be passed about five or six times in twenty-four hours without any pain or straining.

The average *specific gravity* of healthy urine is 1,020, being in excess of water, which is the standard (1,000).

*In disease*, the urine presents many varieties, and furnishes valuable indications to the pathologist. Thus, it may be of a dark yellow or saffron colour, as in jaundice, or derangement of the liver; it may be red or high-coloured, and scanty, with quickened pulse, as in fever; it may be bloody or slimy, as in the affections of the kidneys or bladder; it may be watery (pale) and copious, as in nervous and hysterical ailments; it may be heavy, muddy, or of a purple colour, showing an unfavourable condition of the system; or it may be dark or black, indicating putridity. The urine may be passed too copiously or scantily, with pain, with effort, or it may be retained with difficulty. There may be a frequent or uncontrollable desire to micturate, with burning or scalding pain; or the pain may be only experienced in passing the last few drops.

When urine has to be examined, a little should be taken from the whole quantity that has been passed during twenty-four hours, as it varies greatly in its properties at different periods of the day.

The specific gravity of urine in Bright's disease, is 1,015 to 1,004; diabetic urine, 1,025 to 1,040.

Digitized by UNIVERSITY OF MICHIGAN
Original from UNIVERSITY OF MICHIGAN

# CHAPTER III.

## The Medicines, etc.

The following short description of the different forms of Homœopathic medicine used in the practice, is given for the sake of the uninitiated. The preparations are of four kinds, viz., *Tinctures*, *Pilules*, *Globules*, and *Triturations*.

Tinctures.—These contain the more active principles of the vegetable medicines, in a greater or less concentrated form, and are generally supposed to be quicker and more decided in their action, in acute diseases, than either pilules or globules. It is therefore advisable for those who reside at a distance from medical aid, to be furnished with such a selection of the tinctures as are adapted to sudden and acute diseases, in addition to a complete case of the pilules or globules. The selection recommended by the author, may be found page 47.

Pilules.—These are made of a porous, non-medicinal substance, and afterwards carefully saturated with the tinctures. They are very tangible; do not evaporate like tinctures, and retain their virtue for many years if unexposed. They are probably the *best* form of medicine for domestic use.

Globules.—In size, globules may be compared to poppy seeds: they are, therefore, very portable, and, on this account, are recommended to the missionary, emigrant, etc. They are prepared in the same manner as the pilules, but being so small, are less appreciable to the touch.

Triturations.—These are in the form of powder, containing a portion of the original drug, triturated with a given quantity of sugar of milk, and are necessary to the administration of the lower attenuations of insoluble medicines, such as *Calcarea*, *Carbo Vegetabilis*, *Hepar Sulphuris*, *Mercurius*, *Sepia*, *Silicea*, etc.

Digitized by UNIVERSITY OF MICHIGAN
Original from UNIVERSITY OF MICHIGAN

# LIST

OF THE

# PRINCIPAL MEDICINES PRESCRIBED IN THIS MANUAL,

*With their Latin and English Names, their Abbreviations, and the Potency recommended for general domestic use.**

| | Latin. | English. | Abbrev. | Dil. |
|---|---|---|---|---|
| 1. | **Aconitum Napellus** | Monk's Hood | *Acon.* | 3 |
| 2. | **Antimonium Crudum** | Crude Antimony | *Ant. Cr.* | 6 |
| 3. | **Antimonium Tartaricum** | Tartar Emetic | *Ant. Tart.* | 6 |
| 4. | **Arnica Montana** | Leopard's Bane | *Arn.* | 3 |
| 5. | **Arsenicum Album** | White Arsenic | *Ars.* | 3 |
| 6. | **Aurum Metallicum** | Metallic Gold | *Aur.* | 6 |
| 7. | **Belladonna** | Deadly Nightshade | *Bell.* | 3 |
| 8. | **Bryonia Alba** | White Bryony | *Bry.* | 3 |
| 9. | **Calcarea Carbonica** | Carbonate of Lime | *Calc. C.* | 6 |
| 10. | **Cannabis Sativa** | Hemp | *Cann. S.* | 1 |
| 11. | **Cantharis** | Spanish-fly | *Canth.* | 3 |
| 12. | **Carbo Vegetabilis** | Vegetable Charcoal | *Carbo V.* | 6 |
| 13. | **Chamomilla Vulgaris** | Wild Chamomile | *Cham.* | 3 |
| 14. | **China** | Peruvian Bark | *Chin.* | 1 |
| 15. | **Cina** | Worm-seed | *Cin.* | 3 |
| 16. | **Cocculus Indicus** | Indian Berries | *Cocc.* | 3 |
| 17. | **Coffæa** | Coffee | *Coff.* | 3 |
| 18. | **Colocynthis** | Bitter Cucumber | *Coloc.* | 3 |
| 19. | **Cuprum Metallicum** | Metallic Copper | *Cup.* | 6 |
| 20. | **Digitalis** | Foxglove | *Dig.* | 3 |
| 21. | **Drosera Rotundifolia** | Round-leaved Sundew | *Dros.* | 3 |
| 22. | **Dulcamara** | Bitter Sweet | *Dulc.* | 3 |
| 23. | **Ferrum Metallicum** | Metallic Iron | *Ferr.* | 3 |
| 24. | **Graphites** | Black Lead | *Graph.* | 6 |
| 25. | **Helleborus Niger** | Black Hellebore | *Hell.* | 3 |
| 26. | **Hepar Sulphuris** | Sulphuret of Lime | *Hep. S.* | 6 |
| 27. | **Hyoscyamus Niger** | Black Henbane | *Hyos.* | 3 |
| 28. | **Ignatia Amara** | St. Ignatius' Bean | *Ign.* | 3 |
| 29. | **Iodium** | Iodine | *Iod.* | 3 |
| 30. | **Ipecacuanha** | Ipecacuanha | *Ipec.* | 3 |

* For information respecting the properties and uses of the medicines in this list, their antidotes, etc., consult the Materia Medica at the end of the volume.

Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN

| | Latin. | English. | Abbrev. | Dil. |
|---|---|---|---|---|
| 31. | **Lycopodium Clavatum** | Wolf's Foot | *Lyc.* | 3 |
| 32. | **Mercurius Corrosivus** | Bichloride of Mercury | *Merc. C.* | 3 |
| 33. | **Mercurius Vivus** | Quicksilver | *Merc. V.* | 6 |
| 34. | **Nitri Acidum** | Nitric Acid | *Nit. Ac.* | 3 |
| 35. | **Nux Vomica** | Strychnos Nux Vomica | *Nux V.* | 3 |
| 36. | **Opium** | White Poppy | *Op.* | 3 |
| 37. | **Phosphorus** | Phosphorus | *Phos.* | 3 |
| 38. | **Phosphori Acidum** | Phosphoric Acid | *Phos. Ac.* | 3 |
| 39. | **Platinum** | Platina | *Plat.* | 6 |
| 40. | **Plumbum Metallicum** | Metallic Lead | *Plumb.* | 6 |
| 41. | **Pulsatilla** | Pasque Flower | *Puls.* | 3 |
| 42. | **Rhus Toxicodendron** | Poison Oak | *Rhus.* | 3 |
| 43. | **Sepia Succus** | Inky juice of Cuttlefish | *Sep.* | 6 |
| 44. | **Silicea** | Silex | *Sil.* | 6 |
| 45. | **Spigelia** | Indian Pink | *Spig.* | 3 |
| 46. | **Spongia Tosta** | Roasted Sponge | *Spong.* | 3 |
| 47. | **Staphysagria** | Stavesacre | *Staph.* | 3 |
| 48. | **Stramonium** | Thorn Apple | *Stram.* | 3 |
| 49. | **Sulphur** | Sublimed Sulphur | *Sulph.* | 3 |
| 50. | **Veratrum Album** | White Hellebore | *Verat.* | 3 |

Also the strong Tincture of CAMPHOR, which must be kept by itself, or the pilules; the latter may be kept, well corked, with the tinctures for external use.

In addition to the fifty remedies in the above list, a few others, at present less frequently employed, are occasionally prescribed. A brief description of the uses of such addenda may be found immediately following the Materia Medica, at the end of the volume.

Besides the Medicines in Pilules or Globules, the following twelve tinctures for internal use, in acute cases, should be added, namely:—Nos. 1, 5, 7, 8, 13, 14, 30, 35, 37, 41, 42, and 50.

## MATRIX TINCTURES, FOR EXTERNAL USE.

| | | | |
|---|---|---|---|
| ACONITUM NAPELLUS | $\phi$ | CALENDULA OFFICINALIS | $\phi$ |
| ARNICA MONTANA | $\phi$ | RHUS TOXICODENDRON | $\phi$ |

These are recommended to be kept, with the tinctures for internal use, Arnica plaster, strapping plaster, scissors, oiled silk, etc., in a compartment beneath, and separate from the medicines in the body of the chest.

Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN

DIRECTIONS FOR TAKING THE MEDICINES—*Tinctures* should be dropped into the bottom of a glass, and water, in the proportion of one tablespoonful to a drop, poured upon the medicine. It is desirable to drop the tinctures accurately; and to this end the bottle should be held in an oblique manner, with the lip resting against the cork; the bottle should then be carefully tilted (as shown in the accompanying drawing), when the tincture will drop from the lower edge of

the cork. A little practice will enable a person to drop one or any number of drops with great exactness. The vessel in which the mixture is made should be scrupulously clean, covered over, and the spoon not left *in* the medicine.* If it has to be kept several days, a *new* bottle and cork may be used.

*Pilules* or *Globules* may be taken dry on the tongue; but it is always better, if convenient, to dissolve them in pure soft water.

The *Triturations* should be placed dry on the tongue, and gradually swallowed, the mouth having first been rinsed with water.

* Glazed spoons, and graduated fine earthenware medicine cups, with covers, numbered 1 and 2, specially made for this purpose, and sold by Homœopathic chemists, are the most suitable. These vessels are recommended, as they protect the medicines from light and dust, and distinguish them from other liquids. Mixtures prepared in glasses or other domestic vessels are often thrown away in mistake, sometimes causing great inconvenience.

Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN

The most appropriate times for taking the medicines, as a rule, are, on rising in the morning, at bed-time, and if oftener prescribed, about an hour before, or two or three hours after, a meal. Under no circumstances should a patient be aroused from sleep to take medicine.

THE DOSE.—In determining the quantity and strength of doses, several circumstances must be taken into consideration, such as age, sex, habits, the nature of disease, etc. As a general rule, without reference to individual idiosyncrasies, the following may be stated as the proper dose in domestic practice :—

FOR AN ADULT, one drop of the tincture, one or two pilules, four globules, or one grain of the trituration.

FOR A CHILD, about one half the quantity.

FOR AN INFANT, one third.

One drop, or a pilule, is easily divided into two doses by mixing it with two spoonsful of water, and giving one spoonful for a dose.

REPETITION OF DOSES.—The repetition of the dose must be determined by the character of the malady from which the patient is suffering, the urgency and danger of the symptoms, and the effects produced by the medicines. In violent and dangerous diseases, such as cholera, croup, diphtheria, pleuritis, convulsions, etc., the remedies may be repeated every ten, fifteen, or twenty minutes ; in less urgent cases, every two, three, or four hours. In chronic maladies, every six, twelve, or twenty-four hours. When improvement takes place, the medicines should be administered less frequently, and gradually relinquished.

ALTERNATION OF MEDICINES.—To avoid the confusion resulting from mixing different remedies in one prescription, and to ascertain the pure action of each separate drug, homœopaths never mix several medicines together in one potion ; but in acute diseases, when the symptoms of the

Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN

malady are not covered by a single remedy, and a second one is indicated, the two may be given in *alternation;* that is, one medicine may be followed by another at certain intervals of time, and in a regular order of succession.

The alternation of drugs is sometimes necessary in acute diseases; in croup, for example, *Acon.* and *Hepar.*, or *Iod.* and *Brom.;* in pneumonia, *Acon.* and *Bry.;* in typhus, *Bry.* and *Rhus*, etc. The different stages of such diseases can rarely be accurately defined, one stage merging into another, requiring the alternate use of remedies, so as to form a kind of natural transition in the regular progress of the disease. In chronic diseases, the alternation of medicines is seldom necessary.

Drugs.—While on the subject of medicines, we would strongly dissuade from the practice of taking pills, herb teas, senna, salts, castor oil, etc. *Aperient drugs* especially, which are advertised and sold so freely as "patent" medicines, should be avoided, as they inflict an incalculable amount of injury, by over-stimulation, weakening the digestive organs, producing indigestion, costiveness, piles, and a gradual decline of the general health and strength; until at length, the patient falls a victim to some acute disease, or dies from a chronic affection of the parts on which the chief force of the drugs was expended.

Medicine Chest.—A case or chest to suit this manual, should contain the medicines mentioned in the following list, should be constructed expressly, and used for no other purposes; it should also be protected from light and heat, and kept apart from substances which emit a strong odour. Immediately after using a phial it should be corked again, and the corks and phials never changed from one medicine to another.

Corks.—If a cork decays, breaks, or is otherwise damaged, a new one should be at once substituted. Except for strong

Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN

acids, good sound corks are preferable to glass stoppers, as they more effectually prevent evaporation, preserve the virtue of the medicine, and are easily replaced when broken. Missionaries, emigrants, etc., should take an extra supply.

If the above directions are observed, the medicines may be kept unimpaired for years.

Digitized by UNIVERSITY OF MICHIGAN
Original from UNIVERSITY OF MICHIGAN

# PART II.

## MEDICAL AND SURGICAL DISEASES AND THEIR HOMŒOPATHIC TREATMENT.

---

## CHAPTER I.

### Fevers.

Fever (from *Ferves*, to burn,) has been thus defined:—After a preliminary stage of languor, weakness, loss of appetite, and some degree of shivering or chilliness, there succeeds preternatural heat of body, increased waste of tissue, quickened pulse, muscular debility, and general functional disturbance. This morbid state accompanies many diseases as one of their phenomena—*symptomatic* fever; but under certain circumstances we meet with *idiopathic* or *essential* fevers, which are quite independent of any local inflammation. In this chapter, we shall consider the following varieties:—1. Simple Fever; 2. Inflammatory Fever; 3. Typhoid Fever; 4. Typhus; 5. Intermittent Fever; 6. Hectic Fever; 7. Hay Fever.

### 1.—Simple Fever (*Febricula*).

This is the mildest form in which fever occurs; and, as it usually disappears in from eight to thirty-six hours, it is called an ephemeral disease. This condition, however, may

Digitized by UNIVERSITY OF MICHIGAN
Original from UNIVERSITY OF MICHIGAN

be the precursor of very serious disorders, and requires prompt attention.

SYMPTOMS.—It usually commences in the afternoon or evening by slight shiverings, lassitude and weariness, succeeded by heat, thirst, general uneasiness, quickened pulse, headache, and disturbed sleep. It generally terminates in gentle perspiration.

CAUSES.—Excessive exertion, exposure to sudden changes of temperature or a hot sun, derangement of the digestive organs, or mental excitement.

TREATMENT.—*Aconitum.*—When the skin is hot and dry, and whether or not the symptoms can be traced to any particular cause. A dose every two hours, until the skin becomes moist, and the pulse less frequent. Should the attack be one of *simple* fever merely, this remedy will be rapidly effectual: if it be the precursor of eruptive diseases or of some severe disorder, it is still the best remedy at this stage, and will materially modify its violence.

*Aconitum* has been appropriately termed the *Homœopathic lancet;* for in febrile attacks, whether slight or serious, it is the first remedy to be administered.

ACCESSORY MEASURES.—The patient should be kept cool and quiet, no stimulating food or drink taken, and all causes likely to occasion mental or bodily excitement carefully avoided.

## 2.—Inflammatory Fever.

This is a more severe form of fever than the one just noticed, continues much longer, and may be regarded as a modification of one of the two varieties next described.

SYMPTOMS.—Inflammatory fever is preceded by rigors, or alternate chills and flushes, followed by burning heat and dryness of the skin; hard, full, quick pulse; dryness of the tongue, mouth, and lips; white coating, or bright redness,

Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN

of the tongue; great thirst; highly-coloured and scanty urine; and constipation. To these may be added—pains in the loins, headache, loss of appetite, hurried breathing, delirium, etc. These symptoms usually continue for a few days, with an aggravation of them at night. Profuse perspiration, bleeding of the nose, or diarrhœa, eventually follow, and the fever gradually declines, leaving the patient weak, but otherwise well.

DANGERS.—This disease may degenerate into typhoid or other severe and fatal forms of fever, or it may attack some vital organ. If the treatment is relinquished too early, or proper care is not exercised during recovery, relapses are apt to occur, and prove troublesome and even dangerous.

CAUSES.—Suppressed perspiration, exposure to damp or cold, dwelling in damp houses, sudden changes of temperature, wearing damp linen, poor or insufficient diet; injuries; circumstances which cause shock to the nervous system, or debility.

TREATMENT.—*Aconitum* is found to be the principal remedy for all such symptoms as those above indicated; and it will most effectually calm the arterial excitement. A dose every two or three hours, or, in urgent cases, every half-hour or hour. A profuse *perspiration* following the administration of *Aconitum* may be taken as an indication of its beneficial action, and should be then discontinued.

*Belladonna* will be required, if, after repeated doses of *Aconitum*, there should be violent head-ache, redness and congestion of the face; a wild and fiery appearance of the eyes; throbbing and distension of the blood-vessels in the temples: wakefulness, or furious nocturnal delirium, and other well-marked cerebral symptoms. It may be frequently advantageously alternated with *Aconitum*. A dose every one to four hours.

*Bryonia*.—When, in addition to the ordinary symptoms

Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN

of inflammatory fever, there is a *heavy, stupifying headache*, aggravated by movement, and a sensation as if the head would burst; when the disease appears to be concentrated in the chest, with cough, oppressed and laboured breathing, *stitching pains in the side*, aggravated by movement and breathing; or when there is a *bilious complication*, with oppression at the pit of the stomach, yellow-coated tongue, nausea, constipation, shooting pains in the limbs, brown or bright yellow urine, and extreme irritability.

*Antimonium Crud.*—When gastric irritation is present, nausea, inclination to vomit, eructations, flatulence, etc., this will be found an excellent remedy.

*Opium.*—Great stupor; slow, stertorous breathing; a hard, full, slow or oppressed pulse; low delirium; deafness, or blindness.

*Arsenicum.*—Great *debility*, prostration, and rapid sinking, with very small, thready pulse; *burning* thirst; diarrhœa, with dark offensive discharges; cold perspirations, the symptoms being aggravated at night.

*Rhux Tox.*—Extreme weakness and prostration; low muttering delirium; picking at the bed-clothes; offensive, putrid, or bloody diarrhœa; dry, cracked tongue; great thirst, and scanty urine.

ADDITIONAL MEDICINES SOMETIMES REQUIRED.—*Mer., China, Canth., Nux Vom., Puls., Nit. Acid., Verat., or Sulph.*

ACCESSORY MEASURES.—The patient should be placed in a spacious, well-ventilated room, and protected from every-thing that is likely to cause excitement or prevent sleep, such as too much noise, company, heat, or too many or thick bed-coverings. In the preliminary stage, the use of the *hot foot-bath*, as recommended in the section on "Cold in the Head," or the *Wet Pack* described page 33, will often immediately restore the equilibrium of the system; or at least, greatly facilitate the cure. The linen should be

Digitized by UNIVERSITY OF MICHIGAN
Original from UNIVERSITY OF MICHIGAN

changed often, and all matters discharged from the body at once removed. The patient should be also sponged over at suitable intervals with tepid or cold water, as may be most agreeable. The application of water in this manner will prove a valuable adjunct to the medicinal treatment prescribed, and will accelerate those favourable changes which are now hoped for. As the fever rises, the patient loses all appetite for food, nature thus indicating that none is now required. As a beverage, water is the principal, and should be given in small draughts, frequently repeated. In acute fever, cold water is like the "Balm of Gilead." The patient may also take Gum-water,* sweetened with a little sugar, or barley water,* both of which are somewhat nutritive, often very grateful, and less stimulating than other forms of nourishment. Ripe grapes, roasted apples, etc., may also be allowed in moderation; and, after the urgent symptoms have abated, first arrowroot, then chicken broth, with a few crumbs of stale bread; as the appetite returns, beef-tea; and, finally, such articles of food and drink may be allowed, as will *partially* appease the appetite; for if the still weak and often irritable stomach is overloaded, a dangerous relapse may occur.

The treatment here recommended must of course be modified as circumstances require, our aim being to suggest such *general* directions as are often appropriate in inflammatory diseases.

If the fever occurs in debilitated persons, is protracted or attended with great and rapid prostration, beef-tea, or the essence of beef,* brandy and water, or brandy and egg mixture, should be early administered in small quantities, at regular and frequent intervals. For full directions, see "Hints on Nursing Fever Patients," in the next section.

* For directions to prepare, refer to Index.

Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN

## 3.—Typhoid Fever *(Febris Typhoides)*.

COMMON CONTINUED FEVER is divided into four forms, as follows:—(1) *Typhoid Fever*, sometimes described as Enteric, Intestinal, or Gastric Fever, Typhia, etc.; (2) *Typhus Fever*, often called Brain, Hospital, Camp, or Ship Fever; (3) *Relapsing Fever*, a variety of rare occurrence, followed by a prolonged convalescence, in which the pulse is remarkably low; and (4) *Febricula*, a simple variety of fever, not due to any specific poison, or a modification of one of the other varieties. This form has been previously described.

The first-named form, typhoid or enteric fever, we have considered with more than usual detail, having watched and treated a very large number of cases during a severe epidemic of this disease in 1864, a year remarkable as one of the *driest* upon record, only 15·7 inches of rain having fallen.

DEFINITION.—TYPHOID FEVER is *a continued fever*, lasting about twenty-three days, often longer, with an eruption on the chest, abdomen, or back, and attended with great *feebleness*, abdominal pains or tenderness, and diarrhœa, which increases with the disease, the discharges being copious, liquid, of a light-ochre colour, putrid, and often containing altered blood.

Although having many symptoms in common with typhus, it is an essentially different fever, and there are several considerations which render it important to be able early to identify the variety we may be called upon to treat. Thus, the *causes* of these fevers are different, and suggest sanitary regulations of an opposite nature; typhoid is less contagious than typhus; the tendency to a fatal issue varying, the treatment must be regulated accordingly; and, further, if not early recognised, patients may persist in their usual



Digitized by UNIVERSITY OF MICHIGAN
Original from UNIVERSITY OF MICHIGAN

occupations at a time when rest in bed would conserve the strength and moderate the progress of the disease. To render the recognition of these fevers easy, we subjoin the following table, page 59.

SYMPTOMS.—These may be arranged into the *accession* and the three *weekly periods.*

Unless the poison is very concentrated, there is a period of *incubation*, varying from ten to fourteen days, after which the disease sets in slowly and insidiously. The patient becomes languid and indisposed to exertion; is chilly and unwilling to leave the fire; the back aches, and the legs tremble; the appetite fails, and there are even nausea and sickness; the tongue is white, the breath offensive, and often the throat is sore; the bowels are deranged, sometimes confined, but oftener relaxed; the pulse is quickened and the sleep disturbed. These symptoms gradually increase, until at length the patient has a violent rigor, succeeded by heightened temperature, severe headache, and such muscular debility that he takes to his bed. This is the *accession.* The course of the fever is now set in, and may be divided into three weekly periods *(Watson)* from the accession.

1ST WEEK.—The prominent symptoms are, vascular excitement and nervous oppression, including a bounding pulse (90), great heat of skin, thirst, and obscured mental faculties; the patient cannot give a coherent account of himself, complains of little except his head, and is usually delirious at night. The abdomen enlarges, is resonant on percussion, and there is tenderness or even pain on firm pressure, especially in the right *iliac fossa*, near the termination of the small intestine; a peculiar *gurgling* sensation is imparted to the fingers when pressing there from the mixing of the gastric fluids.

Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN

# TABLE OF THE CHIEF DIFFERENCES BETWEEN TYPHOID AND TYPHUS FEVER.

| TYPHOID. | TYPHUS. |
|---|---|
| 1. *Typhoid* arises from *bad drainage*, foul drinking-water, as from a drain leaking into a well, decomposing animal matter, etc., combined with *high temperature*, deficient rainfall, certain electrical conditions, or an insufficient supply of ozone. | 1. *Typhus* arises from *overcrowding*, with *defective ventilation*, and spreads by contagion. |
| 2. Seldom attacks persons after forty, and is most common in *youth*, including childhood. | 2. Occurs at any age, but most frequently in *middle life*. |
| 3. Is more common among the *rich than the poor*. | 3. Is rare among the wealthy classes, excepting doctors, students, and *visiting* clergymen. |
| 4. Commences *slowly* and insidiously, the premonitory stage lasting a week or more. | 4. Comes on *quickly*. |
| 5. The eruption of the skin consists of ROSE-COLOURED spots, something like measles, appears upon the chest, abdomen, and back, comes in successive crops, and fades under pressure. | 5. The eruption is of a MULBERRY COLOUR, comes out only once (between the fourth and seventh days), lasts until the termination of the disease, and does not disappear under pressure. |
| 6. *Diarrhœa*, with light, ochre-coloured, watery stools, is very common, with congestion of the mucous membrane of the intestine, sometimes hæmorrhage, or even ulceration. | 6. The *brain* is chiefly affected, and the bowels are but little so. |
| 7. The expression is *bright*, the hectic blush is limited to the cheeks, and the pupils are dilated. | 7. There is a *dusky blush* on the face, neck, and shoulders, injected eyes, and contracted pupils. |
| 8. Continues at least *three weeks*, and often five or six, or even more. | 8. Runs its course in about a *fortnight*. |
| 9. *Relapses*, marked by a return of all the former symptoms, frequently occur, especially in certain epidemics. | 9. Relapses are of *rare* occurrence. |
| 10. The tendency to death is by *Asthenia* (exhaustion). | 10. The tendency to death is by *Coma* (morbid drowsiness). |

Digitized by UNIVERSITY OF MICHIGAN
Original from UNIVERSITY OF MICHIGAN

2ND WEEK.—Debility and emaciation become very marked, the muscles wasting as well as the fat; the urine becomes scanty and heavy, being loaded with urea from wasting of the nitrogenized tissues. At this time, from the seventh to the fourteenth day, the characteristic *eruption* generally begins to show itself, chiefly on the sternum and epigastrium, in the form of rose-coloured dots. These papulæ or pimples are few in number, round but slightly elevated, and insensibly fade into the natural hue of the surrounding skin. The quantity of the rash bears no proportion to the severity of the disease. "This successive daily eruption of a few small, very slightly-elevated, rose-coloured spots, disappearing on pressure, each spot continuing visible for three or four days only, is peculiar to and absolutely diagnostic of typhoid fever" *(Aitken)*. Although, however, the rose-coloured rash is never met with in any other disease, yet we have treated cases of true typhoid without being able to detect a solitary spot. Occasionally, also, *sudamina* appear, which are very minute vesicles, looking like drops of sweat, chiefly on the neck, chest, or abdomen. During the second week there is almost always *diarrhœa*, which generally increases towards the end of the week, and consists of semi-fluid, pale-yellow, frothy motions, of which there may be five, six, or even more in twenty-four hours. The *specific characters* of the evacuations in enteric fever are the following:—*fluidity; pale-ochre or drab-colour; sickly, putrid odour; absence of bile;* and *a floculent debris* of disintegrated agminated glands of the ileum. The floculent debris may be discovered by washing the discharges. In reference to the *colour* of the stools, it is worth notice that often before a patient takes to his bed, or looseness of the bowels sets in, the fæces are of a light-ochre colour, and furnish the most marked early sign of enteric fever.

Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN

3RD WEEK.—The debility and emaciation become extreme; the patient lies extended on his back, sinking towards the foot of the bed without making an effort to change or preserve his position. There is a bright and pinkish flush of the cheeks, which strongly contrasts with the surrounding pale skin; *sordes* occur on the mucous membrane of the mouth and lips; the tongue is dry and brown, or red and glazed, and often rough and stiff, like old leather; the urine is frequently retained from inaction of the bladder; the fæces pass without control, the tendons start from irregular, feeble contractions of the muscles; the patient picks vacantly at the bedclothes, in an attempt to pull black spots, like flies on the wing *(muscæ volitantes)*, which appear before the eyes, or attempts to grasp at or catch in the air; becomes deaf, and no longer knows his friends, and on recovery will have no remembrance of anything that has at this time ocuurred.

TEMPERATURE.—The information afforded by the application of the thermometer to the body in the diagnosis of enteric fever is very important. In all the acute specific fevers the temperature is abnormally raised, but in typhoid the elevation is *gradual*, while in most others it is *abrupt*. During the first three or four days, except a light-ochre colour of the fæces, we have no symptoms to indicate the *invasion* of so serious a disease except a *gradual* elevation of the temperature; but if, on the fourth or fifth day, the maximum temperature attained during the twenty-four hours be not 105°, the disease is most probably not typhoid fever. And, further, if on the first or second day the maximum temperature reaches 104°, the disease is some other acute fever, as the temperature only *gradually* attains such a degree in typhoid fever. At the commencement the diagnosis is difficult, inasmuch as the characteristic rash does not usually appear before the sixth, sometimes not till the twelfth, day of the disease; and, indeed, in children,

Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN

cannot sometimes be observed at any stage of the disease. Temperature is also an important element in the *prognosis*. Thus we have great *variations* in the temperature in typhoid fever, being low in the morning, and attains its maximum degree in the evening. The greater these fluctuations at the end of the second week, the more favourable is the attack, and the shorter will be its duration. If the temperature falls considerably in the morning, even though the evening rise is considerable, the prognosis is favourable. On the other hand, should the temperature during the second week remain continuously high, we may predicate a severe and prolonged attack. Again, the first probable indication in cases of persistent elevation of the temperature, is a decline in the morning temperature. When such a decline occurs, especially if it be repeated on subsequent days, even though the maximum temperature reached in the evening remain the same, we may be certain that the fever has begun to abate. It is true, a sudden fall in the temperature may be consequent on diarrhœa or hæmorrhage—probably the latter if it occurs very suddenly; but, usually, other symptoms would indicate such an occurrence.

DANGERS.—(1) *Hæmorrhage.*—This may occur from the ulcerated patches in the *ileum*, during the separation of the gland sloughs, and may be either capillary or from the opening of a large vessel. The discharge of blood may be so great as to be immediately fatal by syncope, or it may be remotely fatal, by exhausting the patient so that he has no power to bear up against the fever in its subsequent course. Sometimes without any escape of blood from the orifice of the bowel, the patient becomes suddenly blanched and dies of syncope. In such a case, a *post mortem* examination finds the intestines distended with red, clotted blood. (2) *Exhaustion* from *profuse and persistent diarrhœa*, in cases in which the catarrhal affection of the mucous membrane has

Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN

been very severe and obstinate. The evacuations weaken the patient rapidly, and hasten the fatal termination. (3) *Perforation.*—The ulceration may extend till the coats of the bowel are perforated and cause fatal peritonitis; but this is not so likely to happen till an advanced stage of the disease—about the fourth or fifth week—or just as convalescence seemed to be setting in. The symptoms of this occurrence are, a sudden pain and tenderness in the abdomen, with swelling, altered expression of the features, more or less nausea and vomiting, and death in one or two days. (4) *Congestion.*—The lungs may become congested, giving rise to bronchitis, pleurisy with effusion, pneumonia, or latent tubercle may be called into fatal activity; in short, there is a tendency, from the poisoned state of the blood, to congestion in the three great visceral cavities of the body—the head, the chest, and the abdomen. No disease presents, in the mode of its accession, in the course, gravity, and termination of the symptoms, so many varieties, complications, and accidents as typhoid fever, so that it has been considered almost as an *epitome of the whole practice of medicine.*

Mortality.—The reports of the Registrar-General show that in this country alone about 20,000 persons die annually of typhoid fever, and that probably 150,000 persons are laid prostrate by it. It proved fatal to the Prince Consort on the 14th of December, 1861, twenty-one days from the commencement of the attack. Several members of the royal family of Portugal also came to their untimely end by it; and Count Cavour, but the death of the latter was accelerated by venesection.

Cause.—According to Drs. Budd, Aitken, and others, the poison of typhoid fever does not originate in decomposing sewage, and is only transmitted by it, the specific poison being contained and transmitted by the discharges from the bowels of the person infected with the fever. The contagious

Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN

matter may convey the fever, in two principal ways:—(1) By percolating the soil into the wells which furnish drinking water; (2) By infecting the air through defective sewers or water-closets. In opposition to this hypothesis, Dr. Murchinson makes the following objections:—"(1) There are many facts which show that enteric fever often arises from bad drainage, independent of any transmission from the sick. The danger ensues when the drain becomes choked up, when the sewage stagnates and ferments, and when the transmission of a poison from any distant locality is impeded, if not completely arrested. (2) There are numerous instances of enteric fever appearing in houses having no communication by drain with any other dwelling. (3) There is no evidence that the stools of enteric fever are of such a virulent nature as has been stated. The attendants on the sick are rarely attacked. (4) The fact that the prevalence of the disease is influenced by temperature is opposed to the idea that it depends on a specific poison derived from the sick; but is readily accounted for on the supposition that the poison is generated by fermentation or decomposition."

We conclude, therefore, *that refuse animal and vegetable matters, if permitted to accumulate and decompose in seasons of drought generate a poison, which if not washed away or diluted by sufficient rain, rises into the air, or becomes diffused in the water; and which, when introduced into the body by these media, may produce enteric fever* (HARLEY). Hence we find it most prevalent in Autumn, and at the commencement of winter, after a long season of heat and drought. THE BEST PROPHYLAXIS, THEREFORE, ARE, AN ABUNDANT SUPPLY OF PURE WATER; SUFFICIENTLY INCLINED AND WELL-CONSTRUCTED SEWERS, WITH IMPERMEABLE WALLS; A WELL-DRAINED SOIL, AND REGULARLY FLUSHING THE DRAINS DURING DRY WEATHER COPIOUSLY WITH WATER. IF THESE MEASURES ARE EFFICIENTLY CARRIED OUT, TYPHOID OR ENTERIC FEVER MAY BE EXPECTED ENTIRELY TO DISAPPEAR.

Digitized by UNIVERSITY OF MICHIGAN
Original from UNIVERSITY OF MICHIGAN

TREATMENT.—A medical man should conduct the treatment; for just as no two human faces are precisely alike, so no two cases of *typhoid* or *typhus* fever ever present, from the commencement to the close, exactly the same symptoms. The following classification of symptoms will, it is hoped, aid the selection of the remedy.

*Inflammatory symptoms.*—Acon. and Bry.

*Great prostration.*—Ars., Mur. Acid, Verat., or Rhus.

*If the lungs are most involved.*—Phos. or Bry.

*If the brain.*—Bell., Hyos., Camph., Opi., Agaricus Mus., Stram., or Rhus.

*If the bowels.*—Bry., Ipec., Ars., Merc., Nux Vom., or Puls.

*Typhoid with putridity.*—Carbo Veg., Ars., Rhus., and Verat.

*Hæmorrhage from the bowels.*—Cup. Sulph., Nit. Acid, or Ipec.

*Nervous debility following fever.*—China, Fer. Sulph., or Ign.

The symptoms indicating some of these medicines are described under "Inflammatory Fever," page 53-4. We shall only add the following distinctive features.

*Aconitum.*—A dose every two or three hours when *inflammatory* symptoms predominate.

*Bryonia.*—Bitter taste, *brown-coated*, rough *tongue*, nausea, *confined bowels*, stupifying headache, cough, with *stitches in the chest*, and irritability. During the *inflammatory stage*, *Bry.* and *Acon.* in alternation; in low forms of the disease, *Bry.* and *Rhus.*

*Belladonna.*—Redness of the face; bright, shining eyes, and dilated pupils; distension of the veins, and throbbing of the arteries of the head; startings during sleep, or continued wakefulness.

*Hyoscyamus.*—Constant and furious delirium; sudden

Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN

starts and outcries; twitching; great nervous excitability. This remedy has similar indications to *Belladonna*, and often succeeds when that fails.

*Arsenicum.* — Extreme *prostration;* insatiable *burning* thirst; diarrhœa; *feeble*, intermittent, almost imperceptible pulse. If to these symptoms are added *fœtid evacuations*, cold perspirations, rattling respiration, *Carbo V.* should be administered in alternation; a dose every three or four hours. *Arsenicum* is a remedy of priceless value in enteric fever, and it should be administered somewhat early, as it tends to prevent extreme prostration.

*Baptisia Tinctoria.*—This remedy is useful in all stages of typhoid fever. In large doses, long continued, it is said to effect changes in the blood similar to those in typhia, and a condition of the fluids of the body generally resembling that which occurs in low fevers.

*Hydrochloric Acid* (A) in two-drop doses, every three hours, has, in my hands, been highly successful in the treatment of typhoid fever, particularly when the pulse has been very slow and weak, the tongue morbidly clean, with great nervous depression, and when the patient has complained of a constant sour taste in the mouth; but, in proportion as the tongue has been coated dry or brown, and the pulse has been accelerated, so have I found the efficacy of *hydrochloric acid* weakened (Dr. Simmons).

*Muriatic Acid.*—Constant stupor, the patient *sinks down in the bed*, moans during sleep, and mutters when awake; there is a paralytic condition of the tongue, and dryness of the mouth and throat. These symptoms will be best met by giving *Mur. Acid* in alternation with *Opium*, a dose every three or four hours.

*Mercurius.*—Copious debilitating *perspirations;* diarrhœtic evacuations, greenish or yellowish; thickly-coated tongue; tenderness at the pit of the stomach.

Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN

*Carbo Veg.*—Offensive smells from the patient; putrid, involuntary evacuations; deep-red urine; pinched and sunken countenance; burning in the abdomen and at the pit of the stomach; cold extremities; rapidly sinking powers, and scarcely perceptible pulse.

*Nitric Acid.*—Hæmorrhage from the bowels, or discharges of a greenish, slimy mucus, with extreme tenderness of the abdomen; scalding urine; sore mouth; fœtid perspiration; and tendency to collapse. A dose every four hours.

*China.*—When the tongue becomes clean and moist, the pulse soft, and all feverish excitement has disappeared, this remedy may be administered with the best effects.

ACCESSORY MEASURES.—The points that require special attention in the management of fever patients are referred to in the following "hints."

HINTS ON NURSING FEVER PATIENTS.—The unremitting attention of an experienced, *trained* nurse is a part of the treatment quite as essential as the administration of medicine. To aid to some extent in the performance of this duty, the following *general* suggestions are offered. The medical attendant alone can furnish directions adapted to *special* cases. Under such circumstances it is the nurse's duty faithfully to carry out his directions, and to report to him at each visit the symptoms and progress of the patient, and the effects of the treatment.

1st. *The Sick Room.*—The following points should be studied: (1) It should be *airy*. If practicable, the patient should be placed in a spacious, well-ventilated apartment, which allows an uninterrupted admission of fresh, and the free escape of tainted, air. Fresh air can only be ensured by an open window or door, or both. It is generally desirable to have a blazing fire kept burning night and day, both in summer and winter, as this assists the efficient ventilation of the room; but the patient's head should be protected from

Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN

its direct effects. The poison of the disease being thus diluted with atmospheric air loses its power and so becomes inoperative. The room should be divested of all superfluous furniture—carpets, bed-hangings, etc. (2) It should be *darkened;* not by excluding all light and air, by closed shutters, or closely-drawn bed-curtain, but by letting down the window-blinds and securing a *subdued light*, and by protecting the patient's face from any glare, as from gas or candles. (3) The sick room should be *quiet.* Silk dresses and creaky boots should not be worn; the crackling noise made by anyone reading a newspaper is often most distressing to invalids; the tones of the voice should be gentle and subdued, but whispering avoided; all unnecessary conversation must be forbidden, and noise shut out. (4) The *temperature* of the room should be regulated by a *thermometer*, and maintained at an even temperature, not exceeding 55° Fahr. The sensations of the nurse cannot be depended upon as a sufficient guide; but the thermometer, suspended out of a current of air and the direct influence of the fire, will indicate the proper temperature at which the room should be kept.

2nd. *Rest.*—The patient should be disturbed as little as possible, and enjoy the most complete rest during the whole course of the disease. The importance of this is proved by *post-mortem* examinations, which often show vigorous attempts on the part of neighbouring structures to limit, by union and adhesion, the results of perforation, obviously indicating, in practice, the necessity of absolute rest throughout the disease (AITKEN). Any efforts made when the ulcers in the ileum were cicatrizing would affect the system unfavourably, and re-excite that morbid action which might end in perforation of the bowel.

3rd. *Cleanliness.*—The personal and bed linen should be frequently changed, and all matters discharged from the

Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN

body immediately removed. The mouth should be frequently wiped out with a soft wet towel, to remove the *sordes* which gather there in severe forms of fever. The patient's body should be sponged over as completely as possible at suitable intervals with tepid or cold water, as may be most agreeable to the feelings, and quickly dried with a soft towel. Sponging the whole surface of the body with cold or tepid water should never be omitted in fever, as it reduces the excessive heat, soothes the uneasy sensations, and is indispensable in maintaining that cleanliness which is so desirable in the sick room. Cold water thus applied acts as a tonic, giving vigour and tone to the relaxed capillaries, in which the morbid action probably chiefly goes on. Frequent washing with soap and water also tends to prevent the occurrence of *bed sores*, by keeping the skin in a healthy condition.

4th. *Hydropathic Applications.*—In addition to the sponging and washing just recommended, I have found the *abdominal wet compress* of great utility; it tends to diminish excessive diarrhœa, checks the spread of ulceration of the ileum, and obviates perforation. The compress is made of three or four thicknesses of coarse linen, sufficient to cover the whole abdomen, including the liver and spleen, and extend down to the pubes. This is to be wrung out of cold or tepid water, covered with oiled-silk or India-rubber cloth, to retain the warmth and prevent too rapid evaporation; it may be simply laid on the abdomen, or if the patient is restless it should be secured by three broad tapes round the hips and waist. The compress should fit as closely as possible, and displacement be avoided; otherwise air penetrates between it and the skin, and cold, instead of a moist heat, is produced. As long as the compress continues moist and warm it need not be disturbed; but as soon as it becomes dry it should be re-wetted. Should lung

Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN

complications arise, the compress should be applied to the chest as well as the abdomen.

During the early course of the fever, the *Wet Pack*, described page 33, is an invaluable application, and tends, as the author has found, to give a mild character to the disease.

5th. *Beverages.*—In mild cases, and at the commencement of all fevers, pure water, toast-and-water, gum-water, sweetened with a little sugar,* barley-water, lemonade, or soda-water is nearly all that is necessary. Cold water is an agent of supreme importance, and acts favourably by lowering the excessive temperature, and proves a valuable adjunct to the medicinal treatment prescribed, by accelerating those favourable changes which are anxiously hoped for.

6th. *Diet and Stimulants.*—In a disease which lasts three weeks, often five or six, in which the waste of tissue is great, and in which common food cannot be taken, it is a point of high importance to supply the patient with nourishment appropriate to his condition; otherwise he will sink before the disease has completed its course. The following are the chief points to be attended to in the diet of fever patients. All the aliments given should combine both food and drink in a *fluid* or semi-fluid form, until recovery has fully set in. The digestive functions being more or less completely suspended, the nourishment given must be only such as requires the simplest processes for its assimilation. Examples of this form of nutriment are the following:—*milk; thin arrowroot with milk, wine-whey*, prepared by adding one pint of good sherry to two pints of boiling milk, and straining after coagulation; *blancmange of isinglass or ground rice; yolk-of-egg*, beaten up with a little brandy, wine, tea, cocoa, or milk; *beef-tea and animal broths;* and

* For direction to prepare, see the Index.

Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN

*alcoholic drinks.** The list might easily be extended, and no good nurse will overlook the importance of *variety* in the nourishment and delicacies for the sick room. *Milk* is an important article in the treatment of fever patients. "Milk or buttermilk is with me," says Dr. Gairdner, "the staple food in typhus; and I will even say that I know of no other food that can be depended on. Yet I see, and always see with a new surprise, descriptions of the treatment and dietetics of fever in which not a word is said about milk, and a great deal about beef-tea, wine, brandy, and all manner of things supposed to be more strengthening, or stimulating than milk diet. Now, I suppose I have not treated a single case of fever of any kind for the last fifteen years without milk, and I always proceed on the understanding that milk in fever is the one thing needful as diet, always to be given, and given liberally, whether specially ordered or not." If, however, fever is attended by symptoms of decided prostration, feeble pulse, a confused and dusky countenance, or hectic, beef-tea or the essence-of-beef should be added to the milk diet and given early. The beef-tea or the broths may be thickened with well-cooked rice or vermicelli, isinglass, or crumbs of bread. The egg-mixture is of great utility; the yolk should be well beaten with a table-spoonful of brandy or wine and as much water, or in a little milk or cocoa, and two or three taken daily. If the prostration is very great notwithstanding the use of the

* "The writer has no intention to side in the controversy concerning the food character of alcohol. He accepts the evidence that much ingested alcohol is got rid of by the excretory organs, or is retained for some time in the tissues after the manner of many medicines. But with food in its widest sense, as what keeps up the vital functions, the physician will have little hesitation in classing alcohol, who has observed the common case of an habitual tippler maintaining for years a fair standard of bodily health upon a quantity of other nutriment wholly insufficient by itself to maintain such health. And to such a case a fever patient offers some resemblance. He, too, may not be able to take enough of other food to maintain him, but alcoholic drinks will help him not to starve. And thus the writer judges them to have a food-value apart from their medicinal action" (BUCHANAN).

Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN

nourishment already suggested, wine or brandy, diluted, may be added. A little good wine with an equal quantity of water may be given every hour or every two hours. *Effervescent* wines must be avoided. Dr. Harley advises, six to eight ounces of wine or four ounces of brandy every twenty-four hours when the pulse is of moderate force and under 120. When the pulse ranges between 120 and 130, and is small, double these quantities. If the patient enjoys these stimulants, and desires their continuance, they may be regarded as signs of their utility. The effects of the wine or brandy should, however, be carefully watched by the medical attendant, and only given in proportion to the demands of the system, the bulk and force of the pulse being the main guides. As a rule, stimulants, except in small quantities, are not required by children, or persons who can take a sufficient quantity of other kinds of nourishment, or early in the disease. On the other hand, aged persons, and cases of great prostration, or in which the extremities are cold and the general surface livid, almost invariably require alcoholic stimulants. Under any circumstances, if stimulants aggravate existing symptoms, their employment should be modified or altogether discontinued.

Fever patients are often unable to relish or swallow nourishment in consequence of the dry and shrivelled state of the tongue, and it often becomes necessary to put a little lemon juice and water into the mouth before offering food; in a minute or two the mucous membrane becomes soft and nourishment may be swallowed and enjoyed. *No food to be kept in the sick room.*—Miss Nightingale's suggestion on this point is so important, but, we regret to observe, so often disregarded, that we venture to repeat it here. It is this—do not keep the food, drink, or delicacies intended for the patient, in the sick room or within his sight. The air of the apartment is liable to

Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN

deteriorate them, and the sight of them, always before his eyes, to excite disgust. Rather take him up at the fitting time, and by way of surprise, two or three teaspoonsful of jelly, or as many fresh grapes as he may consume at once, or one or two segments of an orange. Or, if it is appropriate to his condition, a small cup of beef-tea, covered, with one or two narrow slips of toasted bread, just from the fire; this is much preferable to the attempting to swallow even a less quantity from a basinful that has been kept for many hours within the reach of the patient's hand and eye.

Lastly, nourishment should be given with strict *regularity;* in extreme and long continued cases of prostration, every hour or half-hour, both day and night. Frequently the functions of digestion and assimilation are so greatly impaired, that the largest quantity of nourishment must be given to sustain the patient till the disease has passed through its stages. Dr. Graves was so strongly impressed with the importance of nourishment in fevers, as to have said that he desired no other epitaph than that *he fed fevers.*

7th. *Watching Patients.*—Fever patients should be attended and watched by day and by night. Their urgent and incessant *rants* require this, and their *safety* demands it. Instances have occurred of patients, in the delirium which so frequently attends this disease, getting out of bed, and even out of the window, during the absence of the nurse, and losing their lives from injuries thus sustained.

8th. *Moderation in convalescence.*—Relapses are very liable to occur from indulging the appetite too freely during convalescence; and, therefore, toast and black tea, jellies, light bread-puddings, white fish, mutton broth, a small quantity of tender chicken, broiled mutton, etc., with a little stale bread and boiled rice instead of potatoes, may only be allowed in great moderation; but never to the capacity of the appetite, till the tongue is quite clean and



Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN

moist, and the pulse and skin have become natural. If stimulants have been given they should be gradually withdrawn as the quantity of nutritious food is increased. Even when convalescence has somewhat advanced, moderation should still be exercised, as the appetite is often excessively craving.

9th. *Unnecessary approaches.*—These should be guarded against by persons in health, especially by the young, in whom susceptibility to disease is greatest. Another precaution is, not to visit the sick chamber after long fasting. The great protective influence, however, is *fresh air;* this neutralizes fever poison, and should be uninterruptedly passing through the patient's apartment. With open door and windows, and by avoiding the patient's breath, and the exhalations from his person, till they become well diluted with pure air, fever cases of the very worst kind may be visited fearless of danger. In the particular case of *typhoid fever*, the following additional precautions have been suggested by Dr. Aitken, with the view of checking the spread of this disease:—

(1.) All discharges from fever patients should be received on their issue from the body into vessels containing a concentrated solution of chloride of zinc.

(2.) All tainted bed or body linen should, immediately on its removal, be placed in water, strongly impregnated with the same agent.

(3.) The water-closet should be flooded several times a day with a strong solution of chloride of zinc; and some chloride of lime should be also placed there, to serve as a source of chlorine in the gaseous form.

(4.) So long as fever lasts, the water-closets should be used exclusively as receptacles for the discharges from the sick.

Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN

10th. *Change of air.*—The salutary influence of change of climate and scene to persons who have suffered from a serious attack of fever can scarcely be overestimated, and if the place or climate has been chosen with intelligence and judgment, the happiest results may be anticipated. If the change of air includes agreeable society, and excludes all business anxieties, it is a remedy of the very highest importance for bracing up the system, and restoring the patient to his usual health and strength. Often any painful symptoms remaining are at once arrested; the current of the thoughts is turned into new and healthy channels; and in the luxuriance of nature, in the grand scenery of mountainous districts, or inhaling the tonic air of the sea coast, the eyes beam forth with new life, the forces of the circulation are raised and equalized, the mind is unencumbered, and all the functions of the body are pleasantly and healthily performed. After recovery from a serious attack of fever, the whole man becomes changed, and there seems to be a renewal of youth. Nothing gives such a beneficial direction to this change, or renders it so perfect as a temporary removal to a suitable climate and locality. We fully endorse Dr. Aitken's statement,—*No man can be considered as fit for work, for three or four months after an attack of severe typhoid fever.*

11th. *General Preventive Measures.*—To prevent bad forms of fever, the cholera, and other acute and dangerous diseases, the following suggestions should be carried out:—abstinence from alcoholic drinks; temperance in eating and drinking; healthy and cheerful amusements, especially in the open air; industrious occupations, short of exhausting labour; fear should be dismissed from the mind as a base passion, beneath the dignity of man; the light of the sun and fresh air should be freely admitted into every room of the house; all stagnant water around or under the house should

Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN

be drained off; filth—animal and vegetable matters—not allowed to accumulate and decompose about sinks or drains; personal cleanliness should receive due attention, and a sponge, shower, or plunge bath be taken daily; and, lastly, a small bottle of the strong *tincture of Camphor* (the Homœopathic preparation), should always be accessible, so that when unavoidably exposed to infectious and dangerous influences, a drop may be taken before the poison has extended to the blood. As general preventive means, these hints are of the highest importance, and may be carried out in the confident hope of exemption from the threatened evil. The words of Heberden embody a law of nature, the recognition of which is a matter of the highest importance:—"THE SEEDS OF VARIOUS KINDS OF DISEASE, LIKE THOSE OF VEGETABLES, WILL ONLY SPRING UP AND THRIVE WHEN THEY FALL UPON A SOIL CONVENIENT FOR THEIR GROWTH."

## 4.—Typhus Fever *(Febris Typhus)*.

DEFINITION.—Typhus is an acute specific form of fever, highly contagious and infectious, continuing from fourteen to twenty-one days, attended with a lethargic or confused condition of the intellect, and of an eruption on the skin of a measly or mulberry rash, and is the accompaniment of privation, overcrowding, and defective ventilation.

SYMPTOMS.—The precursory stage varies, but is usually short, so that the patient yields to the disease within the first three days, giving up his employment and taking to his bed; in this respect strongly contrasting with the protracted invasive stage of typhoid. Sensations of uneasiness, soreness, or fatigue, loss of appetite, headache, and disturbed sleep, are the early symptoms. The patient is often seized by a rigor, but less marked and severe than in small-pox or internal inflammations, usually succeeded

Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN

by dry heat of skin, thirst, quick pulse, white, dry, often tremulous tongue, scanty and highly-coloured urine, sometimes vomiting, heavy look or stupor, prostration, and muscular pains; towards evening there is irritability or restlessness, and if sleep occurs, it is disturbed by dreams, or frequent sudden starts, and is in consequence unrefreshing.

The general appearance of a typhus patient is very marked and affords to the practised eye a ready means of diagnosis. "In an average attack the patient lies prostrate on his back with a most weary and dull expression of face, his eyes heavy and with some dusky flush spread uniformly over his cheeks. In the advanced stage of a severe attack he lies with his eyes shut or half-shut, moaning and too prostrate to answer questions, to protrude his tongue, or to move himself in bed; or the mouth is clenched, the tongue and hands tremble, and the muscles are twitching and half rigid. The dryness of the mouth, the sordes on the teeth and lips, the hot dry skin, and the deafness, are other symptoms which strike an observer so immediately as to deserve to be included in the physiognomy of the disease."*

During the first week the patient complains much of headache, noises in the ears, and, subsequently, deafness. The conjunctivæ are injected, the pupils contracted, painfully sensitive to light, and therefore often closed. He becomes irritable, and his answers short and fretful. After the lapse of a period usually between the fourth and eighth days, the mind passes from a state of excitement to one of delirium. This symptom is usually more severe and appears earlier when the disease attacks persons in the upper classes of society, in consequence, no doubt, of the greater activity of their brains. It is at first one of confusion of ideas as to time, place, persons, and even personal identity, with vague

* "A System of Medicine." Vol. I.

Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN

rambling talk, of which occasionally he seems conscious, and from which he can be roused. Afterwards the delirium may become active and maniacal, or low and muttering. The patient often fancies that he is two or three persons, and the subject of a series of miseries and violence; confined in a dungeon, pursued by enemies from whom he vainly flies, or with whom he struggles, and he attempts to spring from bed to reach the door or window to fly from his tormentors. Sometimes the delirium passess into a heavy stupor, with tremulousness of the tongue and hands, and twitching of the muscles *(subsultus tendinum)*; but in favourable cases it gradually subsides in two or three days, the powers of the mind begin again to dawn, the countenance assumes a more tranquil aspect, sleep becomes natural, and at length convalescence is fully established.

Diarrhœa is not of infrequent occurrence, but sometimes the bowels are confined; the evacuations are natural or dark, and contrast strongly with the yellow-ochre colour of the stools in enteric fever; finally the evacuations may be involuntary.

The Pulse.—In typhus the pulse is rarely less than 100, sometimes 120, or 130, or even 140 in the minute. In the last case, however, in adults, it is indicative of great danger. As a rule the pulse pursues a gradually increasing rate of frequency up to the 9th or 12th day, and afterwards undergoes a correspondingly regular decline. Cases so marked almost invariably get well. On the other hand, departures from this gradual rise and fall in the pulse, especially if considerable, mark the existence of complications or dangerous symptoms. In fatal cases of typhus the pulse becomes more and more rapid, and also weaker and smaller up to the very hour of death. The first glimpse of dawning convalescence is afforded by watching the pulse; the temperature, as measured by the thermometer, is a valuable

Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN

but less available sign; and whenever the pulse is fairly on the decline, especially if it gets stronger and fuller, we may confidently conclude that the patient will recover. The *crisis* of typhus is often indicated by no other symptom than the gradual decline of the pulse, after having gradually reached its maximum degree of rapidity. There may be no marked perspiration, no critical diarrhœa, no striking alteration in the urine, or startling phenomena of any kind; the only trace of crisis, being the gradual decline of the fever as indicated by the fall in the pulse and the thermometer.

Distinctive Characters.—The *typhus rash* appears between the fourth and seventh days, and consists of irregular, slightly elevated spots, of a mulberry hue, disappear on pressure, and may be single and few, or numerous and large; in the latter case two or more spots coalesce. They are usually first seen on the abdomen, and afterwards on the chest and extremities; and the number and depth of colour of the spots are in proportion to the severity of the disease. From the first to the third day after the appearance of the rash, no fresh spots appear; and each spot, although it undergoes certain changes, continues visible till the whole rash disappears, and the disease terminates. In fatal cases, the typhus spots remain after death.

The *odour* of the poison of typhus is very characteristic, and it is described as offensive, pungent, and ammoniacal. Nurses, familiar with the disease, are thus alone able to recognise it, and estimate the amount of danger by the badness of the smell.

*Prominence of Nervous Symptoms.*—It is from the constancy and prominence of these symptoms that the name of typhus was first employed, and it is almost certain that it is through the nervous system that the poison of the disease chiefly operates. Hence extreme restlessness,

Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN

ringing noises in the ears, and low delirium or stupor, are invariably present to a greater or less extent. In fatal cases, about the ninth or tenth day, delirium merges into profound coma, or the condition described as *coma-vigil* may come on. In this latter condition, the patient lies on his back with his eyes wide open, and certainly awake, but indifferent or insensible to everything transpiring around him. His mouth is partially open, his face expressionless, and he is incapable of being roused. At length the breathing becomes nearly imperceptible, the pulse rapid and feeble, or it cannot be felt, and the transition from life to death occurs without any gleam of returning consciousness, and can only be recognised by the eyes losing their little lustre, and the chest no longer performing its slow and feeble movements.

Unfavourable Indications.—Early, furious, and persistent delirium, with complete sleeplessness; *coma-vigil; convulsions;* involuntary twitchings of the muscles of the face and arms; abundant and *dark rash*, nearly unaffected by pressure; great duskiness of the countenance, or lividity of the surface; involuntary, uncontrollable diarrhœa; suppression of urine, or albuminuria; a brown, hard, *tremulous tongue;* a temperature gradually rising to 107° Fahr., or higher; a great sudden elevation of temperature in the third week; a small, weak, irregular or imperceptible pulse, stationary at above 120°; bed sores, or inflammatory or erysipelatous swellings; a strong presentiment of death on the part of the patient, etc.

Causes.—*Overcrowding, with defective ventilation, and destitution*, and thus is the scourge of the poor inhabitants of our large towns. *Overcrowding* includes the several conditions of overcrowding of rooms by too many occupants; overcrowding of dwelling-houses upon too circumscribed area, preventing the proper ventilation of streets and houses; want of personal and domestic cleanliness. A spacious

Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN

dwelling, with free ventilation, robs the disease of its power, and arrests its spread to others. *Privation*, as famine through failure of crops, commercial distress, strikes, hardships in war, etc; this predisposes to typhus by deteriorating the constitution. Before the days of Howard, typhus was never absent from our prisons and hospitals; it was the scourge of the armies of the first Napoleon, and it decimated those of the Allies in the Crimea, the disease varying among the troops exactly in proportion to the degree of privation and overcrowding. In 1818, and again in 1847, the failure of the potato crop in Ireland gave rise to an epidemic of this fever, so that it is estimated that an eighth part of the entire population was attacked. There is undoubted evidence that the poison of typhus may be generated *de novo*, and that the circumstances under which this occurs are those above stated, namely, overcrowding, defective ventilation, and destitution. There seems ground for believing that the poison is chiefly transmitted by the exhalations from the lungs and skin; the material poison *(materies morbi)* being inhaled or swallowed, and so finds ready admission to the blood, upon which it exerts its morbid influence. The effects of bad ventilation in the development of typhus is well expressed in the following words: "If any person will take the trouble to stand in the sun, and look at his own shadow on a white plastered wall, he will easily perceive that his whole body is a smoking mass of corruption, with a vapour exhaling from every part of it. This vapour is subtle, acrid, and offensive to the smell; if retained in the body it becomes morbid; but if re-absorbed, highly deleterious. If a number of persons, therefore, are long confined in any close place not properly ventilated, so as to inspire and swallow with their spittle the vapours of each other, they must soon feel its bad effects. Bad provisions and gloomy thoughts will add to their misery, and soon breed the *seminium* of a pestilential fever, dangerous

Digitized by UNIVERSITY OF MICHIGAN
Original from UNIVERSITY OF MICHIGAN

not only to themselves, but also to every person who visits them or even communicates with them at second hand. Hence it is so frequently bred in gaols, hospitals, ships, camps, and beseiged towns. A *seminium* once produced is easily spread by contagion."

TREATMENT.—It is a question whether typhus can ever be cut short, or the definite course of the disease altered by the administration of remedies; some contend that it may be broken up in the first stage, especially by the combination of Hydropathic appliances with the use of Homœopathic remedies; others believe that the disease must have its course. However, we have ample experience to prove that in the great majority of cases the violence of the symptoms can be held in check, the patient's comfort greatly promoted, and convalescence hastened, by judicious treatment.

The remedies appropriate for the ordinary run of cases are the following:—*Acon.*, *Ars.*, *Bell.*, *Bry.*, *Hyos.*, *Opi.*, *Rhus*, *China.*

Remedies for special symptoms are prescribed in the following table:—

1. *Inflammatory Symptoms.*—Acon. and Bell.
2. *Cerebral Symptoms.*—Hyos., Bell., Rhus.
3. *Typhus with extreme Prostration.*—Ars., Carbo Veg., Phos. Ac.
4. *With Pulmonary complications.*—Bry. Phos.
5. *With Gastric derangements.*—Ipec., Nux Vom., Puls., or Bry.
6. *With Stupor.*—Opi., Rhus.
7. *With Sleeplessness.*—Coffæa, Bell.
8. *With Putridity.*—Carbo. Veg., Ars., Verat.

As we have described the treatment of typhoid with considerable detail, and as many of the symptoms common

Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN

to that fever are present in typhus, we shall only offer the following characteristic symptoms:—

*Belladonna.*—Inflammatory typhus chiefly with *brain symptoms;* fever commencing with rigors in the *evening or at night;* redness of the face; dilated pupils, with wild, unsteady expression.

*Hyoscyamus.*—In the delirium of typhus, with *sudden startings as in affright*, this remedy should never be overlooked; it often acts like a charm after *Bell.* has effected but little improvement.

*Opium.—Stertorous breathing;* low moaning noise; muttering delirium, or delirium after a short sleep; *dusky* flush of the countenance; picking at the bed-clothes; *coma vigil;* involuntary discharges of fæces and urine.

*Rhus Tox.*—In the *low forms of typhus*, with great debility, almost amounting to paralytic weakness of the limbs; small and quick, or weak and slow, pulse; anxious and depressed mood; oppression of the chest.

*Arsenicum.*—Rapid prostration of strength; *sunken countenance* and eyes; red, brown or blackish, dry, cracked, and trembling tongue; insatiable, *burning thirst;* sensation as of hot water coursing through the veins; rapid, small, irritable pulse.

Accessory Measures.—The points of greatest importance may be briefly summed up as under: (1.) The patient should be placed in a large, or at least in a well-ventilated, room, so as to secure a continuous and amply supply of fresh air. Cases occurring in close, crowded rooms in which this prime hygienic condition cannot be secured, should be removed to a properly constructed hospital. (2.) Frequent changes of personal and bed linen, changes of posture to avoid congestion and bed-sores; if bed-sores form notwithstanding, the patient should be placed on a *water-bed;* also the *wet pack* is a valuable measure,

Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN

especially early in the disease, and when the skin is dry and hot. (3.) Food or beverages should be given in small quantities at regular and frequent intervals, including water, milk-and-water, tea, broth, beef-tea, and, if prostration, feeble and irregular circulation, or complications, indicate their use, wine or brandy. In some cases in which patients obstinately refuse all food, or are unable to swallow, life is often saved by nutritious or stimulating enematæ. (4.) Quiet, or in noisy streets stuffing the ears with cotton wool; cleanliness, sponging the whole surface of the body and careful drying at least once a day, and intelligent and unremitting watching.

The hints on nursing fever patients in the previous section should be studied.

PROPHYLACTICS.—As disinfectants, fresh air, efficient ventilation, and cleanliness are of paramount importance; as additional means for avoiding contagion but by no means as substitutes, whitewashing with quick lime, repapering infected rooms, washing the wood-work with soap and water, cleansing the linen in water to which chloride of lime has been added, and the use of this substance or of carbolic acid in the water employed in sponging the patient. Without cleanliness and fresh air, vinegar, camphor, and other so-called preventives, are useless, and only disguise noxious vapours. Persons in attendance on the sick should especially avoid the odour from the breath and the exhalations which arise on turning down the bed-clothes. Nurses should not be overworked, deprived of repose in bed, or of daily out-door exercise. If there is any ground to fear an attack of typhus, *Bry.* and *Rhus.* are the best preventives.

Digitized by UNIVERSITY OF MICHIGAN
Original from UNIVERSITY OF MICHIGAN

## 5.—Intermittent Fever (*Febris Intermittens*)—Ague.

DEFINITION.—The disease known as ague, consists of severe paroxysms of fever, characterized by a cold, a hot, and a sweating stage, between which there is a period of comparative health, in which the patient is able to follow his usual occupation.

Two centuries ago, when the soil around London was neither cultivated nor drained, and when during portions of every year, the marshes of Lincolnshire, Cambridgeshire, and adjoining counties sent forth their emanations of malaria, ague was a very fatal disease in this country. James I. succumbed to its power in London, March, 1625. When told by his attendants that "an ague in spring is physic for a king," James replied that "the proverb only held good to a *young* king." In 1658, Oliver Cromwell died from it at Somerset House.

Geographical facts, collected by medical writers from Hippocrates downwards, show that every country is unhealthy in proportion to the quantity of marshy or undrained alluvial soil it contains, the inhabitants of such districts dying often in the ratio of 1 in 20 instead of 1 in 38—the average mortality in healthy districts. The connexion of a given class of disease—represented by remittent and intermittent fever—with marshy districts is now distinctly established and generally recognised (AITKEN).

The disappearance of ague has always been in direct relation to the drainage and cultivation of the soil, not only in England, but in every portion of the globe. If the cultivating hand of man is withdrawn from a district, and the former conditions reappear, malaria again becomes rife.

SYMPTOMS.—These may set in suddenly, or they may appear gradually, until a regular paroxysm occurs. An ague fit has three stages—the cold, the hot, and the

Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN

perspiring. The *first stage* comes on with a feeling of debility, lassitude, weariness, chilliness, and rigors; then follow sensations as of cold water trickling down the spine and a shivering of the whole body: the teeth chatter, the nails turn blue, and the whole frame trembles, often with such violence as to shake the bed on which the patient may be lying. The face becomes pale, the features and skin contracted, and the papillæ of the skin are rendered so prominent as to give it the appearance aptly described as *goose skin*, such as may at any time be produced by exposure to cold. These symptoms are accompanied by an anxious expression of countenance, the eyes are dull and sunken, the pulse frequent and small, the breathing hurried and oppressed, the tongue white, and the urine scanty and frequently passed. After a period, varying from half an hour to three or four hours, the *second* or *hot* stage comes on with flushings, until the entire body becomes hot, with extreme thirst, full bounding pulse, throbbing headache, and restlessness, the urine being still scanty, but high-coloured. At length, after two, three, and even six or twelve hours, the *third* or *perspiring stage* succeeds, and the patient feels much relieved. Thirst diminishes, the pulse declines in frequency, and the appetite returns; at the same time there is a red deposit of *urates* in the urine. The perspiration first breaks out on the forehead and chest, and gradually extends over the entire surface of the body; sometimes it is only slight, but at other times it is very copious, saturating the patient's linen and bed-clothes. A paroxysm usually lasts about six hours, allowing two hours for each stage. The period between the paroxysms, as already explained, is called the *intermission;* but by an *interval* is meant the whole period or cycle between the beginning of one paroxysm, and the beginning of the next.

Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN

TYPES.—There are three chief types of ague; 1st.—*The Quotidian*, has a paroxysm daily, coming on generally in the morning, from about 7 to 9 o'clock, has an interval of twenty-four hours, and is most common in the spring. 2nd.—*The Tertian*, has a paroxysm every other day, coming on from 10 to 12 o'clock at noon, has an interval of forty-eight hours, and is most frequent in the spring and autumn. 3rd.—*The Quartan*, which has a paroxysm every third day, coming on from 2 to 4 p.m., has an interval of seventy-two hours, and is most common in the autumn. The hours of the day during which the paroxysms occur are, however, by no means uniform. The tertian is perhaps the most frequent, and has the most marked hot stage; but the quartan is the most obstinate. There is still another type in which, though there is an attack every day, those only resemble each other which occur on alternate days.

PATHOLOGY.—It is probable that in the cold stage, the blood leaves the surface and the capillaries, and accumulates about the right side of the heart, the large veins and great venous organs of the interior, such as the liver, spleen, and the bases of the lungs. In the hot stage, the heart reacts and throws out the blood again to the surface, but beyond the conditions of health, so that it is rendered preternaturally dry and hot, with all the symptoms of inflammatory fever; in the sweating stage the secretions are re-established, and the proper balance between the large and small blood vessels is restored.

LAWS.—Although at present ignorant of the physical or chemical nature of this *aerial poison*, we know that malaria obeys the following laws, which, being of great practical use, are worth remembering. 1st—It spreads in the course of *prevailing winds*. It has always been observed that when the wind blows across malarious tracts of land, the disease prevails on the opposite side to that from which the current

Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN

proceeds; at the same time the inhabitants of the ventilated district escape. 2nd—Its progress is arrested by *water*, especially by *rivers* and large *running streams*. Thus persons on board ship, or on the side of water opposite to a marsh, are unaffected by it, although a favourable wind transmits the poison a far greater distance by land. Water probably absorbs malaria; and it is a common opinion in India that water so charged produces periodic fevers in those who drink it. In like manner, thick *rows of trees* intercept the progress of the poison. 3rd—Malaria does not rise above the *low level*. It seems to be of greater specific gravity than atmospheric air, its power diminishing as we rise from the surface of the earth. Persons occupying the upper stories of a house in an infected locality suffer to a far less extent than those living on a ground floor. 4th—It is most dangerous at *night*. It has been often observed that sailors who go on shore in the daytime, when off a malarious coast, do so with no bad results; but that those who remain on the shore during the night are almost invariably seized with fever.

Effects.—From the recurrence of internal congestions in each cold stage, the function of the liver, bowels, and sometimes the kidneys, is disordered; the patient becomes sallow, his limbs waste, but his abdomen is distended, and his bowels are constipated. The spleen is especially liable to be enlarged, sometimes to a great extent, when it can be felt externally, attaining a weight of many pounds. An enlarged spleen is popularly called *ague cake*. "The heat-generating power of all victims to malaria is impaired; hence they suffer from atmospheric changes, of which healthy men take no note" *(Maclean)*. Another result is extreme liability to repeated attacks; for the disease often leaves the body so enfeebled, that ague may be reproduced by agencies which, under other circumstances, would produce no ill effects.

Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN

CAUSES.—This disease is called an *endemic*, because it is peculiar to a particular locality or country. The *exciting cause* of ague is an exhalation of invisible particles from the surface of the ground, known by the term *malaria* or *marsh miasma*. Malaria is thought to be the product of *vegetable* decomposition in soils, and is inhaled by the lungs during breathing, and thence absorbed into the system. The emanation takes place from marshy lands which have been flooded with water and dried under the influence of the sun's heat, and is most rife in the spring, and when the rains fall upon the decaying leaves of autumn. It is not due, as was formerly supposed, to putrefaction of animal matter. All that seems to be essential to the production of malaria, is the continued action of the sun on moisture stagnant upon or near the surface of the ground. A certain amount of moisture is necessary; for a very dry season which desiccates a marsh stops the malaria; while the deposit of the evening dew always favours its production. Excess of moisture, on the other hand, checks its development, so that a very wet season, as well as a very dry one, may render a marsh less unhealthy. But extreme heat does not diminish malaria on the banks of rivers, because portions of these are never dry. The shores of the Black Sea and the Mediterranean are always malarious at the commencement of hot weather, as in the absence of a tide there is none of that frequent salt washing and drainage which purifies other European shores *(Williams)*.

The *predisposing causes* are fatigue, exhaustion, insufficient or improper diet, intemperance, exposure to night air, and previous attacks of ague.

TREATMENT.—This is divided into the *Palliative* and the *Curative*. The *Palliative* is adopted during the paroxysms to mitigate the immediate symptoms, and consists chiefly in imparting warmth during the cold stage, removing the



Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN

patient's coverings and giving cooling drinks during the hot; and supplying him with *warm* and *dry* linen when the perspiring stage has passed by.

The *Curative* is adopted during the intermission, and is of the greatest importance. The following are the chief remedies in our short list:—ARSEN., CHIN., *Carb. Veg.*, *Bry.*, *Verat.*, *Nux V.*, *Puls.*, *Fer.*, etc.

The object of treatment is not, therefore, directly to arrest the paroxysms, but to bring about such a healthy condition of the system that the disease may gradually decline, until it disappears altogether. It is often observed that persons who have been drugged with large doses of *bark* and *quinine* look sickly and debilitated, and that ague returns again upon trifling exposures. It may be necessary to persevere for several weeks with the appropriate remedy, and not to change it too frequently, or at all, if the paroxysms become less severe, and occur at later periods of the day.

*Arsenicum.*—This is indicated when the stages are not clearly marked, as in the simultaneous occurrence of shivering with heat, or shivering alternating with heat, or internal shivering with external heat; *burning heat; insatiable thirst; great debility;* tenderness of the liver and spleen; nausea; *violent pains in the stomach;* great anxiety; tendency to *dropsical affections;* also when *Cinchona* has been used in excess. A dose every four hours between the paroxysms if they occur daily, or once in six hours if they occur every second or third day. In *brow-ague* and *hemi-crania*, occurring in marshy districts, *Arsenicum* is very efficacious.

*China.*—A prominent remedy in well-defined cases of ague in which all three stages are distinctly marked, and take place in their regular order, and especially when the fits occur in marshy districts; also where there exist previous to the attack nausea, thirst, headache, palpitation, anxiety, sneezing, etc. The symptoms are: *yellowish complexion*, drowsiness

Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN

after a meal, soreness or swelling of the liver or spleen; watery, slimy, or bilious diarrhœa; sensation of chilliness or shuddering after drinking, etc. A dose every four or six hours, one being administered an hour before a paroxysm is expected to occur. Should *Quinine* have been administered in excessive quantities, *Carbo Veg.* or *Ars.* should be substituted for *China.*

*Ipecacuanha.*—Nausea, vomiting, and other *gastric symptoms*, worse in the evening; external heat aggravates the shiverings, slight thirst during the shiverings, with extreme thirst during the heat; also in paroxysms in which the sweating stage is indistinctly marked.

*Nux Vomica.*—This remedy is more particularly indicated when the paroxysms occur in the afternoon or evening, and where there are aching pains in the forehead, giddiness, nausea, bitter taste, constipation, a kind of paralytic weakness of the limbs, etc. It is well indicated in persons who take strong drinks, of sedentary habits, or whose occupations are mental rather than bodily.

*Bryonia.*—Paroxysms preceded or accompanied by *cough*, difficult breathing, *pain in the chest or side*, *thickly-coated tongue*, headache or vertigo, constipation or diarrhœa, etc.; also when coldness is more marked than heat.

*Mercurius.*—Profuse and fœtid perspirations, staining the linen yellow.

When gastric or bilious derangements are prominent symptoms, or when dietetic errors have occasioned an attack, one of the following remedies may be administered: *Ant. Crud.*, *Verat.*, *Puls.*, *Ign.*, or *Bell.*

When the object is to destroy the predisposition to a recurrence of the ague, and to eliminate from the system those morbid products upon which such tendency depends, *Carbo Veg.*, *Lyc.*, or *Sulph.*, should be administered for a considerable period, once or twice daily. The choice of the

Digitized by UNIVERSITY OF MICHIGAN Original from UNIVERSITY OF MICHIGAN